EXPLORING THE IMPACT OF CULTURAL EVENT ATTENDANCE ON

UNDERGRADUATE STUDENTS' PERCEIVED SENSE OF COMMUNITY AT A DUAL-

MISSION UNIVERSITY, POST COVID: A PREDICTIVE CORRELATIONAL STUDY

by

Jared Stephenson

Liberty University

A Dissertation Presented in Partial Fulfillment

Of the Requirements for the Degree

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ABSTRACT

The purpose of this quantitative predictive correlational study was to determine how accurately a sense of community (the criterion variable) can be predicted from cultural event attendance (predictor variable) for undergraduate students at a dual-mission university, post-COVID. This study is grounded in the Sense of Community Theory and is significant to students and other higher education stakeholders in determining where to focus efforts regarding student involvement that promotes a sense of community. This research utilized the Sense of Community Index-2 to gather data through a convenience sampling method, recruiting 84 participants from a large dual-mission university in the western United States. The results of a bivariate regression revealed a statistically significant positive correlation between cultural event attendance and students' perceived sense of community. The findings suggest that each additional event attended per semester is associated with an estimated 2.84-point increase in students' sense of community score. While the pandemic and the evolving nature of higher education have presented numerous challenges to students' sense of community, this research strongly establishes on-campus cultural events as a pivotal community-building mechanism, and a practical method for increasing students' sense of community within the contemporary higher education setting. The research includes limitations and implications of the findings, along with suggestions for prospective research endeavors.

Keywords: sense of community, cultural events, dual-mission university, COVID-19, Sense of Community Index-2

Dedication

I dedicate this dissertation to my two boys, Adam and Elijah. You are my light, my straight path, and the reason I aim high. Your presence inspires my determination to fulfill the measure of my creation.

Acknowledgments

I wish to express my profound appreciation for the invaluable support I've received throughout this academic journey. I am aware that I did not walk this path alone, and I am deeply grateful to all those who have enabled and encouraged me in various ways. Special acknowledgment goes to my dedicated dissertation committee, Dr. Svirska-Otero, and Dr. Coker. Their expertise, guidance, and unwavering encouragement have been instrumental in refining this work and guiding me on this profound doctoral journey.

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List of Abbreviations

Centers for Disease Control and Prevention (CDC)

Community Attachment Scale (CAS)

Community College Research Center (CCRC)

Coronavirus Disease (COVID)

Coronavirus Disease 2019 (COVID-19)

Gross Domestic Product (GDP)

Higher Education Student Engagement Scale (HESES)

Inclusion of Community in Self Scale (ICSS)

International Monetary Fund (IMF)

Massive Open Online Courses (MOOC's)

National Association of Scholars (NAS)

National Center for Education Statistics (NCES)

Sense of Community Index (SCI)

Sense of Community Index-2 (SCI-2)

Sense of Community Profile (SCP)

Utah's System of Higher Education (USHE)

World Health Organization (WHO)

Year-over-year (YoY)

CHAPTER ONE: INTRODUCTION

Overview

The purpose of this quantitative predictive correlational study is to determine the accuracy with which sense of community (the criterion variable) can be predicted from cultural event attendance (the predictor variable) among undergraduates at a dual-mission university in a post-COVID context. This study is grounded in the Sense of Community Theory and will use the Sense of Community Index-2 to collect data. Chapter One includes the study's background, problem statement, purpose, and significance. The chapter concludes with a research question and key term definitions.

Background

Tinto (2017) asserted that faith in one's ability to succeed, academically, is necessary for persistence to complete an education, yet it, alone, cannot guarantee success. The researcher believed that for the assurance of academic success, students must become engaged in social activities or programs within the college or university community. Researchers have also determined students' sense of community can play a significant role in their academic success (Benson & Whitson, 2022; Cope et al., 2021; Korpershoek et al., 2020; McMillan & Chavis, 1986; Pedler et al., 2022). Shared social experiences on campus are important for this sense of belonging and are a key dimension of students' motivational construct (Tinto, 2017). However, not all academic programs and social activities are created equal, nor do they all positively impact students' sense of community to the same degree (Tinto, 2017; Tuten et al., 2015, 2020). Prior research has noted the importance of ascertaining the value of these various co-curricular activities (Tinto, 2017; Truta et al., 2018; Tuten et al., 2020). A type of these shared social

experiences are cultural events which are an important, but largely unexamined, aspect of the

educational experience (Tuten et al., 2015, 2020).

  The return on investment of out-of-class activities is a pertinent question considering the

amount of resources universities invest in creating and promoting such events and co-curricular

activities, as highlighted by Al-Tabbaa and Ankrah (2016) and Truta et al. (2018). Researchers

have monitored enrollment and attrition rates as institutional benchmarks of success or failure

regarding co-curricular activities (Astin, 1984; Truta et al., 2018). However, Tinto (2017) noted

the necessity to evaluate not only the institutional lens, but also the students' perspectives and

what effects their desire and ability to persist with their education (Tinto, 2017). Researchers

have considered the psychological effects on students of both co-curricular activities, and lack of

engagement in out-of-class activities (Benson & Whitson, 2022; Tinto, 2017; Tuten et al., 2020).

However, Tuten et al. (2015, 2020) explained that further research is needed regarding cultural

events as the considered out-of-class activity and the students' perspective on their value. The

authors argue that what students gain from these cultural events and how they perceive their

value is an area that lacks empirical research. They also noted that explaining precisely what

benefits students gain from attending on-campus, out-of-class cultural events would enhance

understanding of the conventional college or university experience.

Historical Overview

  Educational innovators have noted the longstanding need and tradition of the students'

educational experience to incorporate more than letter accomplishments and in-class learning

(Astin, 1961; Betts, 1968; Lewis, 1970). Milano (1987) explained that beyond residential study,

campuses have increasingly been used for extracurricular activities including seminars, meetings,

galleries and exhibitions, conferences, lectures, summer camps, graduation ceremonies, religious

gatherings, political rallies, and concerts. He also noted that these alternative activities and differing use of facilities have become a source of revenue for educational institutions, and consequently, have become intricately tied to campus planning and budgeting. Research continues to validate the positive impact of co-curricular engagement, which promotes academic achievement, leadership trait development, multicultural competence, and social skills (Ivanova & Moretti, 2018; Kuh et al., 2005, 2008; Soria et al., 2019).

Research on the effect of co-curricular engagement is well established (Kuh et al., 2006); however, more research is needed into its relationship to specific inputs and outputs. Researchers have studied various types of student engagement, such as sporting events, intramurals, and club involvement, and their effect on students and academic outcomes (Ferencz, 2017; Indroasyoko et al., 2020; Jones & Davenport, 2019; Kovarik & Warren, 2020; Phipps et al., 2015; Webber et al., 2013; Woo, 2020). Their conclusion is that different types of events have varying impacts on attendees. Therefore, further research is necessary for less studied event types, such as cultural event attendance (Indroasyoko et al., 2020; Tuten et al., 2015).

Co-curricular involvement has elicited specific research into various outcomes such as, leadership traits, multicultural competence, as well as other psychological and physical effects on students (Indroasyoko et al., 2020; Ivanova & Moretti, 2018; Soria et al., 2019). A sense of community is one such outcome that has been studied for decades in higher education (Korpershoek et al., 2020; McMillan & Chavis, 1986; Pedler et al., 2022). A sense of community, defined as one's sense of belonging to a group, has been shown to hold a significant impact on academic results (Korpershoek et al., 2020; McMillan & Chavis, 1986; Pedler et al., 2022). However, gaps in the literature exist concerning the creation of a student's sense of community through on-campus cultural event attendance (Tuten et al., 2015, 2020). It is this

specific input (cultural event attendance), and this specific output (sense of community) the present study seeks to address.

Society-at-Large

Several societal and cultural changes have impacted the sense of community in higher education and on-campus event attendance. This would include, though not limited to, the shift to online learning, declining enrollment numbers, the shift in higher education funding and systemic changes, a wide-ranging questioning of the general worth of higher education, and the COVID pandemic (Altinay et al., 2021; Benson & Whitson, 2022; Bozkurt et al., 2022; Brint, 2022; Hanson, 2022; Hess & McShane, 2022; McNally et al., 2021; Morris & Kalliny, 2022; NAS, 2020; Sharma et al., 2020). Protective factors exist that could mitigate the negative effects of these changes (Benson & Whitson, 2022). What promotes these protective factors is a question the present study seeks to address.

Institutions are actively developing new strategies to rethink systems of higher education to such an extent that the entirety of the undergraduate business model is shifting (Alexander et al., 2019; Hess & McShane, 2022; Macintosh, 2018; Pelletier et al., 2021, 2022, 2023). Declining state subsidies and constrained revenue streams are forcing educational leaders to operate more efficiently and locate additional funding sources amid rapid changes and financial instability (Arnold, 2021; Aspen Institute, 2017; NAS, 2020). Declining enrollment numbers are affecting higher education (Brint, 2022; Hanson, 2022). As of fall 2020 undergraduate enrollment in the United States totaled 15.85 million, which constituted a 4.31% decline year-over-year (YoY) since 2010 (Hanson, 2022). Over the same decade total enrollment declined 9.6% (Brint, 2022). Between 1980-2019 the cost of attending a 4-year public university increased by 221% in inflation-adjusted dollars, catalyzing high levels of student debt and

bringing into question the worth of higher education in general (Arnold, 2021; Brint, 2022). While colleges and universities have long enticed students with a particular campus lifestyle, more students are turning to online programs, which is changing institutional efforts and recruiting methods, resulting in fewer students on campus and more online (Government Accountability Office, 2022). The dual-mission university represents one such systemic evolution addressing many of the issues currently present in higher education (Carruth, 2019; Holland, 2018).

Whatever complex state higher education existed in prior to COVID-19, the pandemic disrupted that state, exacerbated its flaws, and accelerated its destabilization (Hess & McShane, 2022; NAS, 2020; Son et al., 2020). The exact parameters of COVID-19-inspired futures remain unknown regarding the trajectory of higher education (Bozkurt et al., 2022; Hess & McShane, 2022; Morris & Kalliny, 2022; Wangenge-Ouma & Kupe, 2022). However, common themes exist in post-COVID research defining the status of higher education, such as declining enrollment numbers, an increase in online education, and shifting infrastructure investment (Bozkurt et al., 2022; Morris & Kalliny, 2022). Multiple studies indicate the deleterious effects that COVID-19 has had on college students, including an increase in negative emotions such as fear, anxiety, and stress (Benson & Whitson, 2022; Umuru & Lee, 2020). Son et al. (2020) concluded that COVID-19 has significantly influenced students' lifestyles, health, and academic outcomes.

Students' sense of community has been disrupted by these tumultuous changes in higher education and especially by the COVID-19 pandemic (Benson & Whitson, 2022; McNally et al., 2021; Sharma et al., 2020). Loukas et al. (2006) noted that despite higher education's changing landscape, there are protective factors that can mitigate negative outcomes for students.

Researchers have expressed that student engagement and a sense of community are two of these protective factors for students (Benson & Whitson, 2022; McNally et al., 2021; Sharma et al., 2020). Benson and Whitson (2022) posited that a stronger sense of community at a university would have an inverse correlation with the amount of perceived stress and COVID-19–related disruptions to daily life. Their hypothesis was supported by the conclusion that students with a greater sense of community experienced lower levels of perceived stress and sense of community acted as a significant protective factor for students. The researchers also noted that disruptions to students' daily lives appeared to decrease as a sense of community increased, although the relationship between these variables was weak. They concluded by suggesting that a sense of community has the potential to be a significant protective factor that could enhance college students' capacity to deal with the aftermath of COVID-19. Whether on-campus cultural event attendance can promote this protective factor in the post-COVID era is a question the present research seeks to address.

Researchers have demonstrated that the college experience is changing, college students have had to adapt to these circumstances, and the very idea of students' sense and source of community is evolving (Keyserlingk et al., 2021; O'Keeffe, 2013; Palmer et al., 2014; Wester et al., 2021). The COVID-19 pandemic has transformed the educational landscape (Pelletier et al., 2021, 2022, 2023). The exact impact COVID-19 has had on the trajectory of higher education remains unknown (Bozkurt et al., 2022; Morris & Kalliny, 2022; Wangenge-Ouma & Kupe, 2022). What part post-COVID on-campus cultural event attendance plays in this evolving source and sense of community for students, the present study aims at discovering.

Theoretical Background

The theoretical backdrop of this research relies on McMillan and Chavis' (1986) and McMillan's (1996, 2011) theory on sense of community, Astin's (1984) research into student engagement, and Kuh's (1995) other curriculum. Together, these theories underpin the importance of student engagement both within and outside of the classroom. Research has demonstrated constructive benefits, both institutional and individual, when opportunities are provided for student engagement that encourages positive educational experiences (Tuten et al., 2015).

Astin's (1984) theory describes student involvement as the amount of physical and psychological energy that a student devotes to the academic experience. The author aimed to find an element missing from traditional pedagogical theories. To fill this gap, he created a theory with five postulates to explain how educational programs and policies are translated into academic achievement and student development. Astin described two of the five assumptions as particularly significant: First, the quality and quantity of student engagement are directly proportionate to the amount of learning and development associated with a course or project. Second, the success of a policy or practice is dependent on its ability to increase student participation. Astin's (1984) theory attempts to shift the lens of learning responsibility by urging educators to pay less attention to their own activities, and instead focus on aspects of the student, such as their level of motivation and the amount of effort they put into the learning process, through the principle of student involvement. The faculty's academic presentation is important; however, the most significant aspect of this theory is to shift the pedagogical focus from educators to students. The present study uses Astin's theory to ask what a student gains in return

for this involvement, and more specifically, whether a sense of community can be attributed to student involvement with cultural events.

The extensive benefits of higher education are not exclusively a function of the curriculum (Kuh, 1995; E. K. Wilson, 1966). Researchers have attempted to determine what makes up the academic experience more than educator presentation and curriculum (Astin, 1984; Kuh, 1995). Kuh (1995) declared that this additional factor contributing to academic outcomes can be defined as the other curriculum. Where Astin (1984) asserted the necessity of student involvement for academic success, Kuh (1995) bifurcated this engagement to in- and out-of-class involvement and focused on the out-of-class student experience. The author recognized a need to not only ask what academic outcomes occurred, but also to understand how these changes came about and what role this other curriculum played in academic progress. He concluded that there are many ways students benefit from out-of-class experiences, including improvements in critical thinking, relational and organizational skills, and attributes strongly linked with post-college fulfillment and success. With a similar conclusion, research has since considered Kuh's original theoretical interjection on the positive effects of co-curricular activities and out-of-class experiences (Kuh et al., 2014). The present study is grounded in Kuh's work in two main regards. First, it acknowledges that students are indeed academically influenced by out-of-class experiences. Second, Kuh's work subdivided the type of student involvement under consideration into in- and out-of-class engagement. The current work extends this approach by further fractioning out-of-class experiences and making cultural events, a less frequently studied type of event, central to the research question.

This theoretical trifecta is concluded with McMillan and Chavis' (1986) sense of community. McMillan and Chavis' (1986) and McMillan's (1996, 2011) theory on sense of

community is the lone criterion variable for this research. Since its inception, and for nearly three decades since, Sense of Community Theory has grounded many studies in higher education research (Chavis et al., 2008; Chavis & Pretty, 1999; Hesan et al., 2022; Pedler et al., 2022; Penland, 2017; Peterson et al., 2006; Peters-Van Havel, 2013; Schouse, 1996; Strayhorn, 2012; S. Warner & Dixon, 2011). Its originators defined the theory as follows: "Sense of community is a feeling that members have of belonging, a feeling that members matter to one another and to the group, and a shared faith that members' needs will be met through their commitment to be together" (McMillan & Chavis, 1986, p. 9). The underlying substance of this definition is based on four key elements: membership (the feeling of belonging), influence (a sense of mattering), reinforcement (integration and fulfillment of needs), and shared emotional connection (the commitment and belief that members have and will share history, place, time, and experience together). Korpershoek et al. (2020) have concluded that this sense of belonging and identification, which catalyzes personal investment in engagement opportunities, is most often positively correlated with academic achievement. Researchers extending this link are now inclined, as this study attempts, to understand what increases a student's sense of community and, consequently, academic achievement. Sense of community not only serves as a theoretical backdrop for the present study but, more profoundly, acts as the criterion, or outcome, variable of the study.

Although the three theories discussed above share common writs and precepts, they are different enough that together they form the boundaries of an entire theoretical framework within which this study lies. Supposing Astin's (1984) assumptions are true regarding student engagement, one would then need to address engagement type, as Kuh (1995) proposed with the other curriculum. The final theory in this triumvirate, sense of community, interjects the question

(i.e., the criterion variable) into this study: Is a sense of community a product of student engagement and engagement type (specifically, cultural events)?

Problem Statement

Addressing the psychological needs of students who have become disaffected by school is one of the most significant challenges in education (Christenson et al., 2012; National Academies of Sciences Engineering and Medicine, 2021). Pedler et al. (2022) have noted that student's sense of belonging is positively correlated with retention and academic achievement. Student engagement has also been found to be a predictor of early dropout intentions (Truta et al., 2018). Furthermore, a 2017 study on higher education dropout rates questioned if this attrition was a student problem or an institutional problem (Davidson & Wilson, 2017). The study concluded that the institution's inability to collectively affiliate with the student is more important than a student's inability to integrate into the life of the institution. Therefore, the present study aims to investigate what role cultural event attendance plays in this dialectic integration by considering the degree such attendance has on a student's sense of community.

Sense of community has consistently been shown to play a central and positive role in school settings, although the research indicates minimally associative correlations (Korpershoek et al., 2020; Pedler et al., 2022). Furthermore, when differing variables such as cultural events are considered as predictors, conclusions are mixed and insufficient (Tuten et al., 2015, 2020). Allen et al. (2021) expressed the need to identify strategies that will enhance the individual components of a sense of belonging, or rather, a sense of community. Korpershoek et al. (2020) explained similarly that becoming more specific with variable selection is thus crucial to advancing the literature on the sense of community in education. Although one's sense of community and its effect on cultural event attendance is a burgeoning consideration, researchers

have expressed the need to investigate the inverse, as well as its relevance to various and more specific populations (Tuten et al., 2015, 2020). The present study aims to do just that by considering the correlation between undergraduate students' cultural event attendance and their sense of community.

COVID-19 and shifts in the undergraduate business model, such as the dual-mission university, have influenced student lifestyle, on-campus environments, student health, and academic outcomes (Alexander et al., 2019; Benson & Whitson, 2022; Hess & McShane, 2022; Macintosh, 2018; Pelletier et al., 2021, 2022, 2023; Son et al., 2020; USHE, 2019). Multiple studies indicate the negative impact COVID-19 has had specifically on college students and their sense of community (Benson & Whitson, 2022; Garcia-Morales et al., 2021; Sintema, 2020; Son et al., 2020). Other common themes have emerged from post-COVID research, including declining enrollment numbers, an increase in online education, shifting infrastructure investment, and a negative impact on on-campus event attendance (Altinay et al., 2021; Bozkurt et al., 2022; Hess & McShane, 2022; Morris & Kalliny, 2022). The precise effect that COVID-19 has had on the course of higher education is still uncertain, and researchers have suggested that its discovery requires continued examination (Bozkurt et al., 2022; Hess & McShane, 2022; Morris & Kalliny, 2022; Wangenge-Ouma & Kupe, 2022).

The collection of literature has suggested that in order to further research in these areas, specific consideration must be given to narrowing the variables. The present study aims to extend this collection of literature by specifically focusing on insufficient research on event type (cultural events), timing (post-COVID), and institutional type (dual-mission university). The problem is that research has not addressed the relationship between cultural event attendance and students' sense of community at dual-mission universities in a post-COVID era, which is needed

to help students and educational leaders identify strategies that can enhance students' sense of community in this rapidly evolving higher education landscape.

Purpose Statement

The purpose of this quantitative predictive correlational study is to determine how accurately a sense of community (criterion variable) can be predicted from cultural event attendance (predictor variable) for undergraduates at a dual-mission university post-COVID. The predictor variable is defined as follows: frequency of cultural event attendance post-COVID, or the number of times a person has attended a cultural event on campus, such as lectures, musical and theatrical performances, panels, concerts, and other cultural events since the COVID-19 pandemic (Tuten et al., 2020). A sense of community, the criterion variable, is a feeling of belonging that members of a group have, a feeling that members matter to each other, and a shared belief that members' needs will be met through a commitment to be together (McMillan & Chavis, 1986). Sense of community is measured with the Sense of Community Index-2 Scale (SCI-2) as designed by Chavis et al. (2008). A convenience sample of at least 66 students will be drawn from undergraduates at a large dual-mission university in the western United States and serve as the premising data for this study.

Significance of the Study

Studying students' sense of community derived from cultural event attendance is theoretically important for several reasons. If the sense of community plays a protective and significant role in the success of college students as suggested by the current body of literature (Benson & Whitson, 2022; Korpershoek et al., 2020; Pedler et al., 2022), then it would be important for future research to assess the effectiveness of different kinds of resources that promote a sense of community (Benson & Whitson, 2022). The present study acknowledges this

role of sense of community, as well as the research suggesting the college experience is currently undergoing transformations, and the definition of students' sense of community and its origin is evolving (Keyserlingk et al., 2021; O'Keeffe, 2013; Palmer et al., 2014; Wester et al., 2021). Vitucci et al. (2021) expressed that the changing landscape of higher education has opened new opportunities for learning, but also acknowledged that it has posed challenges in fostering a sense of belonging among students. Furthermore, limited research has been conducted on college students during and after the pandemic (Benson & Whitson, 2022). Amidst these evolving educational modalities and pandemic effects, the present study could shed light on the ways in which universities can foster a sense of community and connectedness among students and provide insights into the effectiveness of various campus programs and initiatives involving cultural events.

By examining the relationship between on-campus cultural event attendance and students' sense of community, a deeper understanding can be gained of how social capital, in this case a students' sense of community, is created and sustained in the higher education community context. Researchers have observed that the lack of information in the literature necessitates a deeper exploration into the part community and connectedness play in various programs, as well as the roles faculty, staff, students, and other stakeholders could take on to promote these ideas (Trespalacios et al., 2021). The present study could contribute to the body of literature on the community in higher education, the broader literature on social capital and sense of community, as well as the effects of cultural events, an event type in which researchers have suggested literature is sparse (Tuten et al., 2015, 2020). The present study fills these research gaps and contributes to the knowledge base by considering students' post-pandemic sense of community, sampling from a burgeoning and thinly studied institutional type (a dual-mission university),

using a less studied predictor variable (cultural events), and considering the changing state of higher education in the aftermath of COVID-19.

This study is significant to higher education administrators, students, event planners, and mental health professionals and researchers considering college students' perceived sense of community. This research will also benefit the growing number of institutions classifying themselves as dual-mission entities (Colorado Mountain College, 2022). Additionally, the study is significant to higher education stakeholders and state lawmakers as they determine effective policy and funding options for higher education. This study will potentially shed light on the opportunity cost of student activities and could extend the literature on what factors are influential in students' decisions to participate in on-campus cultural events, as well as how students can spend their time most effectively (Evitts, 2022; McCall et al., 2020). Ultimately, this research will help students and other higher education stakeholders determine where to focus their efforts regarding student involvement that promotes a sense of community and, consequently, academic achievement.

Research Question

RQ1: How accurately can a sense of community be predicted from cultural event attendance for undergraduates at a dual-mission university, post-COVID?

Definitions

1. *Cultural events* – Lectures, concerts, musical and theatrical performances, festivals, cultural demonstrations, and art exhibitions (Tuten et al., 2020, p. 55).

2. *Dual-mission university* – An institutional classification of a hybrid of the four-year university and the two-year community college. Generally, an open access institution

offering affordable and streamlined pathways through a blend of certificate, associate, and bachelor's degree programs (Colorado Mountain College, 2022).

3. *SCI-2* – The Sense of Community Index-2 is an instrument created to measure an individual's perception of sense of community as defined by the degree of the following elements: membership, influence, meeting needs, and shared emotional connection (Chavis et al., 2008).

4. *Sense of community* – A feeling of membership and belonging within a group, a sense of worth derived from being part of a group/community, underpinned by group cohesiveness (McMillan & Chavis, 1986).

5. *Student involvement* – "the amount of physical and psychological energy that the student devotes to the academic experience" (Astin, 1999, p. 518).

CHAPTER TWO: LITERATURE REVIEW

Overview

The purpose of this literature review is to elucidate the theoretical underpinnings of the

sense of community among students at dual-mission universities and present the value of cultural

events in the context of changing higher education and a post-pandemic era. Foundational

theories discussed include McMillan and Chavis' (1986) and McMillan's (1996, 2011) theory on

sense of community, Astin's (1984) theory of student engagement, and Kuh's (1995) other

curriculum. Community is discussed as it relates to higher education. A review of the literature

on the role of on-campus events and their influence on students' perceived sense of community

follows. The changing landscape of higher education is then discussed, as well as a proposed

systemic answer to these shifting trends: the dual-mission university. Discussion on the COVID-

19 pandemic timeline, its impact on higher education, and a section reviewing the sense of

community's protective function against pandemic effects then concludes the chapter.

Theoretical Framework

This section reviews the major theories that are relevant in this area, looks at the

historical conclusions of these theoretical assumptions, and considers their relationship to the

present study. The theories discussed are Astin's (1984) theory of student involvement, Kuh's

(1995) the other curriculum, and McMillan and Chavis' (1986) and McMillan's (1996, 2011)

theory on sense of community.

Astin's Theory of Student Involvement

Astin (1984, 1999) presented a developmental theory based on a student's degree of

involvement. The core consideration of Astin's (1984) theory is the amount of time and effort a

student invests in their journey through higher education, in other words, "the quantity and

quality of the physical and psychological energy students invest in their college experience" (p. 297). Astin's student involvement theory parallels the Freudian concept of cathexis (Astin, 1999). Cathexis is the investment or charge of psychic energy, motivation, and control of why and how individuals use their energy, or, in psychoanalytical terms, how the id utilizes its energy (Hall, 2016). An essential element of Freudian psychology is the assumption that people expend effort, or invest psychological energy, in people and objects outside of themselves (Hall, 2016). Astin noted a conceptual parallel between the concept of effort, the psychologist's definition of psychological investment, and the idea of involvement (Astin, 1999). He sought to define this notion more clearly as it relates to students, saying that the concept of involvement should not be considered "mysterious or esoteric," and more simply defined student involvement as "the amount of physical and psychological energy that the student devotes to the academic experience" (p. 518). Explaining the results of this involvement, including student change and academic outcomes, was the aim of Astin's (1999) developmental theory on student engagement.

Astin (1999) noted three pedagogical theories and their limitations as compelling considerations for the development of the student involvement theory: the subject matter theory, the resource theory, and the individualized (eclectic) theory. He sought to understand and overcome the limitations in each with respect to the student involvement theory. The subject matter theory posits that the student's learning and development depend on exposure to the right subject matter (Astin, 1999; Vereijken & van der Rijst, 2023). Astin's (1982, 1999) research noted the student's passive role in the approach and the favor it offers only highly motivated students as a limitation of this theory. The resource theory maintains that if adequate resources are available to the student, development and learning will occur—in other words, the potential degree of student development and learning will be proportional to the availability of resources

(Astin, 1999). The author noted that the principal limitation of the resource theory is the paradoxical consequence of resource compilation—more resources allocated in one place (e.g., school A) means fewer resources will be available in another area (e.g., school B), meaning that allocation of resources in one place reduces the total resources available to the rest of the educational community. The individualized (eclectic) theory posits that no one strategy of learning, content, instruction, or resource distribution is sufficient for all learners. In other words, the variety of students potentially requires a corresponding variety of learning approaches (Astin, 1999; Chickering, 1981). The primary limitation of the individualized theory is the extreme expense of resources and individual attention required, which makes it difficult to practice (Astin, 1999).

As a rebuttal, or rather a supporting extension, Astin (1984, 1999) remarked a qualitative difference between these developmental theories and the theory of student involvement. More so than these developmental theories, the construct of the student involvement theory mirrors a more common psychological construct, namely motivation (Astin, 1984, 1999). Furthermore, the theory urges educators to pay less attention to their own activities, and instead focus on aspects of the student, such as their level of motivation and the amount of effort they put into the learning process, through the principle of student involvement (Astin, 1999). The current study looks to extend the literature on student involvement just as Astin's theory of student involvement expanded the research on developmental theories.

The study postulates five clear assumptions about student involvement in higher education. First, involvement is an investment of both psychosocial and physical energy. Second, involvement is a spectrum on which students can register at various levels. Third, involvement is not unidimensional and can be measured both quantitatively and qualitatively. Fourth, the degree

of student development is directly proportional to the degree of involvement. Fifth, the effectiveness of academic programs is directly proportional to the degree of student involvement produced (Astin, 1984, 1999).

Assumptions two, three, and four of Astin's (1984, 1999) theory of student involvement ground the current research and provide a framework for extending the literature. A component of the current research question is to consider a student's quantity and frequency of cultural event attendance as a measure of their involvement as a student; this serves as the predictor variable. The theoretical boundary created by assumptions two and three implies that the student experience can be measured at various levels. The ratio asserted in Astin's (1984) fourth assumption creates a platform for measuring the outcomes of student involvement, and the exploration of the student development-involvement relationship. As such, the fourth assumption also grounds the correlational design choice in determining the relationship between the criterion and predictor variables chosen for the present evaluation. Astin (1984, 1999) maintained that the student involvement principle defined the interrelatedness of educational theories and a student's academic outcomes. He claimed that the student involvement theory was the missing element, the mediating mechanism that would assist in defining how educational programs translate into student achievement and development. The present study assumes this connection and seeks to explore more specifically the relationship between involvement, as indicated by cultural event attendance, and the outcome, as indicated by a sense of community.

The Other Curriculum

Kuh's (1995) other curriculum was an effort to investigate the extracurricular experiences that influence students' learning and growth. Where Astin (1984) asserted the necessity of student involvement for academic success, Kuh (1995) divided involvement into the categories

of in-class and out-of-class involvement and focused on the out-of-class student experience. The author saw the need to not only ask what academic outcomes occurred, but to understand how these changes came about, and what role out-of-class experiences played in this academic progress. He concluded that there are many areas in which students benefit from out-of-class experiences, including critical thinking, relational, and organizational skills, and other attributes strongly linked with post-college fulfillment and success. Later research has built on the observations of the positive effects of co-curricular activity and out-of-class experiences (Kuh et al., 2014). Discussed here are Kuh's original work, the foundations of his theory, and the subsequent research that built upon it.

The Foundation of Kuh's Theory

Kuh's (1995) work studying the impact of college experiences was based on two connected conceptual principles: the impact model for change assessment associated with higher education attendance (Pascarella & Terenzini, 1991), and the theory of student involvement (Astin, 1984). He leaned heavily on Pascarella and Terenzini's (1991) work that synthesized the research on the influence higher education attendance had on students' personal development, academic achievement, and various post college effects. Six questions have served as the organizing framework for their literature analysis, the same questions Kuh (1995) sought to expand upon with his work on out-of-class activities. This is relevant not only to establish the chronology of theoretical development correctly, but also to define the conceptual underpinnings of this paper's research question. Pascarella and Terenzini (1991) theoretically derived these six questions from Astin's (1984) work on student engagement and academic outcomes. Kuh (1995) then extended this research by dividing school experiences into in-classroom and out-of-classroom interactions. The proposed study aligns with Kuh's dissection of experience type.

Pascarella and Terenzini's (1991) questions create a platform for continued research. In the latest extension of their original work, *How College Affects Students, Vol. 3*, researchers describe what precisely these questions refer to (Mayhew et al., 2016). Questions three and four have informed the current research and, therefore, are further dissected here. Question three refers to between-college effects by asking, "What evidence is there that attending different kinds of postsecondary institutions have a differential influence on student change and development during college?" (Mayhew et al., 2016, p. 3). This question explores the degree to which institutional conditions such as size, control, and geographical location, as well as organizational characteristics such as faculty structure, level of peer development, and school bureaucracy, influence a student's learning and development. Question four refers to within-college effects by asking, "What evidence exists that engaging in different experiences in the same institution is associated with student change and development during college?" (Mayhew et al., 2016, p. 3). This question examines how students' behavior shifts due to their involvement in specific college activities. Question three explains why the institutional type and the selection of a dual-mission university is a prevalent consideration in this research paper, whereas question four demonstrates why the proposed research has specifically selected cultural events as one of the different experiences to be considered, to expand the current body of literature on the topic.

Kuh's Original Work

Kuh initially defined the other curriculum as out-of-class experiences associated with student learning and personal development. The study aimed to identify students' out-of-class experiences associated with their personal and academic development. The author sought to answer two questions: (a) Which activities, events, and people do students credit with their intellectual, social, and emotional growth? and (b) Do the types of out-of-class experiences

linked to various results differ depending on the kind of school that students attended and students' traits, such as gender and ethnicity? To determine the association between out-of-class experiences and various outcomes the researcher interviewed 149 students from twelve different institutions. Two of the study's conclusions have specifically informed the current research: (a) "certain out-of-class activities were more frequently associated with changes in some areas and not others", and (b) "the relationship between outcomes associated with certain antecedent experiences varied somewhat by institutional type" (Kuh, 1995, Discussion section, para. 6). The current research seeks to extend Kuh's questioning by considering both the activity type (cultural events), and the institution type (dual-mission university).

Extending Kuh's Work

Many scholars have both referenced and extended Kuh's (1995) research on co-curricular activities and validated their relational importance with student development (Holt, 2021; Martin et al., 2020; Milmine, 2021; Peiser & Grant, 2020; Zhoc et al., 2020). His work on the subject with additional publications on student engagement (Kuh, 2009; Kuh & Hu, 2001; Kuh et al., 2006). Later, the author extended the concept of co-curricular activity to the consideration of the use of technology and noted a positive correlation between the efforts students devoted to other activities involving technology and their self-reported improvements in various college outcomes (Kuh & Hu, 2001). In 2005, a team of researchers, including Kuh et al., determined that student engagement was a key feature of 20 four-year colleges and universities that exhibited higher than predicted graduation rates. In 2006, Kuh et al. noted that student participation in co-curricular activities had a positive correlation with persistence and student success. Furthermore, despite this positive association, researchers note that more than two-fifths of university students and 84% of two-year college students spend no time participating in these cocurricular opportunities

(Kuh et al., 2006). This research has inclined other scholars to inquire why there is little participation in cocurricular activities and in what types of cocurricular activities students are more willing to participate (Holt, 2021; Martin et al., 2020; Milmine, 2021; Peiser & Grant, 2020; Zhoc et al., 2020). The proposed research also seeks to explore the impact of a very specific co-curricular activity type, namely cultural events.

Kuh's (2009) more recent work describes the value of engaging in cocurricular activities as more complex than his previous research by concluding that the participation in various educational activities lays the groundwork for the skills and attitudes that are necessary for leading a productive and fulfilling life after completing college. In other words, engagement in such activities contributes to the development of thought patterns and emotional traits that enhance individuals' ability to keep learning and growing throughout their lives. Similarly, other researchers have concluded that student engagement is a complex and multifaceted concept; it serves as a meta-construct that brings together various research strands that contribute to explanations of student success (Zhoc et al., 2019). This definition also aided in the development of the Higher Education Student Engagement Scale (HESES) (Kuh, 2009).

The grounding of the current research in Kuh's (1995, 2009) work on the other curriculum and this complex issue of student engagement can be seen in two main regards. First, students are indeed academically influenced by co-curricular experiences. Second, Kuh's work divided the types of student involvement to include both in-class and out-of-class engagement. The current study extends this approach by further dividing out-of-class experiences and focusing on a less commonly studied event type, cultural events; an attempt to extend the literature on this multifaceted concept, student engagement.

Sense of Community Theory

This section will describe the concept of community and then discuss the origins and definition of the Sense of Community Theory as it pertains to this study.

The Concept of Community

Multiple researchers began to define and examine the concept of community in the late twentieth century (Ahlbrant & Cunningham, 1979; Bachrach & Zautra, 1985; Campbell & Fiske, 1959; Chavis, 1983; Doolittle & MacDonald, 1978; Glynn, 1981; Hill, 1996; McMillan, 1976; Riger & Lavrakas, 1981; Riger et al., 1981; Tropman, 1969). Sarason (1974) was the first to define the sense of community from the psychological perspective as a sociological manifold that acknowledges and facilitates similarities and an interdependence with others. Two early works appeared shortly after his definition and are also referenced in McMillan and Chavis' (1986) presentation on the theory of sense of community; Gusfield's (1975) definition and use of the term community, and Doolittle and MacDonald's (1978) sense of community scale.

Gusfield (1975) foundationally bifurcated the term community by distinguishing between the two primary uses of the word supported by the research. First, there is the geographical notion of community, which is territorial, referring to towns, cities, places, and so on. Second is the relational notion community, referring to human relationships, including their qualities and characteristics. Although the terms are not mutually exclusive, both Gusfield (1975) and McMillan and Chavis (1986) observed that the geographical and relational notions of the term apply equally to the force or sense of community.

The Foundations of Sense of Community

Many studies contributed to McMillan and Chavis' (1986) effort to understand the concept of community (Ahlbrant & Cunningham, 1979; Bachrach & Zautra, 1985; Campbell &

Fiske, 1959; Chavis, 1983; Doolittle & MacDonald, 1978; Glynn, 1981; McMillan, 1976; Riger & Lavrakas, 1981; Riger et al., 1981; Tropman, 1969). However, three studies played a profound role in the definition and conceptualization of their theory. The first was Glynn's (1981) research which included the testing and development of a tool created to measure the psychological sense of community. The instrument was used in three different US and Israeli communities. The author concluded that manipulable variables might be associated with the psychological sense of community, which was foundational in characterizing it as a construct. McMillan and Chavis (1986) mentioned Glynn's work as particularly significant to their Sense of Community Theory as it recognized the dissimilarities between real and ideal levels of sense of community, while also presenting a relational demonstration of the sense of community and one's capacity to operate within it.

The second to play profound role in underpinning the sense of community theory was Riger and Lavrakas' (1981) work which studied residents' attachments to their communities. Their contribution to the literature lies in identifying two dimensions of community attachment—social bonding and physical rootedness. McMillan and Chavis (1986) mentioned Riger and Lavrakas' (1981) work as significant to their Sense of Community Theory as it, more so than other research, conceptualized the emotional aspect of the sense of community experience.

Much of McMillan and Chavis (1986) work derives from a third source, Doolittle and MacDonald's (1978) sense of community scale, which attempted to understand the essential aspects of the community structure considered by Tropman (1969). The outcome of Doolittle and MacDonald's (1978) work was the development of a 40-item instrument, the sense of community scale (SCS). The SCS represents an attempt to understand the attitudes and behaviors

that make up communicative interactions at the community and social levels (Doolittle &

MacDonald, 1978; McMillan & Chavis, 1986). The outcome of the original SCS research was

the generalization that both inverse and direct relationships exist between the community, its

members, and specific community characteristics and preferences (Doolittle & MacDonald,

1978). This concept added to the theoretical foundation of McMillan and Chavis' theory by

explaining basic functions of the community structure as it relates to its members.

McMillan and Chavis (1986) observed the theoretical platform on which previous

research had developed. They described the sum of literature as the knowledge that the sense of

community experience exists and operates as a force within human life and societal interactions.

Although respecting this foundation, they noted that previous works on the sense of community

needed a more precise theoretical definition of what it was, description of its nature, and clarity

of its function.

Sense of Community Definition

As published in both McMillan's (1976) original presentation, and in McMillan and

Chavis' (1986) work, a sense of community is a feeling of belonging that members of a group

have, a feeling that members matter to each other, and a shared belief that members' needs will

be met through a commitment to be together. The theory seeks to explain the dynamics of the

sense of community, identify the various contributing elements, and describe how these elements

work together to create the community experience (McMillan & Chavis, 1986).

McMillan and Chavis (1986) proposed a definition of the Sense of Community Theory

that was initially constructed of four elements: membership, influence, integration/fulfillment,

and shared emotional connection. The definitions of the four elements, as extracted from the

original theory, are as follows. Membership is a feeling of belonging or of sharing a sense of

personal relatedness, an awareness of similarities within the group. The feeling of having an impact on a group and the group being significant to its members is known as an influence, a reciprocal ascendancy between the member and the group. Integration/fulfillment is the feeling of assurance that the resources available to members through their connection will satisfy their needs. Lastly, shared emotional connection is the belief in and commitment to shared history, familiar places, and time together, including the belief that similar experiences, both physical and mental, will be shared across time.

The definition of a sense of community has undergone various modifications. McMillan (1996) published a retooling of the definition, which provided semantic alterations to the four elements of sense of community. He replaced the feeling of membership with the "spirit" of being together. The second element, influence, was replaced with "trust." This reciprocal ascendancy was redefined from an authoritative influence felt between the group and members to one of trust between the group and members. The third element, integration/fulfillment, was replaced with "trade." Previously, this element focused on the members' fulfilled needs. However, with a more economically-driven term, trade, the focus became less individualized and more attentive to the mutual benefit shared among the group. With no change to its actual meaning, the final element went from being referred to as a shared emotional connection to "art" (McMillan, 1996).

If one accepts Astin's (1984) premises regarding the productive nature of student engagement, then, as Kuh (1995) suggested with the other curriculum, the type of engagement must be considered. The third and last theory in this group, which is the sense of community, interjects the outcome variable into the question as the focus of the present study, thus, inclining inquiry into the degree a sense of community results from a specific student engagement type,

namely attending cultural events. The present study seeks to use this framework as a foundation

for posing the research question and extending the literature on sense of community, and student

engagement.

Related Literature

This section discusses each consideration of the proposed research question and their

developing literature. The sense of community and cultural events within the context of higher

education is explored. The changing landscape of higher education is then examined along with

literature on the dual-mission university, and COVID-19's disruption of higher education. This

chapter explains the rationale behind selecting the variables studied in the present research,

which include cultural events (as the predictor variable) and students' perceived sense of

community (as the criterion variable). This review of previous research reveals a knowledge gap

regarding how attending cultural events might influence the post-COVID sense of community

among students in a dual-mission university.

The Campus Community

University is a type of community, and educational leaders have attempted to be mindful

of this notion for decades (Boyer, 1990; Brooks & Boyer, 2019). Spurred on by a national study

of social conditions on college campuses, Boyer (1990) attempted to clarify the academic

standards, civic standards, and values that undergird a learning environment, and productively

defined the university as a community. He conceptualized the learning environment—the college

campus—as a community.

Boyer (1990) suggested six key traits all colleges and universities should aspire to have to

create a thriving community. The first characteristic concerned the purpose of a community. The

author defined the purpose of the university as education, a place where students and faculty

converged with similar educational goals that would strengthen teaching and learning within the community. The second principal characteristic of the community was its openness. An open and civil environment with freedom of expression was necessary for a productive campus community. The third central characteristic was a community's sense of justice; thus, a university was a place where diversity was enabled and the sacredness of an individual was honored. The fourth characteristic of a campus community involves responsibility to the group or the common good of the community. This principle parallels the Sense of Community Theory, according to which procedures for governing and expected behaviors must be well-defined within the community (McMillan & Chavis, 1986). The fifth fundamental characteristic in Boyer's (1990) definition of a community is the presence of a sense of caring and support amongst its members, making the community a space where altruism and service are present and encouraged. The researcher concluded the list of community characteristics with the idea of celebration and heritage, defining the community as a place where tradition and change could be widely accepted.

Boyer's (1990) research on college campuses as communities extends previous literature regarding higher education (Astin, 1984; Brooks & Boyer, 2019; McMillan & Chavis, 1986; Astin,). Six characteristics (Boyer, 1990) closely resemble aspects of Astin's (1984) theory of student involvement and McMillan and Chavis' (1986) Sense of Community Theory, both of which are mentioned in Boyer's (1990) work. The author noted that defining the campus as a community provided a framework for governance (Boyer, 1990). Other scholars have maintained and studied this context of community within higher education (Benson & Whitson, 2022; Chavis et al., 2008; Keyserlingk et al., 2021; Korpershoek et al., 2020; O'Keeffe, 2013; Palmer et al., 2014; Pedler et al., 2022; Peterson et al., 2008; Wester et al., 2021). Brooks and Boyer's

(2019) have recently updated the six principal characteristics as the basis for the definition of the campus community.

The Sense of Community in Higher Education

A sense of community, described as one's sense of belonging to a group, has been found to play an important role in academic outcomes (Korpershoek et al., 2020; McMillan & Chavis, 1986; Pedler et al., 2022). The following works have studied sense of community in the context of higher education and continue to demonstrate its value to students' as well as compelling continued research in this area (Benson & Whitson, 2022; Cope et al., 2021; Han et al., 2022; Hansen & Suh, 2010; Jones & Davenport, 2019; Li et al., 2020). This collection of literature has influenced the present study through the identification of specific factors that relate to a sense of community and their contribution to student success, as well as exemplifying the structure for posing such questions.

Li et al. (2020) examined the relationship between a sense of community and student engagement and academic achievement. It was discovered that a strong sense of community is associated with higher levels of student engagement and academic achievement. Boyd et al. (2022) explored the relationship between a sense of community and student retention in higher education. Similarly, they found that students with a strong sense of community are more inclined to remain enrolled in college or university. Li et al. (2017) examined the relationship between a sense of community and student satisfaction. The results align with previous findings demonstrating that students who have a strong sense of community are more likely to be satisfied with their university experience. Hansen and Suh (2010) explored the relationship between sense of community and student mental health in higher education and found that students with a strong sense of community are more likely to have positive mental health outcomes. The main

inference drawn from these studies is the positive effect of students' perceived sense of community on the aforementioned principles. The results of these studies suggest universities should focus on creating a sense of community by providing students with social support, offering meaningful activities, promoting events, and developing strong relationships between faculty and students. The present study aids in extending this literature by determining the correlation of students' perceived sense of community and a specific activity type, cultural events.

Benson and Whitson (2022) sought to understand how universities could better support their students with protective factors of resilience, particularly in response to catastrophic events such as the COVID-19 pandemic. COVID-19 has had a considerable impact on higher education, with negative effects on academic outcomes, health, and the lifestyles of students (Son et al., 2020). In the aftermath of these effects, Benson and Whitson (2022) sought to specifically understand how a sense of community can serve as a protective factor that supports student success during and after a negatively perceived event. A total of 296 students from a private university in the United States were polled using online surveys. The authors hypothesized the likeliness of there being an inverse relationship between the strength of students' perceived sense of community at the university and the levels of perceived stress and COVID-19-related disruptions. They concluded that a sense of community was an important factor in mitigating stress and academic disruptions compelled by COVID-19. Students who felt a greater sense of community reported feeling less stressed. The authors also noted how certain aspects of a sense of community have rarely been examined and that continued research on the sense of community and post-COVID settings was necessary (Benson & Whitson, 2022). The present study aims to

address this suggestion by both extending the literature on the sense of community and constituting the study within the framework of a post-COVID era.

Cope et al. (2021) observed the sense of community in an exploratory study that sought to identify factors that influence academic success. They analyzed the influence of a sense of community by surveying students from a private college in the United States. They found a positive correlation between a sense of community and graduation predictions. However, expectations varied between class standings (first-year, second-year, third-year, and fourth-year students). The researchers concluded that strengthening a student's sense of community with the university context increases their academic confidence with regard to graduating. Cope et al. (2021) also mentioned alternative versions of the sense of community index and the researchers who have debated their use (Loomis & Wright, 2018; Obst & White, 2004; Peterson et al., 2008; Stevens et al., 2011). This research compelled the current study to use the Sense of Community Index-2 (Chavis et al., 2008) to acquire data.

In a mixed-methods study, Cornell et al. (2019) examined the impact of synchronous learning environments on students' sense of community. They discovered that such environments create a sense of community for those who are typically online students. Given that a sense of community has been noted as a factor relating to student success, their study assists in validating synchronous learning environments as a productive teaching method (Korpershoek et al., 2020; McMillan & Chavis, 1986; Pedler et al., 2022). Notably, a sense of community was fostered when students were given opportunities for authentic, spontaneous, and supportive discussions (Cornell et al., 2019).

Han et al. (2022) sought to explore how students with varying degrees of sense of community and various levels of motivation contribute to collaborative learning environments.

Although their research extended the connection between the sense of community and academic success, they noted how little empirical research has considered the relationship between the sense of community and other psychological factors such as extrinsic motivation, intrinsic motivation, and amotivation. They questioned to what degree the sense of community among students acts as a mediator in the relationship between their motivation and their participation in collaborative learning. A comprehensive data set consisting of six years of research and over 3,000 student surveys were examined. The study found a substantial link between extrinsic motivation, a sense of community, and student participation in group learning environments; however, intrinsic motivation did not correlate as significantly with participation in group learning environments and a sense of community. Their study showed that a sense of community could serve as an intermediary between motivation and group contribution.

Han et al. (2022) used the Sense of Community Index-2 (Chavis et al., 2008) and multiple regression analysis (the same instrument and similar statistical analysis methods proposed for the current research) to expand the literature on the sense of community. Furthermore, they noted that future work could examine other variables that relate to the sense of community and pointed out the necessity to examine different learning environments and larger group settings. The present study intends to implement this research suggestion by considering a less studied variable, cultural event attendance, within a different learning environment, the dual-mission university.

Jones and Davenport (2019) sought to examine the sense of community among teachers at an ethnically diverse high school. Their study was compelled by the need for more research on the sense of community in an African American context. The cross-sectional participatory study used the SCI-2 (Chavis et al., 2008) for data compilation and was framed in accordance with

McMillan and Chavis' (1986) Sense of Community Theory. The present study is similarly framed with the Sense of Community Theory and continues use of the instrument, SCI-2 (Chavis et al., 2008). Jones and Davenport's (2019) results indicated that a sense of community was an essential factor to all administrators and teachers who participated in the study. A sense of community was low among both the African American and the White male teachers. The authors concluded for fostering a feeling of belonging, unity and the potential for academic and professional achievement, a sense of community is an essential aspect of the school climate. Furthermore, the development of a sense of community begins with administrators and teachers identifying ways to foster that sense within the school environment. Establishing the correlation between student's perceived sense of community and cultural event attendance, as the present study aims, will extend this literature by helping administrators and teachers identify which engagement types foster a sense of community and to what degree.

Addressing the psychological needs of students is one of the biggest challenges in education (Christenson et al., 2012; National Academies of Sciences Engineering and Medicine, 2021). McNally et al. (2021) sought to confront this issue with reference to bereaved college students and the psychological sense of community. Specifically, the researchers aimed to explore the impact of grief on college students. One of the significant predictors examined was bereaved students' psychological sense of community regarding their college. Utilizing the sense of community scale, the researchers surveyed 131 undergraduate students, a sample size similar to that sought by the proposed study. The authors concluded that a sense of community and the student's degree of emotional closeness to their deceased loved one, were predictors of the impact of grief. They noted the existence of effective and ineffective ways of managing psychological affliction. The research concluded that a sense of community might, in fact, act as

a protective factor for university students dealing with psychological afflictions and possibly create a buffer for those experiencing grief (McNally et al., 2021). This conclusion implies that preventative and coping strategies could include strategies that promote a sense of community. Therefore, determining which types of interactions and events promote a sense of community and to what degree could fill important gaps in the literature.

A recent study examining the relationship between belonging, a sense of community, and student retention concluded that institutions should focus on cultivating a sense of belonging or community to increase student retention (Pedler et al., 2022). The psychosocial construct of belonging fulfills a fundamental human need, and providing it is an imperative consideration for productive higher education (Gillen-O'Neel, 2021; Pedler et al., 2022). Pedler et al. (2022) used a questionnaire that was completed by 578 participants. Examination of the results revealed that students who experience a greater sense of belonging have higher levels of motivation, engagement, academic confidence, academic achievement, and lower rates of attrition rates (Pedler et al., 2022). The study also noted that when a student feels more connected to their institution and campus community, they are more likely to remain in the institution, which was especially true for first-year students, who have the highest attrition rates (Gillen-O'Neel, 2021; Meehan & Howells, 2019; Pedler et al., 2022). Pedler et al. (2022) noted that exploring the interconnected relationships between multiple variables, and how various factors combine to influence student achievement, would present a valuable avenue for future research, which the current research seeks to address.

A meta-analytic review published in 2020 examined 82 correlational studies on school belonging and academic outcomes (Korpershoek et al., 2020). Results from this analysis revealed a small positive correlation between academic achievement and sense of belonging.

Furthermore, the results reinforced the idea that school belonging, or sense of community, plays an important role in students' school life (Korpershoek et al., 2020; Pedler et al., 2022). Researchers extending this link are now inclined, as this study attempts, to understand what increases a student's sense of community and consequently academic achievement. Sense of community not only serves as a theoretical backdrop for the present study but, more profoundly, acts as the criterion, or outcome, variable of the study.

This literature on the sense of community in a higher education context primarily suggests that a strong sense of community can lead to positive academic outcomes, increased student retention, and improved overall student well-being. Furthermore, factors such as student engagement, faculty support, and campus culture can all influence the development of a sense of community in higher education. The results of these studies suggest educational leaders should focus on the promotion of activities that enhance a student's sense of community. The present study aids this discussion by attempting to define the correlation between students' sense of community and cultural event attendance at a dual-mission university post-COVID.

The Evolving Source of Sense of Community

The sense of community among students in higher education is an important factor for providing a safe, engaging, and supportive environment for students to learn and grow. This sense of community can derive from a variety of sources, such as student engagement, student organizations, faculty, staff, and the university itself. The purpose of this section is to explore the sources of students' sense of community in higher education and examine how it is changing.

Student organizations are a significant source of students' sense of community in higher education because they provide various developmental opportunities in a safe, supportive environment (Costello et al., 2016). They are among the key factors in developing a sense of

belonging among students. Additionally, they can help create a sense of shared identity among students, which is an essential factor in developing a sense of community (Xerri et al., 2018). D. Wilson et al. (2020) found that faculty can help students feel connected to the university by providing a supportive, welcoming environment. Furthermore, faculty can help create a sense of shared identity among students by creating a supportive environment and encouraging them to participate in activities and events (Healey et al., 2016; Umbach & Wawrzynski, 2005). Park and Park (2019) discovered that staff members foster students' sense of belonging by creating an environment where learners feel valued and respected as well as a sense of shared identity among students by providing support and guidance to help them succeed in their studies.

Finally, the university itself can be a source of students' sense of community. Zepke and Leach (2005, 2010) found that universities can help create a sense of community by providing various activities, programs, and resources in which students can participate. Additionally, higher education institutions can foster a sense of shared identity among students by hosting events and promoting a shared purpose and mission (Gillen-O'Neel, 2021). This collection of literature highlights the fact that various educational stakeholders and multiple sources play an intricate role in the promotion of students' sense of community. The present study is an attempt to extend the sense of community literature by helping these key stakeholders and educational policy makers better understand the factors that contribute to a positive school climate and a greater sense of community among students.

Although the conceptualization and necessity of community in higher education seem well established, the means and methods of constructing and achieving a sense of community have evolved. Currently, the college experience is undergoing transformations, and the definition of what it means for students to have a sense of community and where it should originate from is

evolving (Keyserlingk et al., 2021; O'Keeffe, 2013; Palmer et al., 2014; Wester et al., 2021). Technology, remote learning, and the changing landscape of higher education have each played a role in the evolution of the perceived sense of community on campus.

Changes to conventional learning methods towards favoring online learning processes have significantly altered how a sense of community can and should be stimulated (Beauchamp et al., 2020; Sukmadewi & Tirtayani, 2021). Those teaching and learning in an online setting must confront difficulties exclusive to this type of setup, distinct from what is encountered in a physical classroom (Swickard, 2021). Being unaware of fellow learners, as may be experienced when taking massive open online courses (MOOCs), or with various online education platforms, often results in a low sense of community for students and educators (Hagedorn et al., 2022; Strafaccia, 2021). With online courses, chat forums are frequently the only form of communication between students. Students are often disinclined to engage further than instructed, leaving them feeling alone and frustrated if they have not fully understood the course content (Hagedorn et al., 2022).

Researchers are discovering that different types of technology foster different levels of sense of community (Hagedorn et al., 2022; Kondo et al., 2022). Additionally, the advancement of technology has enabled the creation of more interactive platforms that involve students more effectively in the learning process (Goncalves et al., 2020; Swickard, 2021). Regardless of remote educational offerings' economic advantages and usability, limited interactions and students' low sense of community are still significant disadvantages of these online learning environments (Turkay, 2022). One recent study examined the impact of different instructional modalities and their relationship to the psychological sense of community (Knott & Baker, 2022). The researchers sought to determine whether the psychological sense of community

contributed more, or differently, to the academic thriving of online students than it did to in-class students or students enrolled in hybrid programs. They concluded that there was no significant difference in the psychological sense of community between educational modalities; however, the psychological sense of community did become more critical when the greater proportion of the program was conducted online. Even with technological improvements that help overcome deficiencies in the sense of community, the careful cultivation of a sense of community becomes increasingly important when distance education is implemented. Knott and Baker's (2022) study highlight the importance of educational leaders knowing precisely what types of interactions compel a sense of community in the modern college student.

This body of literature regarding the source of students' sense of community primarily suggests, while the concept and importance of community in higher education appear to be firmly established, the strategies and approaches to building and fostering a sense of community have undergone development and change over time. The findings of these studies suggest that continued research is necessary regarding student's perceived sense of community in light of the changing dynamics of educational modalities, and on-campus interactions. The objective of the present study is to explore the connection between on-campus cultural event attendance and the perceived sense of community among students at a dual-mission university in the post-COVID era. The aim is to contribute to the existing literature by identifying which types of engagement are most strongly associated with fostering a sense of community among students.

Cultural Events – Higher Education

Most colleges and universities offer a variety of cultural events on campus, including lectures, musical and theatrical performances, and art exhibitions, as part of their regular program of activities (Tuten et al., 2020). Kuh (1995) described these cultural events as an

intrinsic constituent of the other curriculum. Although the research suggests on-campus cultural events contribute to institutional identity and student engagement, Tuten et al. (2020) notes the connection between these events and student outcomes have evaded the traditional modes of institutional assessment. The definition of cultural events as described by previous research incorporates a broad range of activities, including scholarly lectures, artistic performances, exhibition openings, concerts, and similar out-of-class events that involve the arts, sciences, and humanities (Tuten et al., 2015, 2020). This section will discuss cultural events in higher education, the extent of research involving specific event types, and the constructive impact of cultural event participation on student outcomes and its need for further exploration.

Guest lectures are among college students' most enriching experiences (C. A. Smith, 2016). Inviting guest speakers to campus can provide students with access to resources and knowledge to which they may not have otherwise been exposed. C. A. Smith (2016) found that introducing guest speakers to a university psychology class led to improved student engagement and better overall performance in the course. Additionally, guest lectures allow students to network with people outside of their college, which can benefit their future job prospects (C. A. Smith, 2016). Guest lectures can also help foster critical thinking skills and allow students to explore different perspectives on a given topic (Dalakas, 2016) as well as spark interest in a particular field of study. Shane (2022) suggested that by exposing students to professionals in their chosen field, they may become more interested in the subject matter and be motivated to pursue it further. This can lead to students developing a deeper understanding of the material and a passion for the subject.

Culturally diverse events can also benefit students (Green, 2016). These events provide a unique opportunity to experience different cultures and learn about the history and traditions of

other countries (Coleman et al., 2021). This can help students gain a better understanding of the world around them, as well as appreciate the diversity of cultures. It can also help promote cultural awareness and appreciation, benefiting students in navigating the world (Coleman et al., 2021). By attending these events, students can better understand different ways of life and how people from different cultures interact with each other. This can also foster an appreciation for cultural diversity and provide a unique and valuable learning experience (Bowen & Kisda, 2023; S. Brown, 2019; Urist, 2016).

Concerts and art exhibits can similarly provide students with a unique and enriching experience. Attending concerts and art exhibitions can spark creativity and provide students with the opportunity to engage with different forms of art (S. Brown, 2019; Tuten et al., 2015). Engaging in art, in its turn, can stimulate imagination and offer students a creative outlet, which can be beneficial for their mental health (Coleman et al., 2021). By exposing students to different forms of art, they can gain a better understanding of different cultures and develop an appreciation for the diversity of art around the world (S. Brown, 2019; Urist, 2016). This can help foster an appreciation for the different art forms and provide students with a valuable learning experience (Bowen & Kisda, 2023; S. Brown, 2019; Urist, 2016).

Research on cultural events as a sum of various event types, such as those noted above, and their effects on students is also evolving. After evaluating 360 student surveys on the effect of cultural event attendance, Tuten et al. (2015) revealed that approximately half of the participants experienced a noticeable effect regarding attitude formation, acquiring new knowledge, or prompting new behaviors or actions. Tuten et al. (2020) then continued this research by seeking to understand the perceived value and role of cultural event attendance, not just on students' experience but also on their education (Tuten et al., 2020). As the literature

becomes more specific, it becomes evident that non-excessive co-curricular activity is advantageous for student development (Bowman & Trolian, 2017). Cultural event attendance has been recognized as playing a positive role in shaping student attitudes and behaviors, specifically with reference to holistic, social, emotional, and personal growth (Tuten et al., 2015, 2020).

The study by Tuten et al. (2020) aimed to investigate the benefits and outcomes of on-campus cultural events for college students. The researchers utilized a mixed-methods approach, including a survey and focus groups, to gather data from students who attended cultural events at their university. The study found that these events positively impacted students' personal and academic development, social interaction, and engagement with the broader campus community. The authors recommended that higher education should prioritize on-campus cultural events and provide adequate resources to support their planning and execution.

While student engagement theories have previously described the positive correlation between co-curricular activity and student outcomes, the constructive impact of cultural event participation on various student outcomes has yet to be explored (Tuten et al., 2020). The literature is sparse regarding the effects of cultural event attendance on the college student experience and how it factors into their academic and holistic development. Although the existing literature regarding on-campus cultural events is necessary to consider, Tuten et al. (2015, 2020) noted it lacks a quantitative perspective. They suggest the specific consideration of additional student variables as outcomes of cultural event attendance needs further exploration (Tuten et al., 2020). Research also highlights the necessity of investigating the psychological effects of post-COVID student engagement levels (Benson & Whitson, 2022; Bozkurt et al., 2022; Morris & Kalliny, 2022). The present study addresses each of these by considering the disruptions the pandemic brought to higher education and on-campus events, and the lack of

literature on particular outcomes of cultural event attendance; the effects of post-COVID cultural event attendance require further inquiry.

Changing Landscape of Higher Education

This section discusses the aspect of the changing dynamics of the modern higher education model, such as system reform, rising tuition costs, student debt, time to degree completion, the shift to online learning, and declining enrollment numbers.

Systemic Change

Institutions are actively developing new strategies as they rethink higher education systems; to such an extent that the entirety of the undergraduate business model is shifting (Alexander et al., 2019; Macintosh, 2018; Pelletier et al., 2021, 2022, 2023). Traditionally, universities and community colleges have operated separately, with different markets and programs in mind. However, research has pointed out the unproductive nature of the current Carnegie classification, a system used since the 1970s that fails to work for some of the progressive approaches prevalent in higher education, today (Griffin, 2021). The worth and validity of these traditional higher education structures, roles, and systems are being questioned (Arnold, 2021; Brint, 2022).

Alternative methods to the traditional higher education system are being considered. The Community College Research Center (CCRC, 2021) of Columbia University conducted 25 years of research on college reform. They concluded a comprehensive overhaul of the entire college system is necessary. Their college reform model design, titled Guided Pathways, suggests cultivating reform models around affordability and reasonable time to degree completion. Bailey et al. (2015) also wrote of 10 alternatives to the current higher education system, some of those being micro-colleges, platform universities, and nomadic platforms, all of which, like the Guided

Pathways model, exhibit consideration of affordability and time to degree completion. Institutions of higher education must actively develop new strategies as they rethink how they should fulfill their mission (Pelletier et al., 2021, 2022, 2023). For productive community colleges and high-yielding, constructive paths to bachelor attainment, fundamental redesign is necessary (Bailey et al., 2015). If the assumption that traditional college pathways are changing is axiomatic among researchers, where students derive their sense of community will continue to change and, therefore, requires further examination.

Online Learning

Research has suggested that online learning is a great portion of the future of higher education (Palvia et al., 2018; Pelletier et al., 2021, 2022, 2023). Some higher education institutions have considered shifting a portion, if not all, of their teaching environments to online learning platforms (Peters et al., 2022; Saichaie, 2020). This shift to the online learning environment has been emphasized in light of the impact of COVID-19 (Pelletier et al., 2021, 2022, 2023). However, pre-pandemic research revealed that online enrollments in the U.S. had increased for fourteen consecutive years, irrespective of economic movement and deteriorating college enrollment numbers. The research also asserted that online education and virtual learning environments would become mainstream by 2025 (Palvia et al., 2018).

More students are turning to online programs, which is changing campus lifestyles, institutional efforts, and recruiting methods, and even resulting in fewer students on campuses than online (Government Accountability Office, 2022). Of the 200+ article submissions to the 2021 Horizon Report, a report designed to address the dialectic relationship of technology and education, 63 could be described as addressing the quality and problems of online learning (Pelletier et al., 2021). Many of these articles bring to light not only the aspects of productive

curricular deployment strategies but the social, emotional, and instructional considerations and needs now presented by the overwhelming use of online learning (Duong, 2021). Each Horizon Report published since, including the present year, expresses the same concerns (Pelletier et al., 2022, 2023).

Research suggests that online learning is not all positive (Aydin & Ozkan, 2020; Baran & AlZoubi, 2020; Curelaru et al., 2022; Xia et al., 2022). Hawkins (2020) termed one cost of using virtual educational environments as lost learning. Their comparative analysis of school engagement between 2019 and 2020 found that nearly one in four students is not showing up, for reasons unknown to educational leaders. Other research has shown a drop in academic achievement and highlighted some students were not maintaining their relative, or expected, position in test score distribution and academic performance (Aydin & Ozkan, 2020; Baran & AlZoubi, 2020; Curelaru et al., 2022; Xia et al., 2022). Beyond lost-learning, hybrid learning models come with other concerns, including cost, instructor/student receptiveness, addressing equity and inclusion, and risk (Duong, 2021; Garcia-Morales et al., 2021). Pelletier et al. (2021) expressed that although most concerns stem from the recent introduction and nascent adaptation of particular technologies, such as computer use and online learning/teaching, they are generally considered solvable.

Despite the prior-stated issues with online learning environments, the pros outweigh the cons. Educators and educational administrators are showing their alignment with this perspective by investing millions of dollars to install technology and develop hybrid learning tech packages for their schools (Pelletier et al., 2021, 2023). It is also foreseen that these hybrid learning models can increase accessibility and eventually lower the cost of education (Garcia-Morales et al., 2021; Pelletier et al., 2021, 2023). This focus on improving the quality of online learning and

hastening its adoption and extent of use will significantly impact higher education for years to come (Garcia-Morales et al., 2021; Pelletier et al., 2021, 2022, 2023).

Vitucci et al. (2021) agree that the expansion of online learning environments has opened up new opportunities for education and will remain a critical component of future education. However, they also suggest that it has created challenges for fostering a sense of belonging among students. Their research noted that online learning can be isolating, and students may feel disconnected from their peers, instructors, and the institution. Their research concluded that a sense of belonging is crucial to student success and well-being, and it is important to understand how to foster this sense of belonging in newly expanding educational environments. The present study suggests that by studying students' sense of belonging in various learning environments, specifically on-campus cultural event attendance, institutions can develop effective strategies to promote connection, community, and support for students in response to the changing landscape of higher education and widespread adoption of online learning.

Rising Cost and Declining Enrollment Numbers Compelling Change

The cost of university attendance has risen continuously for decades, precipitating what is often termed the student-debt crisis and bringing into question the value of higher education, in general (Arnold, 2021; Brint, 2022). Declining state subsidies and constrained revenue streams are forcing educational leaders to operate differently and find additional funding sources in this time of rapid change and financial instability (Arnold, 2021; Aspen Institute, 2017; NAS, 2020). A natural response to constrained revenue streams is to raise tuition prices (Arnold, 2021; Aspen Institute, 2017; NAS, 2020). The cost of tuition for higher education in the United States has increased 1,375% since 1978, and more than doubled in the 21st century alone, with an average growth rate of 7.1% (Arnold, 2021; Goldrick-Rab, 2016; Hanson, 2022; Pincus et al., 2017).

Hanson (2022) further noted that between 1980 and 2019, the average cost of tuition at a public four-year college increased by 221% in inflation-adjusted dollars, while the average cost of tuition at a private nonprofit four-year college increased by 146% in inflation-adjusted dollars. The author suggested these increases have far outpaced the rate of inflation and have possibly made higher education increasingly unaffordable for many students and their families.

Researchers have concluded that the rising cost of tuition is a major contributor to the growing student loan debt crisis in the United States (Snyder & Dillow, 2021). They cited that in 2019, the average student loan debt for graduates of a four-year college was over $30,000. Hanson (2021) also described the rising cost of tuition as a catalyst for increasing student loan debt. As of 2021, the average federal student loan debt is $36,510, and the average student borrows over $30,000 to pay their way through a bachelor's degree. Furthermore, the researcher declared student loan borrowers currently number around 45.3 million, and more than fifty percent still owe $20,000 in outstanding loan balances 20 years after entering college.

Research has noted that enrollment numbers are an indication of the evolving modality in higher education, as well as changing the on-campus experience (Alexander, 2020; Brint, 2022; Carpenter, 2019). Alexander (2020) claimed there was a significant chance that American higher education would experience a decline in numbers. Hanson (2022) described this decline by noting that undergraduate enrollment in the United States totaled 15.85 million in 2020, which since 2010 constituted a 4.31% decline YoY. Over the same decade, total enrollment declined 9.6%; spring 2022 enrollments fell to 16.2 million, a 14.7% decline from the 2020 fall semester. The author also noted that in 2010 enrollment peaked at 21.02 million. Since then, the number has continuously decreased, and enrollment rates among newly graduated high school students have declined by 5.29% YoY. Hanson (2022) concluded that the years 2010-2020 consisted of

the greatest enrollment decline rate since 1951. Declining enrollment statistics could indicate that Americans are foregoing traditional post-secondary educational paths (Alexander, 2020; Brint, 2022).

Carpenter (2019) argues that declining enrollment numbers are not only a financial and academic challenge for colleges and universities, but they are also changing the social and cultural aspects of the on-campus experience. For example, smaller student populations can lead to a reduction in extracurricular activities, student organizations, and opportunities for social engagement. Their research also noted that declining enrollment numbers are leading to changes in the way colleges and universities are structured and run, including a shift towards online education and changes in institutional priorities. The proposed study aids the discussion on these institutional priorities by determining the value of on-campus cultural event attendance to student's perceived sense of community.

Vitucci et al. (2021) argue that in today's rapidly changing higher education landscape, it is increasingly important to understand and address college students' sense of belonging. Their research concludes, with the rise of online education and the degree of institutional change occurring, it is more challenging than ever to create an environment that supports students' academic and personal growth. The authors suggest that institutions need to take deliberate steps to foster a sense of community and connectedness among students in light of changes in higher education. As such, the proposed research argues, studying students' sense of community can provide valuable insights into how to enhance the college experience and support student success in today's rapidly changing educational landscape. The proposed study seeks to extend the literature on cultural event attendance and students' sense of community considering these institutional changes.

The Dual-Mission University

One systemic approach to addressing many of the abovementioned issues currently affecting higher education is the dual-mission university (Carruth, 2019; Holland, 2018). The dual-mission model represents a merging of two-year community colleges and four-year universities (Bothwell, 2016; Carruth, 2019; Griffin, 2021; Holland, 2018; Lipka & Holland, 2016; Merisotis & Hauser, 2021). The dual-mission model was intended to expand educational opportunities while responding to the workforce and labor market needs (Carruth, 2019). Carruth (2019) described proponents of the dual-mission model as claiming that the model would reduce tuition costs and increase access to education. Bothwell (2016) admitted that the dual-mission approach is not for every university, but also framed the progressive dual-mission model as a way to resolve higher education's funding crisis and streamline the process of degree completion.

Carruth (2019) wrote of three colleges in Utah that have expanded their operations beyond traditional community college limitations: Utah Valley University, Weber State University, and Utah Tech University. All three universities were previously community colleges, and now incorporate programs and services traditionally provided only by regional universities. Holland (2018) assisted in defining the dual-mission approach by noting articulation agreements, dual-missions, and co-located degrees as some of the methods being explored. He then explained the dual-mission model of higher education as a reform that integrates the advanced instruction typically found at a teaching university with the practicality and vocational offerings of a community college.

Since the inception of the dual-mission concept in Utah, the three universities have grown tremendously. They now serve nearly 50% of all Utahns enrolled in Utah's System of Higher

Education (USHE), and account for 64% of total USHE enrollment growth since the year 2000 (USHE, 2019). Moreover, the dual-mission universities in Utah enrolled more non-traditional students (aged 25 and above) than all the community colleges, technical colleges, and research universities in the state (Carruth, 2019; Griffin, 2021). In a time when universities are increasing tuition costs and failing to meet enrollment goals, Utah's dual-mission approach has assisted in both reducing tuition costs and increasing enrollment numbers (Bothwell, 2016; Carruth, 2019; Griffin, 2021; Holland, 2018; Lipka & Holland, 2016).

After the popularization of the dual-mission approach in Utah, universities across the United States are beginning to operate in the same manner (Griffin, 2021; Holland, 2018). The dual-mission construct has seen a natural expansion in adoption as it meets the needs of many regions in the United States. As of 2022, there are institutions in Arkansas, Colorado, Florida, Georgia, North Dakota, Utah, and Wisconsin that fall under this dual-mission umbrella and even engage in summits with the Utah schools to improve their adherence to the approach that characterizes this burgeoning institutional type (Colorado Mountain College, 2022). Dr. Hauser, president of Colorado Mountain College, conveyed that her institution's dual-mission approach is one that offers a mix of certificates and two-year programs as well as four-year degrees—it merges the functions of a community college and a four-year institution for the sake of efficiency, consolidation, and the redefining of missions and delivery methods (Griffin, 2021). Despite its increasingly widespread success, there is still little research on this institutional framework. As such, the present study will utilize this developing institutional type as the setting for its research in the hopes of expanding upon the nascent literature in areas regarding dual-mission universities.

COVID-19

The Coronavirus Disease 2019 (COVID-19) pandemic has had an unprecedented global impact on public health, economics, social life, and politics (Flaxman et al., 2023; John Hopkins Coronavirus Resource Center, 2021; OECD, 2020; WHO, 2021). This virus, a novel strain of coronavirus, first appeared in Wuhan, China in late 2019, and has since spread to more than 200 countries (WHO, 2021; Xu et al., 2020). In this section, the timeline of the COVID-19 pandemic is discussed, followed by COVID's disruption of higher education and how the sense of community can be a protective factor against COVID effects.

COVID Timeline

The earliest documented case of COVID-19 was identified in Wuhan, China on December 8, 2019 (Xu et al., 2020). This was the first reported case in a cluster of illnesses later identified as a novel coronavirus. In the following weeks, more cases were identified in Wuhan, and the Chinese government implemented travel restrictions to contain the spread of the virus. On January 11, 2020, the World Health Organization (WHO) was notified of an outbreak of a novel coronavirus in Wuhan (WHO, 2020). The next day, Chinese authorities identified the novel coronavirus and named it SARS-CoV-2 (Huang et al., 2020). On January 20, 2020, the first reported case of COVID-19 outside of China was in Thailand (WHO, 2020).

On January 30, 2020, the WHO declared COVID-19 a public health emergency of international concern (WHO, 2020). This declaration signaled the beginning of the global pandemic. In the following weeks, more countries worldwide reported cases of COVID-19 and implemented travel restrictions to contain the spread of the virus. On March 11, 2020, the WHO declared COVID-19 a pandemic and issued guidance on how countries should respond (WHO, 2020). This marked a turning point in the pandemic, as governments around the world began to

implement various strategies to reduce the spread of the virus and its devastating effects (WHO, 2021). The pandemic has also had a significant economic impact, as global gross domestic product (GDP) was expected to decline by 4.4% in 2020 (International Monetary Fund, 2021).

Since first being reported, COVID-19 continued to have devastating effects, and only in May 2023 will major emergency statuses end in the United States (Pandemic is Over Act, 2023). As of May 2021, over 150 million COVID cases were reported, globally, with over 3 million deaths caused by the disease (Johns Hopkins Coronavirus Resource Center, 2021). As of February 2023, the Centers for Disease Control and Prevention (CDC, 2023) reported 1.1 million deaths in the United States from COVID-19. Although the virus remains a leading cause of death in the United States, its threat has lessened since the height of the pandemic during 2020-2022 (Flaxman et al., 2023). Therefore, beginning May 2023, the United States no longer classified the COVID-19 pandemic as a public health emergency, initially declared in January 2020 (Pandemic is Over Act, 2023). The COVID pandemic has greatly impacted the world and will continue to do so for some time, perhaps indefinitely (Flaxman et al., 2023; John Hopkins Coronavirus Resource Center, 2021; WHO, 2021).

Thus far, the term post-COVID in higher education research has been used to describe students and educators from the 2021-2022 and 2022-2023 school years, when vaccines were more readily available and pressure to return to face-to-face operations existed (S. L. Smith et al., 2023). In research by Garcia-Morales et al. (2021), the 2021 time period was referred to as the current pandemic crisis. In a report on the status of higher education, Pelletier et al. (2022) marked the 2022 school year as two years into the COVID-19 pandemic, and noted educational shifts and trends were still evolving under these extraordinary circumstances. The 2023 Educause Horizon Report, which profiles key trends and practices that are shaping the future of

higher education, mentions COVID and its relative effects 26 times in its most recent report (Pelletier et al., 2023). Some higher education researchers have elected post-COVID as anything beyond the critical period of COVID-19, or the years 2019-2021 (Deroncele-Acosta et al., 2023). Furthermore, researchers have recognized the importance of crisis impact reporting beyond immediate effects (Farazmand, 2017), as well as the importance of post-COVID research (Farazmand, 2017; Guppy et al., 2022). Guppy et al. (2022) noted, as post-pandemic institutional plans continue developing, it is essential to consider the experiences and insights of instructors, students, and instructional designers to ensure success in this post-COVID era. Considering how the term post-COVID is currently used in educational research, the U.S. governmental observation of the pandemic ending in 2023, and the drastic effects the pandemic has had on both event and university attendance, the present study regards the post-COVID era as a valuable consideration for this research. The present study will continue this generalization by considering the 2023 school year as a post-COVID examination.

COVID: Effects on Higher Education and Campus Attendance

The impact of the COVID-19 pandemic on higher education has been extensive and complex. Researchers have observed the drastic changes colleges and universities across the globe have made to their operations, such as transitioning to virtual learning, and the mitigation of on-campus interaction, to protect the health and safety of students and faculty (Benson & Whitson, 2022; Hess & McShane, 2022; OECD, 2020; Pelletier et al., 2021, 2022, 2023; Son et al., 2020). This transition has significantly affected the academic, social, and financial aspects of higher education (Azzam, 2020; Baker & Davis, 2021; Hess & McShane, 2022; Mok, 2022; NAS, 2020; OECD, 2020; Son et al., 2020; Velásquez-Rojas, 2022).

Academically, the pandemic has impacted higher education in numerous ways (Hess & McShane, 2022; OECD, 2020). Many colleges and universities had to reduce the number of courses offered, cut back on faculty and staff, and move to an online-only format (Azzam, 2020; Hess & McShane, 2022; OECD, 2020). Researchers concluded that this pedagogical shift led to a decrease in the quality of education, student engagement, and retention (Hess & McShane, 2022; Mok, 2022; OECD, 2020). Furthermore, many students experienced delays in completing their degrees due to the campus closures and halted educational resources caused by the pandemic (Velásquez-Rojas, 2022). It is these resources, like on-campus event attendance and co-curricular student engagement, which the present study seeks to address.

Socially, the pandemic had a major impact on higher education. The shift to online learning decreased student interaction and socialization, which is a critical component of the college experience (Altinay et al., 2021; Baker & Davis, 2021). Additionally, the lack of physical interaction made it difficult for students to form meaningful relationships with their peers and faculty (Azzam, 2020). This resulted in feelings of isolation and loneliness for many students, which can have a negative impact on their mental health (Mok, 2022).

On campus event attendance and student engagement were impacted by the pandemic. A study by Altinay et al. (2021) examined the impact of the COVID-19 pandemic on event attendance and engagement in higher education using a case study approach. The study found that the pandemic significantly affected the attendance and engagement levels of students in events organized by higher education institutions. The study also identified several factors that influenced the students' decisions to attend events during the pandemic, such as safety concerns, relevance, and format. The authors recommended that higher education institutions adapt to the changing circumstances caused by the pandemic by employing innovative strategies to maintain

student engagement and attendance in events. Additionally, they suggested that institutions should consider the potentially long-lasting effects of the pandemic on the higher education community, particularly on event attendance. The present study is mindful of these suggestions and aims to assist higher education institutions in adapting to pandemic-related changes and identifying effective strategies to improve student engagement by examining the impact of cultural event attendance on students' sense of community in a post-COVID context.

Financially, the pandemic had a significant impact on higher education. Many colleges and universities experienced a decrease in enrollment due to the pandemic's disruption, which reduced tuition revenue (Velásquez-Rojas, 2022). Additionally, many schools had to reduce their budgets due to the decrease in enrollment, which has had a negative effect on the quality of education (Baker & Davis, 2021; NAS, 2020).

In whatever complex state higher education existed before COVID-19, the pandemic disrupted that state, exacerbated its flaws, and accelerated its destabilization (Hess & McShane, 2022; NAS, 2020; OECD, 2020; Son et al., 2020). The exact impact COVID-19 had on the trajectory of higher education remains unknown (Bozkurt et al., 2022; Hess & McShane, 2022; Morris & Kalliny, 2022; Wangenge-Ouma & Kupe, 2022). However, common themes have emerged from post-COVID research, including declining enrollment numbers, an increase in online education, and shifting infrastructure investment (Bozkurt et al., 2022; Hess & McShane, 2022; Morris & Kalliny, 2022).

Multiple studies indicate the negative impact COVID-19 has had specifically on college students (Benson & Whitson, 2022; Garcia-Morales et al., 2021; Sintema, 2020; Son et al., 2020). Sintema (2020) hypothesized that COVID-19 would negatively impact student performance, that quality of education would decrease, and that the student pass-percentage

would drop. Research has validated this prediction (Benson & Whitson, 2022; Garcia-Morales et al., 2021; Son et al., 2020). Research considering the university condition noted that the pandemic generally caused students to experience an increase in negative emotional states, such as fear, anxiety, and stress (Benson & Whitson, 2022; Umuru & Lee, 2020). COVID-19 has significantly influenced student lifestyle, health, and academic outcomes (Son et al., 2020).

The COVID-19 pandemic has transformed the educational landscape (Hess & McShane, 2022; Pelletier et al., 2021, 2022, 2023). Because of the pandemic, school doors were closed, tests were not taken, the typical in-classroom instructive model was placed on indefinite hiatus, and the capacities of online learning were profoundly tested (Benson & Whitson, 2022; Pelletier et al., 2021; Son et al., 2020). The COVID-19 pandemic necessitated rapid and forced innovation, including digital transformation and increased online education (Benson & Whitson, 2022; Pelletier et al., 2021, 2022, 2023). History has demonstrated that crises reshape society, and the impact of the COVID-19 pandemic on educational services has been vast (Kang, 2021; OECD, 2020).

Sense of Community – A Protective Factor Against COVID Disruptions

Students' social interactions and sense of community have been disrupted by the tumultuous changes in higher education brought on by COVID-19 (Benson & Whitson, 2022; Son et al., 2020). However, protective factors can negate adverse outcomes (Loukas et al., 2006). One protective factor in higher education is a student's sense of community within their school (Benson & Whitson, 2022; McNally et al., 2021; Sharma et al., 2020).

Having a sense of community is especially important during times of disruption, as it can help to provide a sense of stability and support for students. According to a study by Procentese et al. (2020), a sense of community is associated with a range of positive outcomes, such as

increased academic performance, mental health, and resilience. Furthermore, a sense of community is also associated with decreased levels of stress, anxiety, and depression. These findings suggest that a sense of community can help students to cope with the disruptions caused by the pandemic, such as changes to their learning environment and academic workloads.

In addition to its protective effects, a sense of community can also help increase students' engagement with their educational experiences. As noted by W. Brown (2021), a sense of community can create a more meaningful learning environment, as it allows for students to interact and collaborate with their peers. This can help build students' motivation and engagement, leading to increased academic performance. Additionally, a sense of community can reduce the isolation that many students may be feeling during the pandemic, as it allows them to connect with their peers and build relationships (Mannarini et al., 2022).

Given its protective effects, educational institutions need to focus on creating a sense of community for their students during the pandemic. According to Heidari et al. (2021), the use of online forums and other virtual communication tools can help create a sense of community among students. Furthermore, providing students with the opportunity to connect in meaningful ways, such as through discussion groups and collaborative activities, can foster a sense of community. Additionally, educational institutions should focus on creating a supportive environment for their students, which can help build a sense of community.

Benson and Whitson (2022) posited that a stronger sense of community at a university would have an inverse correlation with the amount of perceived stress and COVID-19–related disruptions to daily life. They concluded that students with a greater sense of community would experience lower levels of perceived stress, and that sense of community plays a significant role as a protective factor for students. The authors noted that as a sense of community increased,

disruptions to the daily life of college students also appeared to lessen. Ultimately, they concluded that having a sense of belonging to a community may be a key factor in helping college students get through the consequences of the COVID-19 pandemic and strengthen their resilience.

In light of these challenges, and post-pandemic circumstance, there is a pressing need to study students' sense of belonging to understand how to support their academic and personal growth. The presented literature has addressed higher education's situation in lieu of COVID-19. The literature has also suggested protective factors against adverse effects, such as students' sense of belonging. What lacks examination is the degree to which specific variables contribute to students' sense of community in a post-COVID era. The objective of the proposed study is to fill a void by examining how much cultural event participation impacts students' sense of community, in the aftermath of a period when attendance at such gatherings was not possible. By understanding the factors that contribute to students' sense of belonging, institutions can develop strategies to promote connection, community, and support for students amidst these post-pandemic changes.

Summary

This chapter examined the three theories that provide the conceptual framework for this research paper: Astin's (1984, 1999) theory of student involvement, Kuh's (1995) other curriculum, and McMillan and Chavis' (1986) Sense of Community Theory. The core consideration of Astin's (1984) theory are the amount of time and the degree of effort a student invests on their journey through higher education. Kuh (1995) concluded that there are many benefits students derive from out-of-class experiences, including benefits to their critical thinking, relational, and organizational skills, as well as other attributes highly correlated with

post-college satisfaction and success. McMillan and Chavis' (1986) Sense of Community Theory described the dynamics of the sense of community force, identified four critical elements of the sense of community (membership, influence, integration, fulfillment), and described the process by which these elements work together to produce the sense of community experience.

Beyond presenting this theoretical triumvirate, the chapter also introduced the literature regarding on-campus cultural events, the changing landscape of higher education, the dual mission university, COVID-19's disruption of higher education, and the protective factor that the sense of community can provide against post-COVID psychological effects. The research presented in this chapter conveyed the reasoning by which the variables examined by the present study were chosen, looking at cultural events (predictor variable), and students' perceived sense of community (criterion variable). In summary, the examination of the existing research demonstrates a gap in the current understanding of how the post-COVID sense of community of students at a dual-mission university may be affected by cultural event attendance—a gap the present study seeks to address.

CHAPTER THREE: METHODS

Overview

The contents of this chapter explain the methods utilized in this non-experimental, predictive correlational research ascertaining the relationship between cultural event attendance frequency (predictor variable) and the sense of community (criterion variable) of undergraduate students at a dual-mission university, post-COVID. Herein the design type, research question, hypothesis, participants, setting, instrument, procedures, and methods of data analysis are discussed.

Design

This research study employed a quantitative, non-experimental predictive correlational design. Justification for this design type was found in the purpose and definition of predictive correlation, the limited control over the variables involved in this study, and the variable type. Predictive correlational research is a type of research design that examines the relationship between two or more variables, specifically the predictive variance, and makes predictions based on that relationship (Creswell & Guetterman, 2019; Gall et al., 2007). Predictive correlation was the aim of this study and is defined as using the variability of one or more variables to forecast or anticipate the variability of another variable (Driessnack et al., 2007). Creswell and Guetterman (2019) have emphasized that correlational research does not imply causation but acknowledges the patterns and trends found within data, the strength and relationship between the considered variables. The present research sought to understand the predictive relationship between students' cultural event attendance and their sense of campus community. This research does not imply that cultural event attendance causes a sense of community but rather acknowledges the

patterns and trends that exist within the data regarding cultural event attendance and a student's sense of community.

Correlational predictive research is non-experimental. Unlike experimental research, variables are not manipulated in any way but observed as they exist naturally (Creswell & Guetterman, 2019; Privitera & Ahlgrim-Delzell, 2019). In this non-experimental study, variables were observed without any researcher exploitation or intervention, conforming to the standards of a correlational research design. Limitations of this design type included the potential influence of confounding/extraneous variables that could dissimulate or misrepresent the relationship between the study's variables, unknown to the researcher (Creswell & Guetterman, 2019; Privitera & Ahlgrim-Delzell, 2019). Therefore, non-experimental correlational design type was used to answer the following research question regarding multiple variables, "How accurately can a sense of community be predicted from cultural event attendance for undergraduates at a dual-mission university, post-COVID?"

The predictor and criterion variables were defined as follows. The predictor variable was undergraduates cultural event attendance frequency post-COVID. Cultural events were defined as lectures, musical and theatrical performances, discussion panels, concerts, and other non-sport cultural events (Tuten et al., 2015, 2020). The criterion variable was the sense of community. A sense of community is a feeling of belonging that members of a group have, a feeling that members matter to each other, and a shared belief that members' needs will be met through a commitment to be together (McMillan & Chavis, 1986). Sense of community was measured with the Sense of Community Index-2 Scale (SCI-2) as designed by Chavis et al. (2008).

Research Question

RQ1: How accurately can a sense of community be predicted from cultural event attendance for undergraduates at a dual-mission university, post-COVID?

Hypothesis

The null hypothesis for this study is:

H$_0$1: There is no statistically significant predictive relationship between the *sense of community*, as measured by the Sense of Community Index-2, and the *cultural event attendance* for undergraduate students at a dual-mission university, post-COVID.

Participants and Setting

The participants for the study were drawn from a convenience sample of undergraduate students located at a dual-mission university in the western United States during the summer semester of the 2022-2023 academic year.

Population

The following describes the population and demographic makeup of the dual-mission university where the population was sampled. Numbers were extracted from the National Center for Education Statistics (2022) with published data from the Fall 2021 semester. Total enrollment reached 41,262 students, and undergraduate enrollment was 40,542 students. Forty-six percent of all enrolled students were studying full-time, while the remaining 54% were part-time students. The gender makeup of the student population was 51% male and 49% female. The undergraduate students' race/ethnicities were as follows: White, 79%; Asian, 1%; Black or African American, 1%; Hispanic/Latino, 12%; Native Hawaiian, 1%; Two or more races, 4%; Unknown, 1%; and Non-resident alien 1%. Undergraduate student age was 80% under twenty-four years of age, and the remaining 20% were twenty-five years of age or older. Undergraduate

student residence was comprised of 83% in-state, 15% out-of-state, and 2% unknown. The undergraduate distance education status was 18% enrolled only in distance education, 38% enrolled in some distance education, and 43% not enrolled in any distance education. Of the undergraduate certificates offered, the majority are business, computer science, or general education related.

Participants

For this study, the number of participants sampled was 84 ($N \geq 84$). R. Warner (2013) recommends a sample size of at least 66 cases ($N \geq 66$) for a bivariate linear regression based on a combination of factors such as power, precision, and generalizability. The author explained that a sample size of 66 provides a good balance between statistical power and practical feasibility. With a sample size of 66, a researcher can reasonably expect to achieve a power of at least 80% to detect a moderate effect size (r = .30) with a two-tailed significance level of .05, assuming other assumptions of the bivariate linear regression model are met. A sample size of 66 is large enough to provide adequate precision in estimating the regression coefficients, standard errors, and confidence intervals, increasing the results' generalizability. This study's sample size ($N \geq 84$) adequately meets the minimum requirements of $N \geq 66$ as stipulated by R. Warner (2013), and, according to Gall et al. (2007), exceeded the required minimum assuming the effect size with a statistical power of .7 at the .05 alpha level. Furthermore, this number of participants, according to Jenkins (2020), meets the minimum required $N > 25$ for problem avoidance in regression models. The sample came from the undergraduate population at a large dual-mission university in the western United States. Students were selected through a convenience sampling method and canvassing efforts throughout various campus locations, hallways, entrances, cafeteria, bookstore, and student center.

Setting

      This research took place at a large dual-mission university in the western United States during the summer semester of the 2022-2023 school year. The university is state appropriated and part of the region's system of higher education. This institution is the largest university in the state by student population. The school is a four-year university (baccalaureate college), according to the traditional Carnegie classification system (Carnegie Foundation, 2021). However, it is most often referred to as a dual-mission university (Bothwell, 2016; Carruth, 2019; Griffin, 2021; Holland, 2018; Lipka & Holland, 2016). A dual-mission university is an institution type that combines the teaching of a university with the openness of a community college, the merging of a community college, and a four-year institution (Griffin, 2021; Holland, 2018).

<div align="center">

Instrumentation

</div>

      This research employed the Sense of Community Index-2 (SCI-2; See Appendix C). The purpose of this instrument, ascribed by Chavis et al. (2008), is to measure one's perception of a sense of community as defined by the degree of the following elements: membership, influence, meeting needs, and shared emotional connection. A sense of community is underpinned by group cohesiveness, is a feeling of membership and belonging, and a sense of worth derived from being part of a group/community (McMillan & Chavis, 1986). The purpose of using SCI-2 in this study was to assess the level of sense of community among undergraduate students in a dual-mission university. In other words, the present study used SCI-2 to measure how much undergraduate students feel connected and engaged within their university community.

      The Sense of Community Index-2 (SCI-2) is grounded in the Sense of Community Theory, has evolved from the Sense of Community Profile, and has undergone multiple

adaptations before reaching its current form (Chavis et al., 2008; Chavis & Pretty, 1999;

McMillan & Chavis, 1986). The original construct consisted of forty-four items before becoming

The Sense of Community Index (SCI) in 1986, which consisted of merely twelve questions

(Chavis et al., 2008; McMillan & Chavis, 1986). Peterson et al. (2006) assessed the SCI as a

methodological artifact, and the comparison of SCI and various method factors, in this case, the

words being used, resulted in suggested alterations. Furthermore, regardless of its use amongst

various cultural groups, critics also questioned the instrument's adequacy as a cross-cultural

measure (Peterson et al., 2006). Researchers originally demonstrated the instrument's overall

reliability with an alpha coefficient of 0.97; however, the instrument's subscales were less

reliable, inconsistent, and generally resulted in low reliability scores between 0.16 and 0.72

(Chavis et al., 2008; Chipuer & Pretty, 1999; Peterson et al., 2006). Researchers determined the

mitigation of negatively worded items, and the addition of positively worded items, could

increase instrument reliability. With these adaptations, the SCI became SCI-2 as it is known

today (Chavis et al., 2008; Peterson et al., 2006). The changes in SCI-2 allowed for greater

reliability in the instrument's subscales (see below) and, unlike previous versions, covered all

attributes of a sense of community as described in the original theory.

In social science research, the Sense of Community Index-2 is the most frequently used

quantitative measure of a sense of community (Chavis et al., 2008). Research highlights the

important function that SCI and its adaptations have played in defining the concepts of

community, how they are operationalized and enacted upon in practice, as well as the role it has

played in shaping community research in higher education (Trespalacios et al., 2021). McGee

and Tashakkori (2021) used the SCI-2 to investigate the levels of a sense of community and its

correlation within a STEM learning group during the COVID-19 pandemic. The SCI-2 assisted

in providing evidence regarding the important support system this particular STEM learning community was for students during the unprecedented uncertainty in higher education caused by the pandemic. Furthermore, the instrument is increasingly being used to determine the sense of community in new and evolving educational environments such as online learning and distance education programs (Cornell et al., 2019; Skelcher et al., 2020; Trespalacios et al., 2021).

The Sense of Community Index-2 has been utilized in higher education not only to measure students' perceived sense of community but also to examine the sense of community among staff, faculty, administrators, and auxiliary groups, including college athletes, intramural sports leagues, and student recreation programs (Ferencz, 2017; Jones & Davenport, 2019; Phipps et al., 2015; Webber et al., 2013; Woo, 2020). The instrument's extensive employment as a tool in higher education research credit its usefulness for this present non-experimental, predictive correlational design, ascertaining the relationship between post-COVID cultural event attendance frequency (the predictor variable) and undergraduate students' sense of community (the criterion variable).

The Sense of Community Index-2 has been proven valid and reliable for the purpose of the current research (Chavis et al., 2008; Peterson et al., 2006). According to Chavis et al. (2008) and Penland (2017), SCI-2 criterion-related validity has been proven with the instrument's correlation to life satisfaction at 0.320, social and community participation at 0.381, and civic participation at 0.315 with $p \leq 0.01$ for each correlation coefficient. Convergent validity of the SCI-2 was examined by comparison to other community involvement measures, the Inclusion of Community in Self Scale (ICSS) and the Community Attachment Scale (CAS). Chavis et al. (2008) found significant correlations (> 0.04) between these measures and the SCI-2. Furthermore, discriminant validity of the instrument was examined by comparing it to measures

of social support, loneliness, and individualism-collectivism. They found that while the SCI-2 was positively correlated with social support, it was negatively correlated with loneliness and individualism-collectivism, suggesting that the SCI-2 was measuring a distinct construct from these other variables.

The instrument proved strongly reliable with a Chronbach's coefficient alpha score of 0.94 (Chavis et al., 2008; Han et al., 2022). For precisely measuring the sense of community, the instrument utilizes four subscales, each of which has proved to be reliable according to the following definitions and scores: The first, membership (0.79), is the measurement of one's feeling of belonging within a specific parameter or boundary; a boundary, which if in, provides emotional validation and group recognition. The second, needs (0.83), measures the degree to which one's needs are being fulfilled by belonging to and interacting with a specific group or community. The third, influence (0.83), measures the degree to which a dialectic influence is believed to exist between the community or group and its members. The fourth measured element of the SCI-2 instrument is shared emotional connection (0.86), which is the measurement of the belief that members of a community have shared and will continue to share history, commonalities, and similar experiences (Chavis et al., 2008; Peterson et al., 2006).

Currently, the instrument is a questionnaire built around 24 items on a four-point Likert scale, as follows: 0 = Not at all; 1 = Somewhat, 2 = Mostly, 3 = Completely. Scores range from 0 to 72 as summed from all possible answers with 0 indicating little or no sense of community, and 72 implying a strong sense of community (Chavis et al., 2008). Instrument administration procedures consist of obtaining informed consent from participants, distributing the SCI-2, instructing participants, allowing participants time to complete the instrument, collecting the completed questionnaires, and thanking participants for their participation. See Appendix D for

complete administration procedures. The instrument creators have noted that the self-report questionnaire should take roughly 10 minutes to complete after providing participants with a brief overview regarding purpose and response marking instructions (Chavis et al., 2008). Although they did not provide explicit suggestions or restrictions on who can administer the SCI-2, they did recommend that researchers follow established guidelines for survey research that would protect participants, ensure survey accuracy, and minimize potential sources of bias. Regarding the present study, the researcher administered the instrument and then manually reviewed and tallied all completed responses by hand. See Appendix C for the instrument and Appendix B for permission to use and distribute the instrument.

<div align="center">**Procedures**</div>

Liberty University Institutional Review Board approval was granted for this research on 07-26-2023 (See Appendix G). Prior to study performance, institutional site permission was granted where the research was performed. Both Event Services and The Office of General Counsel of that university were notified of this research. On 02-21-2023, permission was granted by multiple educational leaders from that university (See Appendix A).

The following describes information on the elicitation of participants and procedures for this present study. Prior to solicitation the researcher developed a clear and concise study description, including its purpose, procedures, risks, benefits, and incentives. This was used to both inform the participant as well as gain consent. See Appendix E for the consent form which all participants had access to before and after survey completion. No assistant or other persons participated in the solicitation or data acquisition and review process other than the primary researcher. Participants were not directly compensated for participating in this study. However, as an incentive, participants could voluntarily enter a drawing for a $50 university bookstore gift

card by placing their name and email into a jar. The information they provided was not linked to their anonymous research responses. Incentives were sponsored by the researcher to mitigate conflict of interests and in accordance with site policies.

Random convenience sampling took place by way of on campus face-to-face solicitation over a period of two-weeks. Wilson et al. (2013) found that student centers and entrances to busy hallways were productive recruitment sites which can potentially yield a diverse sampling of participants when using random sampling methods on a university campus. Therefore, visible and accessible locations were chosen, such as entrances to busy hallways and the student center at the dual-mission university where the research took place. Flyer distribution in common campus areas occurred during the time of solicitation for reasons of promotion. Although the time required to collect data using convenience sampling in educational research varies on several methodological factors, Niedermeier and Stelzer's (2019) research on convenience sampling methods report that data collected from 320 university students took two weeks. Since the minimum sample size for this research was at least 66 cases ($N \geq 66$), it was assumed that an adequate amount of data collection would take place within a period of two weeks.

The research was presented to the population and elicited from willing participants in the following manner. The researcher met the target population along with research material (table, consent forms, questionnaires, and research information). As suggested by Creswell (2014), potential participants were approached by the researcher who then briefly explained the purpose of the study, introduced incentives, and emphasized that participation is voluntary. Data was collected using handwritten responses from participants. Researchers have determined that face-to-face surveys produced fewer biases and responses with less variation compared to those conducted online. (Norman et al., 2010). Therefore, upon study acceptance, participants were

given a clipboard, a pencil with an eraser, and all information necessary to complete the survey, as required. The survey consisted of three parts: an information/consent form (See Appendix E), a self-report questionnaire indicating how many on-campus cultural events are attended in a typical semester (See Appendix F), and the Sense of Community Index-2 (SCI-2; See Appendix C). The study participants received information on the definitions of cultural events and a sense of community, as well as the researcher's availability to answer any questions they may have while completing the survey.

Data security and participant privacy were considered during this research as suggested by Gall et al. (2007). Original survey content is stored in a secure location only available to the researcher. All information that could identify the participants is protected. After transferring the original content into digital spreadsheets for analysis, the data was securely stored on a password-protected drive, available only to the researcher. When applying data for statistical analysis, coding methods were used, and participant responses were identified with numbers. The original survey content was completed anonymously and possessed no participant identifiers. The researcher, alone, had access to the data and records during and after the study. The researcher will keep the data for three years.

Data Analysis

The data was analyzed using bivariate linear regression. When a study uses a single criterion variable and a single predictor variable to examine a predictive relationship, researchers have suggested using bivariate linear regression, with the variables measured on a continuous scale (Field, 2013; Gall et al., 2007; R. Warner, 2013). Through such a design, the predictor variable's relative influence on the criterion value may be discovered in the statistical significance and magnitude of the relationship (Field, 2013). The simple linear regression

analysis assessed the relationship between two continuous variables, cultural event attendance and sense of community, as measured by the Sense of Community Index-2. The study determined whether the linear regression between these variables was statistically significant and determined what variation in the dependent variable (sense of community) can be explained by the independent variable (cultural event attendance). Microsoft Statistical Package for the Social Sciences (SPSS) was utilized for conducting the analysis and determining the relationship significance between the dependent variable (sense of community) and the independent variable (cultural event attendance).

Data analysis began by conducting data screening. This involved examining the data to identify errors and/or anomalies that could have affected the validity of the analysis, and, according to R. Warner (2013), includes checking for missing values, outliers, and other data quality issues. Incomplete surveys were eliminated from the research, followed by the examination of box and whisker plots for the identification of extreme outliers. The analysis of descriptive statistics then occurred, and consequently, the mean, median, mode, and standard deviation were reported (see table 1).

This research then incorporated multiple assumption tests. First, the assumption of linear relationship between variables was used. For this assumption, scatterplots were utilized to determine if a linear relationship existed between the dependent and independent variables (see Figure 1). R. Warner (2013) suggests the visual inspection of scatterplots is a critical step in determining whether linear regression is an appropriate analysis, and is useful for detecting patterns, trends, and outliers in the data.

Second, the assumption of independence of observations occurred. For this assumption, the Durbin-Watson statistic was utilized to examine the independence of the observations,

known as 1st-order autocorrelation (see Table 2). This assumption required that the values of the variables not be related based on the Durbin-Watson statistic outcome between 0-4 (R. Warner, 2013). The research suggests that if the statistic is different from 2, then violations of the assumption occur, and errors of the regression coefficients may be too large/small leading to overly wide confidence intervals and reduced power.

The third test was the assumption of no significant outliers. A visual inspection of a scatterplot (see Figure 1) and casewise diagnostics was used to identify outliers that may have had a disproportionate impact on the regression results. R. Warner (2013) notes that observations in any case where the residual is greater than ±3 will require further examination. Furthermore, careful consideration was made to either keep or remove the outliers from the data set, knowing that either decision would potentially impact the regression results.

Fourth, the assumption of homoscedasticity of residuals was used. This involved visually inspecting plots of the residuals against predicted values to determine variance. R. Warner (2013) instructed that heteroscedasticity can lead to biased and inefficient estimates of the regression coefficients, making it difficult to determine the true relationship between the predictor and criterion variable. However, after visual inspection the research asserted consistent variance between the residuals and the predicted values, giving this study greater assurance in the validity and reliability of the regression results.

The fifth and final test was the assumption of normal distribution of residuals. A Normal P-P Plot was used to determine if the residuals were normally distributed. According to R. Warner (2013), if a normal distribution occurs, the points of residuals will follow a straight line. Adversely, if the residuals deviate from normality, a deviation from a straight line will occur. If the residuals are not normally distributed, it may indicate that this model does not adequately

capture the underlying relationship between the dependent and independent variables. However, the residuals were found to be normally distributed (see Figure 3).

The criterion and predictor variable were set in SPSS and multiple output tables were produced. The first was the goodness of fit test, or rather, the model summary (see Table 2) which effectuates an R^2, the coefficient of determination. The coefficient of determination (R^2) discloses the percentage of criterion variability within the regression model to explain the output, sense of community (R. Warner, 2013). Following the model summary there was a subsequent ANOVA (see Table 3), which determined the statistical significance of the regression model. The regression output (see Table 4) formed the last table which revealed the statistical significance of the independent variable's (cultural event attendance) ability to affect the output (sense of community; R. Warner, 2013). The summation of these three regression output tables bore attestation for rejecting, or failing to reject, the null hypothesis.

The relationship between the criterion (sense of community) and predictor (cultural event attendance) variables was determined by correlation coefficient R (Gall et al., 2007; R. Warner, 2013). R. Warner (2013) explained that the effect size is specified by the coefficient of determination R^2; which represented the proportion of variance in the dependent variable that can be explained by the independent variable in this present study. Furthermore, an R^2 value of 0 means that the dependent variable cannot be explained by the independent variable, while an R^2 value of 1 means that the dependent variable is completely explained by the independent variable. A positive or negative relationship was then established between the criterion and predictor variables. Statistical significance was assumed at $p < 0.05$. Thus, the null hypothesis was to be rejected, or failed to reject, at the 95% confidence levels ($\alpha = 0.05$).

CHAPTER FOUR: FINDINGS

Overview

The purpose of this quantitative predictive correlational research was to determine how accurately cultural event attendance (predictor variable) can predict undergraduate students' sense of community (criterion variable) at a dual-mission university post-COVID. This chapter includes the research question, the related null hypothesis, the data screening, the assumptions testing, the descriptive statistics the variables were subjected to, and the results of the statistical analysis. The statistical analysis included a bivariate linear regression using data from students' self-reported cultural event attendance and the Sense of Community Index-2 (SCI-2; See Appendix C).

Research Question

The research question for this study was:

RQ1: How accurately can a sense of community be predicted from cultural event attendance for undergraduates at a dual-mission university, post-COVID?

Null Hypothesis

The null hypothesis for this study was:

$H_0 1$: There is no statistically significant predictive relationship between the sense of community, as measured by the Sense of Community Index-2, and the cultural event attendance for undergraduate students at a dual-mission university, post-COVID.

Descriptive Statistics

The present study examined the predictive correlation between cultural event attendance (predictor variable) and student's sense of community (criterion variable). The data consisted of 91 handwritten responses collected via random convenience sampling and face-to-face

solicitation. Participants were selected from the undergraduate population of a large dual-mission university in the western United States. Data was derived from a self-report questionnaire indicating how many on-campus cultural events students attended in a typical semester (See Appendix F), and the Sense of Community Index-2 (SCI-2; See Appendix C). Of the 91 participant responses collected, only 84 ($n = 84$) were used for data analysis due to seven of the surveys being found incomplete. Table 1 displays the descriptive statistics. The mean SCI-2 score was 39.8 ($SD = 14.0$). The SCI-2 scores ranged from a minimum 0 to a maximum 72. The mean cultural event attendance per semester was 4.1 ($SD = 2.5$). The event attendance ranged from a minimum of 0 to a maximum of 10.

Table 1

Descriptive Statistics – SCI-2 & Cultural Event Attendance per Semester

Variable	n	M	SD	SE_m	Min	Max
SCI-2	84	39.83	14.04	1.53	0	72
Cul-Event-Att	84	4.19	2.529	.27	0	10

Results

Data Screening

Data screening was conducted on both the predictor and the criterion variable to identify any errors and/or anomalies that may have affected the validity of the analysis (Gall et al., 2007; R. Warner, 2013). The variables were examined to identify extreme outliers by using a scatter plot. No data errors or inconsistencies were identified; therefore, no data were excluded.

Assumption Testing

Prior to the linear regression analysis, this research incorporated multiple assumption tests. First, the assumption of linear relationship between variables. For this assumption,

scatterplots were used to determine that a linear relationship existed between the dependent and independent variables. A scatterplot of students' sense of community against cultural event attendance was plotted. Visual inspection of this scatterplot indicated a linear relationship between the variables (See Figure 1).

Figure 1

Scatterplot – SCI-2 & Cultural Event Attendance per Semester
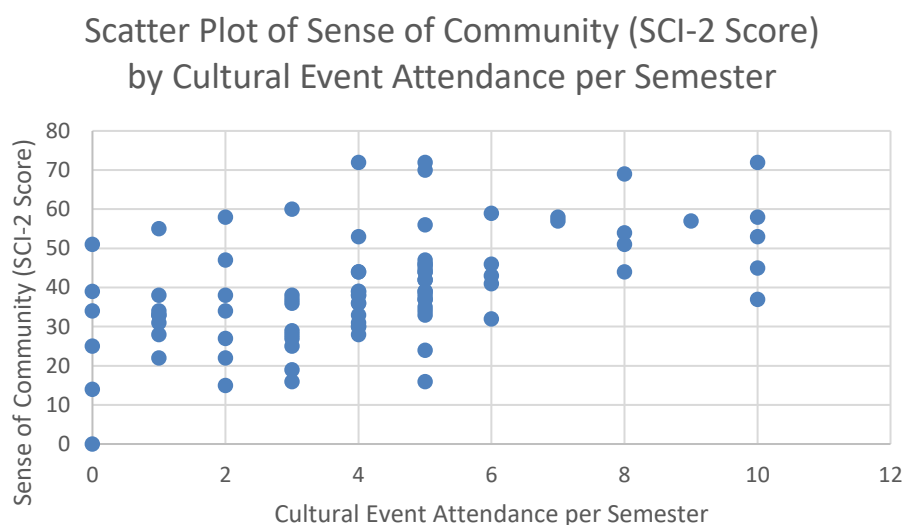
Second, the assumption of independence of observations was considered. For this assumption, the Durbin-Watson statistic was utilized to examine the independence of the observations, known as 1st-order autocorrelation. There was independence of residuals, as assessed by a Durbin-Watson statistic of 1.580 (see Table 2).

Table 2

Model Summary[b]

Model	R	R Square	Adjusted R Square	Std. E of the Estimate	Durbin-Watson
1	.51[a]	.26	.25	12.13	1.58

Note. A. Dependent Variable: Sense of Community (SCI-2 Score)
b. Predictors: (Constant), Cultural Event Attendance per Semester

The third test was the assumption of no significant outliers. A scatterplot and casewise diagnostics were used to identify outliers that may have had a disproportionate impact on the regression results. A visual inspection of the scatterplot (see Figure 1) indicated no outliers were present. Furthermore, upon performing the regression in SPSS, a lack of casewise diagnostics report indicated that all cases had standardized residuals less than ±3, further ruling out the potential for outliers within the data set.

Fourth, the assumption of homoscedasticity of residuals. This involved visually inspecting plots of the residuals against predicted values to determine variance. There was homoscedasticity, as assessed by visual inspection of a plot of standardized residuals versus standardized predicted values (see Figure 2).

Figure 2

Scatterplot Regression Standardized Value
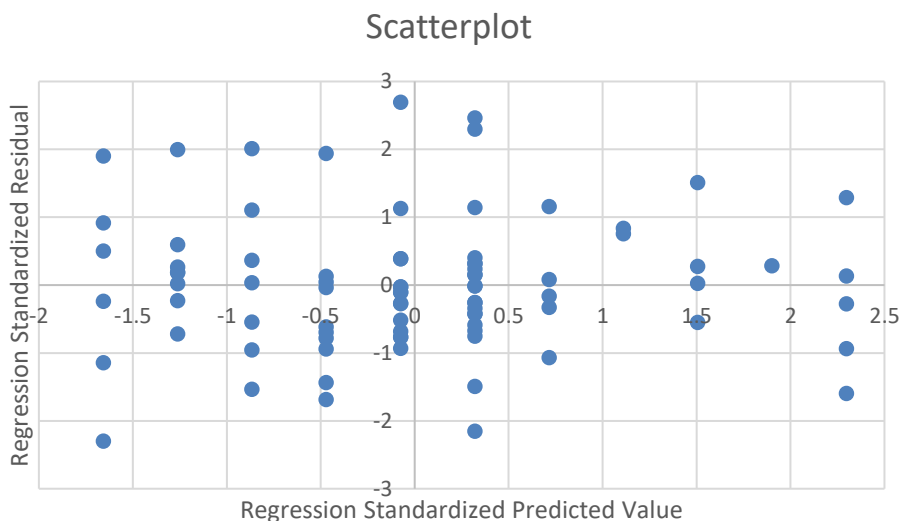
The fifth and final test was the assumption of normal distribution of residuals. A Normal P-P Plot was used to determine if the residuals were normally distributed. Residuals were

normally distributed as assessed by a straight line found in the normal probability plot (see

Figure 3).

Figure 3

Normal P-P Plot of Regression Standardized Residual

Normal P-P Plot of Regression Standardized Residual
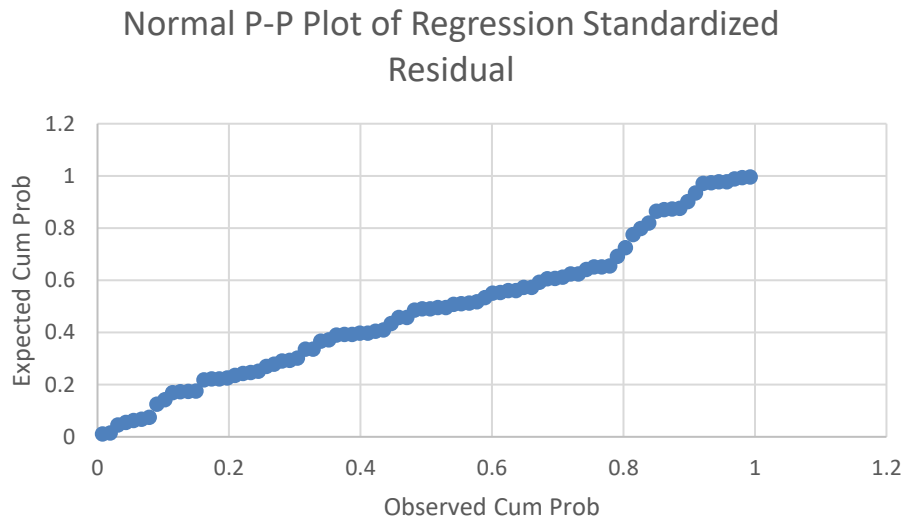
Null Hypothesis

The purpose of the present study was to understand the predictive correlation between students' cultural event attendance and their sense of community. To reject/fail to reject the null hypothesis, a bivariate linear regression analysis was used. The resulting model summary provided the following values, $F(1,82) = 29.23$, $p < 0.001$, $R^2 = 0.05$. Cultural event attendance accounted for 26.3% of the variation in students' sense of community with adjusted $R^2 = 25.4\%$, a large size effect. The results indicate some practical significance due to the large effect size; $F^2 = R^2/(1 - R^2)$; $0.35 = 0.26/(1 - 0.26)$. Cultural event attendance statistically significantly predicted students' sense of community, $F(1, 82) = 29.23$, $p < .001$. In other words, the result is statistically significant, and there is strong evidence to suggest that the relationship between the predictor (cultural event attendance) and the criterion (sense of community) is not due to random

chance. Thus, the researcher rejected the null hypothesis. Table 2 displays the model summary,

Table 3 displays the analysis of variance, and Table 4 displays the model coefficients.

Table 3

Analysis of Variance[a]

Source	Sum of Squares	*df*	Mean Square	*F*	Sig.
Regression	4303.84	1	4303.84	29.23	< 0.001[b]
Residual	12071.82	82	147.21		
Total	16375.66	83			

Note. A. Dependent Variable: Sense of Community (SCI-2 Score)
b. Predictors: (Constant), Cultural Event Attendance per Semester

Table 4

Coefficients[a]

	Coefficients B	*Coefficients SE*	95% CI (Lower,Upper bounds)	β	*t*	Sig.
(Constant)	27.90	2.57	[22.78, 33.02]		10.84	< 0.001
Cultural Event Attendance per Semester	2.84	0.52	[1.8, 3.89]	.51	5.40	< 0.001

Note. A. Dependent Variable: Sense of Community (SCI-2 Score)

Gujarati, D. N. (2004). Basic econometrics (4th ed.). McGraw-Hill.

CHAPTER FIVE: CONCLUSIONS

Overview

The contents of this chapter include a discussion of the results of the predictive correlational research on cultural event attendance and students' sense of community at a dual-mission university post-COVID. Following a discussion of the results, implications and limitations of the study are presented. The chapter then concludes with a section of recommendations for future research.

Discussion

The purpose of this quantitative predictive correlational study was to determine how accurately a sense of community (criterion variable) could be predicted from cultural event attendance (predictor variable) for undergraduates at a dual-mission university, post-Coronavirus Disease (COVID). The null hypothesis for this study stated that there was no statistically significant predictive relationship between the sense of community, as measured by the Sense of Community Index-2 (Chavis et al., 2008), and the cultural event attendance for undergraduate students at a dual-mission university, post-COVID. However, the findings of this study revealed a significant predictive correlation between cultural events and students' sense of community. Thus, the study results indicate that the higher attendance at on-campus cultural events is associated with a stronger sense of community among undergraduate students at a dual-mission university. This conclusion holds significant implications for the contemporary campus community, especially in the post-COVID era, and contributes to a deeper understanding of the factors influencing the sense of community in higher education.

The foundation which this research attempts to expand upon incorporated literature on the campus community and sense of community in higher education (Benson & Whitson, 2022;

Boyer, 1990; Brooks & Boyer, 2019; Chavis et al., 2008; Cope et al., 2021), the evolving source

of students' sense of community (Beauchamp et al., 2020; Hagedorn et al., 2022; Keyserlingk et

al., 2021; Kondo et al., 2022; Palmer et al., 2014; Swickard, 2021; Turkay, 2022), on-campus

cultural events (Tuten et al., 2015, 2020), and the changing landscape of higher education and

dual-mission universities (Carruth, 2019; Hanson, 2022; NAS, 2020; Pelletier et al., 2021, 2022,

2023). Furthermore, this research attempts to expand upon the literature regarding the status of

on-campus cultural events and sense of community in a post-COVID context (Altinay et al.,

2021; Benson & Whitson, 2022; Garcia-Morales et al., 2021) as well as students' sense of

community working as a protective factor against the negative impacts of COVID-19 (Benson &

Whitson, 2022; Procentese et al., 2020). With the hope to expand this body of literature, the

research rested on a theoretical framework consisting of the Sense of Community Theory

(McMillan & Chavis, 1986), Astin's (1984) student involvement theory, and Kuh's (1995) other

curriculum.

Impact on Campus Community and Sense of Community in Higher Education

The significant predictive correlation between on-campus cultural event attendance and a

sense of community discovered in this present study highlights the pivotal role that on-campus

events could play in fostering a vibrant and inclusive campus community. By providing

opportunities for students to engage with diverse cultural events, institutions can create an

environment that nurtures a sense of belonging, connectedness, and shared experiences among

students. These findings reinforce the importance of promoting on-campus events to enhance the

overall sense of community in higher education. This finding builds upon the body of literature

that has examined the concept of community within higher education, including Boyer's (1990),

and Brooks and Boyer's (2019) seminal works on defining the university as a community.

Brooks and Boyer (2019) proposed various key traits that all colleges and universities should aspire to have in order to create a thriving community. One such characteristic defined the university as a place where students and faculty converge with similar educational goals. Findings of the present study align with this characteristic, as on-campus event attendance, which this research correlates with a stronger sense of community, could contribute to this recognition. Attending on-campus cultural events potentially serves as an outward manifestation of these shared goals discussed by Brooks and Boyer (2019). This present research proports that such events could become a platform for students to identify these common educational aspirations within their fellow peers, faculty, and administrators, and further strengthen a sense of community.

Another prominent characteristic of Brooks and Boyer's (2019) campus community is the emphasis on maintaining an open and civil environment that upholds the value of freedom of expression. On-campus cultural events play a pivotal role in providing a platform for diverse perspectives (Tuten et al., 2020). This present study concludes that, as a consequence of these events, a stronger sense of community emerges. Thus, administrators should prioritize on-campus cultural events as a means to foster an inclusive and respectful campus climate, where students can experience, as well as garner, a heightened sense of belonging.

Research on The Sense of Community in Higher Education: Comparison

The findings of the present study align with previous research that underscores the significance of a sense of community in various academic outcomes, such as student engagement, academic achievement (McMillan & Chavis, 1986), retention, satisfaction (Pedler et al., 2022), mental health, and overall well-being (Korpershoek et al., 2020). These studies have consistently highlighted the positive influence of a sense of community on different aspects

of student success. The current study establishes a link between cultural event attendance and these diverse student outcomes through their sense of community.

Li et al. (2020) and Boyd et al. (2022) have discovered that a strong sense of community is correlated with higher levels of student engagement, academic achievement, and retention. These findings are in line with the current study, which observes that attending on-campus events predicts a heightened sense of community. This suggests that active participation in community-building activities, specifically on-campus cultural events, benefits students' academic outcomes. Additionally, the results of Li et al. (2017) and McNally et al. (2021) support the idea that a sense of community has a positive impact on student satisfaction and can act as a protective factor for those dealing with psychological challenges like grief or stress. If this influence indeed exists, and cultural event attendance serves as a predictor of this sense of community, then attending cultural events may potentially serve as a coping mechanism for students in dealing with psychological afflictions and stress.

Cope et al. (2021) conducted a study examining the influence of a sense of community on graduation predictions, emphasizing the importance of fostering this sense within the university context. The present study extends this research by delving deeper into the factors contributing to a sense of community and highlighting the role of on-campus event attendance and connecting this sense to academic success. Similarly, Han et al. (2022) explored the relationship between motivation, sense of community, and participation in collaborative learning. While their study primarily focused on intrinsic and extrinsic motivation, the present study investigates the correlation between cultural event attendance and a sense of community. This comparison is significant because the results of the current research explicitly define a sense of community as a motivating factor for attending on-campus cultural events. This expansion, along with Han et

al.'s (2022) findings, broadens the understanding of how different types of engagement influence students' sense of community, while also establishing cultural events to promote collaborative learning environments.

Jones and Davenport (2019) conducted a study exploring the sense of community in an ethnically diverse school, highlighting the importance of cultivating a strong sense of community within the educational environment. The present study builds upon this existing literature by offering valuable insights that can aid administrators and teachers in identifying the types of engagement that foster a sense of community in diverse settings. Dual-mission universities and similar regional institutions typically exhibit greater diversity compared to their geographically close counterparts (Griffin, 2021). In this context, the current research establishes the significance of cultural event attendance by recognizing it as a catalyst for fostering a sense of community in such diverse settings.

Evolving Sources of Students' Sense of Community

The emergence of technology, remote learning, and the evolving landscape of higher education has necessitated a reevaluation of the means and methods of constructing and achieving a sense of community. Understanding the evolving dynamics of students' sense of community helps institutions design strategies and initiatives that effectively meet students' social and community engagement needs. The present study's findings shed light on the evolving sources of students' sense of community and highlight the significance of on-campus cultural events as a meaningful source.

Previous research has emphasized the significant role of student organizations in cultivating a sense of community by providing developmental opportunities and fostering a shared identity among students (Costello et al., 2016; Xerri et al., 2018). Faculty members have

also been identified as key contributors to students' sense of community through their support and encouragement of participation in activities and events (Healey et al., 2016; Umbach & Wawrzynski, 2005). Staff members have been found to foster a sense of belonging by creating an environment of value and respect (D. Wilson et al., 2020), while the university, itself, contributes to community building through various activities, programs, and resources (Zepke & Leach, 2005, 2010). However, the changing dynamics of higher education, including the increasing adoption of online learning and advancements in technology, have presented new challenges and opportunities for a sense of community development. The shift toward online learning has introduced unique difficulties, such as limited interactions and feelings of isolation among students (Hagedorn et al., 2022; Strafaccia, 2021). Researchers have found that different types of technology foster varying levels of sense of community (Hagedorn et al., 2022; Kondo et al., 2022), and advancements have allowed for more interactive platforms that engage students differently in the learning process (Goncalves et al., 2020; Swickard, 2021).

The present study focusing on the relationship between on-campus event attendance and students' perceived sense of community in the post-COVID era provides valuable insights into the evolving landscape of community building in higher education. While previous research predominantly focused on the role of student organizations, faculty, staff, and the university (Costello et al., 2016; Healey et al., 2016; Umbach & Wawrzynski, 2005; D. Wilson et al., 2020; Xerri et al., 2018; Zepke & Leach, 2005, 2010), this study explored the significance of on-campus cultural events as a potential catalyst for fostering a sense of community. The findings of this study indicate that increased on-campus event attendance is associated with a higher perceived sense of community among students. This suggests that in the post-COVID era, with the challenges of remote learning and limited interactions, the physical presence and

participation in on-campus events play a crucial role in enhancing students' sense of community. These findings align with previous research highlighting the importance of shared experiences and a sense of belonging in community formation. Furthermore, this study extends the existing literature by emphasizing the need to consider both technological advancements and on-campus interactions when cultivating a sense of community. While technology can provide alternative means for communication and interaction, the findings suggest that face-to-face engagement through on-campus events remains a significant factor in fostering a robust sense of community among students.

The evolving nature of higher education necessitates a comprehensive understanding of the factors that contribute to a positive school climate and a greater sense of community among students. This comparison of research highlights the need for educational stakeholders, including student organizations, faculty, staff, and administrators, to adapt their strategies and approaches to community building in response to changing dynamics. Educational leaders should recognize both online and on-campus interactions when considering the cultivation of a sense of community. While technology can enhance forms of engagement and provide flexibility, efforts to create meaningful face-to-face interactions through on-campus events should be prioritized to foster a stronger sense of community. By considering both these technological advancements and on-campus interactions, educational stakeholders can adapt their approaches to cultivate a stronger sense of community, ultimately providing students with a supportive and engaging learning environment.

On-Campus Cultural Events

The positive correlation found in this research between on-campus cultural event attendance and a sense of community emphasizes the importance of prioritizing and supporting a

robust on-campus cultural event calendar. Institutions should strive to offer a diverse range of cultural events that cater to various interests and backgrounds, fostering inclusivity and providing students with opportunities to connect with their peers. By investing in on-campus cultural events, institutions can create an engaging environment that promotes social cohesion and a strong sense of community (Tuten et al., 2020).

The findings of the current study, which examined the relationship between on-campus event attendance and students' perceived sense of community in the post-COVID era, align with previous research on the constructive impact of cultural event participation on student outcomes (Tuten et al., 2020). Cultural events, including guest lectures, diverse events, concerts, and art exhibits, have been recognized as intrinsic constituents of the curriculum, contributing to cultural identity, social engagement, and student development in higher education (Tuten et al., 2015, 2020; Kuh, 1995). These cultural events have also been found to benefit students by promoting cultural awareness, appreciation, and understanding of different ways of life (Coleman et al., 2021). Attending these events can enhance students' understanding of the world, foster an appreciation for cultural diversity, and provide valuable learning experiences (Bowen & Kisda, 2023; S. Brown, 2019; Coleman et al., 2021; Urist, 2016). The findings of this present study corroborate the idea that attending cultural events fosters students' social, emotional, and personal growth, solidifying this form of engagement as a significant source for such development.

This quantitative study complements the existing qualitative research on cultural events. The qualitative research by Tuten et al. (2020) specifically explored the benefits and outcomes of on-campus cultural events for college students. The current study's quantitative results align with their findings and extend their research by indicating that cultural events positively influence

students' personal and academic development, social interaction, and engagement with the broader campus community by specifically increasing one's sense of community. The recognition of cultural event attendance as a positive factor in shaping student attitudes, specifically sense of community, reflects the constructive impact of such events on students' holistic, social, emotional, and personal growth.

Furthermore, the disruption caused by the COVID-19 pandemic and the subsequent shift to remote learning has created a unique context for investigating the effects of post-COVID on-campus cultural event attendance. While the literature has highlighted the need to explore the psychological effects of post-pandemic student engagement levels (Benson & Whitson, 2022; Bozkurt et al., 2022; Morris & Kalliny, 2022), limited research has specifically examined the impact of on-campus cultural event participation in higher education. This present study fills this gap and connects the sense of community's productive nature as a protective factor against COVID-19 effects with the attendance of on-campus cultural events. Thus, as a source of sense of community, this research suggests cultural event attendance can mitigate negative emotional and mental stress caused by the COVID-19 pandemic and potentially similar disruptions to education.

Changing Landscape of Higher Education and Dual-Mission Universities

The present study aimed to investigate the relationship between on-campus event attendance and students' sense of community in the context of the changing dynamics in higher education. The research on systemic change in higher education highlights the need for comprehensive reform to address the shortcomings of traditional higher education structures and systems (Alexander et al., 2019; Brint, 2022; Griffin, 2021; Macintosh, 2018; Pelletier et al., 2021, 2022). Various models and alternative approaches focus on affordability and reasonable

time to degree completion, questioning the worth and validity of traditional higher education structures (Arnold, 2021; Bailey et al., 2015; Pelletier et al., 2021, 2022, 2023). These reforms suggest that the traditional pathways to college are changing, which may impact students' sense of community.

In comparison, the present study focuses on the role of on-campus event attendance in fostering a sense of community among students. While the systemic changes discussed in previous research are broad and institution-wide (Alexander et al., 2019; Brint, 2022; Griffin, 2021; Macintosh, 2018; Pelletier et al., 2021, 2022), the findings of this study provide specific insights into the importance of on-campus events as a community-building mechanism. By examining the impact of on-campus event attendance on students' sense of community, this study contributes to the ongoing discussion on the changing landscape of higher education; particularly, which changes still compel students' sense of community.

Online learning has been identified as a significant component of the future of higher education, with nearly all institutions considering a shift to online learning platforms (Palvia et al., 2018; Pelletier et al., 2021, 2022, 2023; Peters et al., 2022; Saichaie, 2020). The COVID-19 pandemic further accelerated the adoption of online learning. However, research suggests that online learning environments can be isolating and hinder students' sense of belonging and connection to their peers, instructors, and institutions (Aydin & Ozkan, 2020; Curelaru et al., 2022; Baran & AlZoubi, 2020; Vitucci et al., 2021; Xia et al., 2022). In contrast, the present study investigates the role of on-campus event attendance in promoting students' sense of community. By focusing on the physical presence and engagement of students in on-campus events, this study provides a counterpoint to the potential isolating effects of online learning. The findings highlight the significance of in-person interactions and shared experiences, in the form

of cultural events, in fostering a sense of community among students.

The present study aims to contribute to the limited research on the dual-mission university model by examining the relationship between on-campus event attendance and students' sense of community in this institutional framework. While the research on the dual-mission university model has primarily focused on its structural and operational aspects (Bothwell, 2016; Carruth, 2019; Griffin, 2021; Holland, 2018; Lipka & Holland, 2016; Merisotis & Hauser, 2021), there is still a dearth of literature on its impact on sense of community and engagement. The present study contributes to filling this research gap by examining the relationship between on-campus event attendance and students' sense of community within the dual-mission university context. By recognizing the significance of on-campus events in fostering a sense of community, dual-mission universities can further enhance their institutional framework. The findings of this study suggest that integrating community-building activities, specifically on-campus cultural events, into the dual-mission model can strengthen students' connection to the institution and contribute to their overall educational experience.

COVID

The COVID-19 pandemic has had a significant and multifaceted impact on higher education, with colleges and universities worldwide implementing various changes (Benson & Whitson, 2022; Pelletier et al., 2021, 2022, 2023; Son et al., 2020). These changes include the shift to virtual learning, the reduction of on-campus interaction, and attempts to mitigate health risks for students and faculty. As a result, the academic, social, and financial aspects of higher education have been profoundly affected (Azzam, 2020; Baker & Davis, 2021; Mok, 2022; NAS, 2020; Son et al., 2020; Velásquez-Rojas, 2022). These findings underscore the need to explore alternative avenues for fostering student engagement and academic success, such as on-campus

event attendance and co-curricular activities.

Previous studies have highlighted the importance of a sense of community in higher education, particularly during times of disruption (McNally et al., 2021; Sharma et al., 2020). Procentese et al. (2020) found that a sense of community is associated with positive outcomes such as increased academic performance, mental health, and resilience. The study also revealed that a sense of community is linked to decreased levels of stress, anxiety, and depression. These findings suggest that a strong sense of community can help students cope with the challenges posed by the pandemic and other stressors, including changes to their learning environment and increased academic workloads.

In line with the existing literature, the present study further emphasizes the significance of community-building efforts in higher education during and after disruptive times, such as the pandemic. By attending on-campus cultural events, students have the opportunity to engage with their peers and establish connections that contribute to their sense of community. According to Altinay et al. (2021), the pandemic significantly disrupted on-campus event attendance and student engagement. The study recommended that institutions adapt to the changing circumstances by implementing innovative strategies to maintain student engagement and attendance. The present study builds upon these recommendations by suggesting that on-campus cultural events can be a positive contribution to these strategies.

Comparing the new findings to the existing literature, there is alignment in emphasizing the importance of student engagement and social connectedness, or rather, cultural event attendance and students' sense of community. The context in which these new findings emerge is distinct, as it considers the post-COVID higher education environment. While the pandemic had detrimental effects on academic quality, student engagement, and social interaction, the findings

of the current study provide insights on how on-campus cultural events can contribute to rebuilding a sense of community and address the social and emotional needs of students.

Discussion Conclusion

      This study established a significant predictive relation between on-campus event attendance and students' sense of community which offers valuable insights into the post-COVID higher education landscape. While the pandemic and the evolving nature of higher education has presented numerous challenges, this study contributes to the exploration of alternative approaches to enhance student engagement and foster a supportive campus environment. In conclusion, the research strongly establishes on-campus cultural events as a pivotal community-building mechanism within the contemporary higher education setting.

Implications

      No previous research has investigated the sense of community among students in the particular context or boundaries defined by this study. This study explored how attending cultural events at a dual-mission university in the post-COVID era predicts students' sense of community. Thus, the original nature of the present study is in supplying quantitative empirical data regarding the source of students' sense of community within the context of these unique parameters. The findings of this study indicate a significant correlation between attending on-campus cultural events and the sense of community among these undergraduate students. The results suggest that higher attendance at such events is associated with a stronger sense of community in a dual-mission university. These findings have important implications for the modern campus community, particularly in the post-COVID era and amidst the uniquely changing landscape of higher education. Furthermore, the results contribute to a better understanding of the factors that influence the sense of community in higher education.

Considering the literature review, and the above discussion relating the literature to the present study's findings, certain implications are inclined. The present study's findings not only build upon previous studies that have established the importance of a strong sense of community which compels student success, but they also highlight the role of on-campus events in fostering a sense of community and expand the understanding of how different types of activities influence students' sense of belonging. If sense of community is correlated with student success, and the findings of the present study positively correlate cultural event attendance with students' sense of community, then the implication is that active participation in on-campus cultural events is beneficial for students' academic outcomes and overall satisfaction.

Furthermore, beyond the present findings aligning with previous studies that emphasize the significance of a sense of community in higher education, it also complements existing literature by exploring the factors that contribute to a sense of community. This study emphasizes the need to foster students' sense of community within the modern university context by promoting on-campus cultural events. The study also extends the research on motivation and the outcomes of on-campus cultural event attendance, thus broadening the understanding of student engagement.

Beyond the statistically significant correlation uncovered, the practical significance of these results carries substantial importance, especially for dual-mission universities and institutions with similar models. The magnitude of the observed effect suggests that, for this dual-mission university, even a modest increase in on-campus cultural event attendance can significantly boost students' sense of community. This implies that on-campus cultural events present a highly pragmatic and feasible means of enhancing students' sense of community, particularly within institutional types such as dual-mission universities.

The implications of this research are relevant for educational stakeholders and policymakers. They highlight the need to adapt strategies and approaches to community building in response to changing dynamics in higher education, including the increasing adoption of online learning. While technology and the adoption of remote learning is becoming a crucial component of higher education, face-to-face interactions through on-campus cultural events remain significant in fostering a sense of community. Educational leaders and policymakers should recognize the importance of both online and on-campus interactions in creating a supportive and engaging learning environment within the modern university. Furthermore, if it has been demonstrated that a sense of community acts as a protective factor against emotional distress resulting from pandemics or the isolation consequence of technological adaptations, an additional implication arises. This study reveals that on-campus cultural events, which significantly predict a sense of community, can serve as a catalyst for fostering this protective factor during the post-pandemic era, and perhaps others in the future.

The findings also have implications for the design of on-campus cultural events. Institutions should prioritize and support a robust on-campus cultural event calendar to provide students with diverse opportunities for engagement and connection. By investing in on-campus cultural events, institutions can create an environment that promotes social cohesion and a strong sense of community. Overall, the research underscores the evolving sources of students' sense of community in higher education and the need for institutions to adapt their strategies and initiatives accordingly. By considering the role of on-campus events and fostering a sense of community, educational stakeholders can provide students with a supportive and engaging learning environment, ultimately enhancing their overall development and academic success.

Limitations

This section discusses the limitations inherent in the research design, procedures, and presented population. In determining the correlation between on-campus cultural event attendance and students' sense of community, this study found a significant predictive relationship. However, the present study must be viewed in light of these pragmatic constraints which could pose challenges to the reliability and generalizability of the research findings.

The aim of the study was to observe a predictive correlation between cultural event attendance and students' sense of community. An inherent limitation of this design is that correlational studies can only establish relationships between variables and cannot determine causality (Gall et al., 2007). As such, causality cannot be assumed as part of the relationship found in this study between cultural event attendance and students' sense of community. Neither can all underlying factors that influence this relationship be determined within the scope of this study involving only these two variables. External variables uncontrolled by researchers should be considered potential research limitations (Gall et al., 2007). Thus, influence by these unmeasured factors could confound the observed relationship found by this research and introduce alternative explanations to the correlation found between cultural event attendance and students' sense of community.

This predictive correlational study relied on self-reported data from 84 participants. Researchers have noted biases such as social desirability or memory recall often present themselves in surveys and self-reported data (Gall et al., 2007; Kreitchmann, et al., 2019). Therefore, measurement error and self-report bias could pose a threat to the validity of the findings. The validity of the primary instrument, the Sense of Community Index-2 (SCI-2), was confirmed prior to conducting this research (Chavis et al., 2008), as well as the choice for

handwritten responses with pencils and paper, which researchers have determined produce fewer

biases and responses with less variation compared to those conducted via online (Norman et al.,

2010). Regardless of the attempts to mitigate threats, no study, method, or instrument is found

without limitations (Gall et al., 2007). Additionally, Chavis et al. (2008) caution researchers that

the SCI-2 may not capture all relevant factors that contribute to the complex nature of one's

sense of community. Furthermore, the SCI-2 has primarily been used in cross-sectional studies

and lacks use as a tool for collecting longitudinal data (see Recommendations for Future

Research).

Generalizability concerned the researcher of the present study as the 84-participant

sample size may not be representative of the entire dual-mission university population, due to

sample size and collection method. The sample size is greater than the recommended minimum

of 66 participants (R. Warner, 2013); however, a larger sample size could produce more

generalizable results. This research utilized random convenience sampling by way of on-campus

face-to-face solicitation. Although this research took place at a time of day and campus area as

suggested by Wilson et al. (2013), others have noted that different times and settings of data

collection could affect the generalizability of research findings (Niedermeier & Stelzer, 2019).

The authors also noted that convenience sampling is based off accessibility and willingness to

participate, which could introduce biases and limit generalizability. Furthermore, they noted that

convenience sampling does not always ensure the inclusion of all demographics presented in the

population which could lead to lack of diversity or types of overrepresentations in the sample,

distorting research results. Additionally, researchers have noted the differences that exist

between the students who attend summer semesters verses fall and spring semesters (Simunich,

2016). The present study took place in the summer semester of 2023, which could have limited

the participant availability and diversity of the considered population. For instance, the population demographics indicated a slight enrollment majority of 51% males. However, the researcher observed a slight majority of female participants in this study.

Recommendations for Future Research

A significant relationship between undergraduates' cultural event attendance and their sense of community at a dual-mission university post-COVID was uncovered as a result of this study. The multidimensionality of this research construct compels the following recommendations for future studies, provided in the numbered list below.

1. Like this study, most sense of community research is cross-sectional which limits the understanding of how sense of community may change over time. More longitudinal studies are needed regarding students' sense of community involving dual-mission universities and other evolving educational modalities as they present themselves in higher education.

2. Although the sample size met the suggested requirements for a linear regression, $N = 84$ is not immensely greater than the recommended $N = 66$. Additional studies with a larger and less homogenous sample could be more representative of the population and provide a greater ability to generalize the findings regarding dual-mission universities.

3. Technological advances and the active development of new strategies are constantly being implemented as institutions rethink higher education systems (Alexander et al., 2019; Macintosh, 2018; Pelletier et al., 2021, 2022, 2023). Furthermore, the exact parameters of the COVID-19-inspired future remain unknown regarding the trajectory of higher education (Bozkurt et al., 2022;

Morris & Kalliny, 2022; Wangenge-Ouma & Kupe, 2022). Future research could benefit from considering the degree to which the entirety of the undergraduate business model is shifting. Repeated and longitudinal studies involving cultural event attendance and students' sense of community may be required as higher education and the source of the sense of community continue to evolve.

4. Further research in this area is necessary to explore additional factors contributing to students' perceived sense of community in light of the changing dynamics of educational modalities and on-campus interactions. Similar studies could be performed supplanting the dual-mission university with other university types to further verify the findings.

5. Future research could adopt a more comprehensive approach using multiple regression analysis. This approach could entail integrating additional variables such as class status, age, gender, and, potentially, socio-economic background or cultural affinity. By accounting for these variables, the study could provide a more nuanced understanding of how specific demographic factors interact with on-campus cultural event participation in shaping students' sense of community.

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APPENDICES

APPENDIX A

Request/Permission Correspondence

Thank you for your prompt reply. As I understand it, I have been given permission to conduct this research at xxxx as long as I schedule with event services prior, am non disruptive, and only use property (table) if rented through you prior to my visit. I'll speak with you again soon to schedule.
Thank you.
Jared Stephenson

From: Event Services <xxxx>
Sent: Tuesday, February 21, 2023 5:48 PM
To: Stephenson, Jared <jstephenson22@liberty.edu>
Subject: [External] FW: research/event request

[EXTERNAL EMAIL: Do not click any links or open attachments unless you know the sender and trust the content.]

EVENT SERVICES
XXXX
Scheduling Assistant
Event Services
xxxx
xxxx

From: xxxx <xxxx>
Sent: Tuesday, February 21, 2023 3:26 PM
To: Event Services <xxxx>
Subject: FW: research/event request

I got permission from general counsel just because that request made me question. So you can send them the rental information- and also what he is doing is part of free speech so if he just walks with a clipboard and stops people in the hallway, we can't stop him from doing that as long as he isn't disruptive and doesn't take up property- like claim a table without rental.

-xxxx

From: xxxx <xxxx>
Sent: Tuesday, February 21, 2023 3:22 PM

To: xxxx <<u>xxxx</u>>
Subject: Re: research/event request

Hi xxxx,

Yes, that works fine. I double-checked with Jeremy as well and he gave the green light.

Best,

xxxx
> xxxx
> **xxxx**
> *Director of Enterprise Risk and Claims Counsel*
> *Office of General Counsel*
> <u>xxxx</u>
  xxxx

From: xxxx <<u>xxxx</u>>
Date: Tuesday, February 21, 2023 at 2:23 PM
To: xxxx <<u>xxxx</u>>
Subject: FW: research/event request

Can we give permission for this request below? We would treat it like an external rental since they are not a xxxx employee or student.

-xxxx

From: Event Services <<u>xxxx</u>>
Sent: Tuesday, February 21, 2023 1:54 PM
To: xxxx <<u>xxxx</u>>
Subject: FW: research/event request

I can give him information about his tabling request, but as far as an email for approval I wasn't sure if that needs to come from you or from xxxx. Let me know if I can help in any way!

xxxx

From: Stephenson, Jared <<u>jstephenson22@liberty.edu</u>>
Sent: Tuesday, February 21, 2023 11:53 AM
To: Event Services <<u>xxxx</u>>
Subject: research/event request

I was referred to event services by campus connection.

I am conducting research as a partial requirement of a doctoral degree. I would like to use undergraduates at xxxx as the sample population. My research would consist of asking random students in the hallway if they would be willing to fill out a questionnaire regarding their sense of community and cultural event attendance. Before I can get approval for my research, I need an email from xxxx saying that I have permission to eventually schedule a visit to campus for this purpose. It would simply entail me and a table in a hallway with some questionnaires for a couple hours. hoping to conduct this survey sometime between April and September if I'm given permission to continue. If there is someone else I need to contact for this approval please let me know.

Thanks

Jared Stephenson

APPENDIX B

Sense of Community Index-2 (SCI-2) Request/Permission Correspondence

[External] RE: SCI Request Submitted
Sense of Community <soc@xxxxxxxxxx>
Thu 3/2/2023 2:41 PM
To: Stephenson, Jared <xxxxx>;Sense of Community <xxxxx>
Cc: xxxxx <xxxxx>

[EXTERNAL EMAIL: Do not click any links or open attachments unless you know the sender and trust the content.]

Greetings,

Thank you for your interest in the Sense of Community instrument. You are approved to use the SCI-2 for the research project described. Please follow this link to access the index: h ps://senseofcommunity.com/sense-ofcommunity-index-2/

With permission to use the index, you can create and disseminate the survey through any format described in your approved application.

I'm sorry we did not see your prior email in me, but glad that you found the form!

As part of your agreement to use this instrument, you have agreed to participate in a short user survey. This periodic survey helps us further validate the instrument which, in turn, makes any work you do with it more rigorous. Thank you in advance for your participate on. I wish you the best with your research.

Sincerely,
xxxx

xxxx
Senior Analyst II
xxxx
xxxx
Phone
Fax

Visit xxxx to network, chat and learn more about the Sense of Community Index.

From: jaredstephenson <xxxx>
Sent: Monday, February 27, 2023 2:30 PM
To: Sense of Community <xxxx>
Cc: xxxx <xxxx>
Subject: SCI Request Submitted

Contact Informa on

Name

Jared Stephenson

 Username jstephenson

Email jstephenson22@myliberty.edu

Institution

Liberty University

Please select a title that best fits you role or choose other.

 Independent Researcher or Evaluator

Access to SCI Tools

I would like to use the Sense of Community Index in my work.

 Yes

I agree to share my use and learnings with Sense of Community & Community Science, and to participate in a short **Consent** user survey. This periodic survey helps us further validate the instrument which, in turn, makes any work you do with it more rigorous.

Background Information

Which Index are you requesting?

 SCI-2 / 24 Items

Please select how you intend to use the index:

 Research study/project

Please provide a general overview of your study/project.

The purpose of this quantitative predictive correlational study, which is grounded in Sense of Community theory, is to determine how accurately sense of community (the criterion variable) can be predicted from a linear combination of cultural event attendance and student characteristics (predictor variables) for undergraduate students at a dual-mission university post-COVID. A multiple regression analysis will be utilized to examine the data. Convenience sampling methods will be used for data collection from a minimum of 109 students at a large dual-mission university in the western United States. The results will reveal if a statistically significant relationship exists between cultural event attendance and students' perceived sense of community. This research will report on limitations, implications of the findings, and recommendations for future research aimed at helping students and other higher education stakeholders determine where to focus their efforts regarding student involvement that promotes a sense of community and, consequently, academic achievement.

Please describe how you specifically intend to use the index within your study/project and how it relates to your research aims.

The intention is to use the Sense of Community Index-2 as the primary instrument for obtaining the substratum of data regarding the presented research. The instrument will be used very similar to its use in Penland's (2017) research in gauging students' sense of community.

Penland, N. P. (2017). Exploring the impact of undergraduate intramural sports on undergraduate students' perceived sense of community: A multiple regression analysis.

Approximately, over what time period (months and years) do you expect to be using the index to collect data?

Upon research approval, the instrument will most likely be used for a 2-week period between April 2023 and Sept 2023.

Please enter the approximate date when we should contact you for a debrief with us.

 03/01/2023

Do you intend to translate the instrument into another language?

 No

Additional Information

Please use the space below to provide any additional information you wish to share about your intended use of the instrument that you think would be important for us to know in determining whether or not to grant you permission.

I am seeking approval for both use of the instrument and permission to add the instrument as an appendix in my

research.

Consent - No Changes

 I agree that no changes will be made to the Sense of Community Index for use in either print or electronic form,

without written permission from Community Science.
By entering your name below you agree that all information above is true to the best of your knowledge.   jared stephenson
Date of Agreement
          02/27/2023

APPENDIX C

Sense of Community Index-2 (Chavis et al., 2008)

The following questions about community refer to:

How important is it to you to feel a sense of community with other community members?

1	2	3	4	5	6
Prefer Not to be Part of This Community	Not Important at All	Not Very Important	Somewhat Important	Important	Very Important

How well do each of the following statements represent how you *feel* about this community?

	Not at All Completely	Somewhat	Mostly
1. I get important needs of mine met because I am part of this community.	○ ○	○	○
2. Community members and I value the same things.	○ ○	○	○
3. This community has been successful in getting the needs of its members met.	○ ○	○	○
4. Being a member of this community makes me feel good.	○ ○	○	○
5. When I have a problem, I can talk about it with members of this community.	○ ○	○	○
6. People in this community have similar needs, priorities, and goals.	○ ○	○	○
7. I can trust people in this community.	○ ○	○	○
8. I can recognize most of the members of this community.	○ ○	○	○
9. Most community members know me.	○ ○	○	○
10. This community has symbols and expressions of membership such as clothes, signs, art, architecture, logos, landmarks, and flags that people can recognize.	○	○	○
11. I put a lot of time and effort into being part of this community.	○ ○	○	○
12. Being a member of this community is a part of my identity.	○ ○	○	○

		Not at All Completely	Somewhat	Mostly
13.	Fitting into this community is important to me.	○ ○	○	○
14.	This community can influence other communities.	○ ○	○	○
15.	I care about what other community members think of me.	○ ○	○	○
16.	I have influence over what this community is like.	○ ○	○	○
17.	If there is a problem in this community, members can get it solved.	○ ○	○	○
18.	This community has good leaders.	○ ○	○	○
19.	It is very important to me to be a part of this community.	○ ○	○	○
20.	I am with other community members a lot and enjoy being with them.	○ ○	○	○
21.	I expect to be a part of this community for a long time.	○ ○	○	○
22.	Members of this community have shared important events together, such as holidays, celebrations, or disasters.	○ ○	○	○
23.	I feel hopeful about the future of this community.	○ ○	○	○
24.	Members of this community care about each other.	○ ○	○	○

| | | Not at All | Somewhat | Mostly |

APPENDIX D

Administration Instructions for the Sense of Community Index-2 (SCI-2, Chavis et al.,

2008)

Introduction: The following instructions describe how to administer the SCI-2, a self-report questionnaire designed to measure sense of community among individuals. The SCI-2 consists of 24 items that assess four dimensions of community: membership, influence, integration and fulfillment of needs, and shared emotional connection. Each item is rated on a 4-point Likert scale ranging from "not at all" to "completely".

Materials:

- Copies of the SCI-2 questionnaire

- Writing utensils (e.g., pencils or pens)

Procedure:

1. Obtain informed consent from participants, explaining the purpose of the study, the risks and benefits of participation, and their rights as research participants.

2. Distribute the SCI-2 questionnaire to participants. Provide participants with writing utensils.

3. Instruct participants to read each statement carefully and to select the response that best reflects their level of agreement or disagreement with each statement. Remind participants that there are no right or wrong answers and to respond honestly.

4. Allow participants adequate time to complete the questionnaire but avoid giving them too much time to deliberate on their responses. A typical completion time for the SCI-2 is 10 minutes.

5. Collect the completed questionnaires from participants.

6. Thank participants for their participation and debrief them as necessary.

Scoring: To calculate scores on the SCI-2 sum the scores across all 24 items. Higher scores indicate a greater sense of community.

The above administration instructions provide guidance for administering the questionnaire in a standardized manner to maximize data quality and minimize potential sources of bias.

APPENDIX E

Study Consent

Title of the Project: EXPLORING THE IMPACT OF CULTURAL EVENT ATTENDANCE ON UNDERGRADUATE STUDENTS' PERCEIVED SENSE OF COMMUNITY AT A DUAL-MISSION UNIVERSITY, POST COVID: A PREDICTIVE CORRELATIONAL STUDY

Principal Investigator: Jared Stephenson, Student/Doctoral Candidate, School of Education, Liberty University.

Invitation to be Part of a Research Study

You are invited to participate in a research study. To participate, you must be over 18 years of age, be an undergraduate student at xxxx, and have completed at least one semester there previously. Taking part in this research project is voluntary.

Please take time to read this entire form and ask questions before deciding whether to take part in this research.

What is the study about and why is it being done?

The purpose of the study is to determine how accurately a sense of community (the criterion variable) can be predicted from cultural event attendance (predictor variable) for undergraduate students at a dual-mission university post-COVID.

What will happen if you take part in this study?

If you agree to be in this study, I will ask you to complete the following:
1. Self-report questionnaire indicating how many on-campus cultural events do you attend during a typical semester at xxxx?
2. Sense of Community Index-2 (SCI-2) survey to assess your sense of community within xxxx.

Approximately 10 min total

How could you or others benefit from this study?

Participants should not expect to receive a direct benefit from taking part in this study. Benefits to society include a better understanding of the social capital gained from cultural event attendance, in this case students' sense of community. This study is also significant to higher education administrators, students, event planners, mental health professionals, and researchers considering college students' perceived sense of community and the worth of on-campus cultural events.

What risks might you experience from being in this study?

The expected risks from participating in this study are minimal, which means they are equal to the risks you would encounter in everyday life.

How will personal information be protected?

The records of this study will be kept private. Research records will be stored securely, and only the researcher will have access to the records.

- Participant responses will be anonymous.
- Original hardcopy data will be stored in a locked-drawer and transferred digital copies will be stored on a password-locked computer. After three years all electronic records will be deleted, and all hardcopy records will be shredded.

How will you be compensated for being part of the study?

Participants will not be directly compensated for participating in this study. However, as an incentive, participants can voluntarily enter a drawing for a $50 xxxx bookstore gift card by placing their name and email into a jar. The information they provide will not be linked to their anonymous research responses.

Is study participation voluntary?

Participation in this study is voluntary. Your decision whether to participate will not affect your current or future relations with Liberty University or Utah Valley University. If you decide to participate, you are free to not answer any question or withdraw at any time prior to submitting the survey without affecting those relationships.

What should you do if you decide to withdraw from the study?

If you choose to withdraw from the study, please inform the researcher that you wish to discontinue your participation, and do not submit your study materials. Your responses will not be recorded or included in the study.

Whom do you contact if you have questions or concerns about the study?

The researcher conducting this study is Jared Stephenson. You may ask any questions you have now. If you have questions later, **you are encouraged** to contact him at jstephenson22@liberty.edu. You may also contact the researcher's faculty sponsor, Dr. Svirska-Otero at msvirskaotero@liberty.edu.

Whom do you contact if you have questions about your rights as a research participant?

If you have any questions or concerns regarding this study and would like to talk to someone other than the researcher, **you are encouraged** to contact the IRB. Our physical address is Institutional Review Board, 1971 University Blvd., Green Hall Ste. 2845, Lynchburg, VA, 24515; our phone number is 434-592-5530, and our email address is irb@liberty.edu.

Disclaimer: The Institutional Review Board (IRB) is tasked with ensuring that human subjects research will be conducted in an ethical manner as defined and required by federal regulations. The topics covered and viewpoints expressed or alluded to by student and faculty researchers are those of the researchers and do not necessarily reflect the official policies or positions of Liberty University.

Your Consent

Before agreeing to be part of the research, please be sure that you understand what the study is about. You will be given a copy of this document for your records. If you have any questions about the study later, you can contact the researcher using the information provided above.

APPENDIX F

Self-Report Questionnaire – Cultural Event Attendance

<u>On-Campus Cultural Event Attendance</u>

Definition:

Cultural events – Lectures, concerts, festivals, musical and theatrical performances,

cultural demonstrations, and art exhibitions.

How many on-campus cultural events do you attend during a typical semester at xxxx? (Circle your answer)

    0   1   2   3   4   5   6   7   8   9   10

APPENDIX G

Liberty University Institutional Review Board Approval

LIBERTY UNIVERSITY.
INSTITUTIONAL REVIEW BOARD

July 26, 2023

Jared Stephenson
Maryna Svirska-Otero

Re: IRB Exemption - IRB-FY23-24-9 EXPLORING THE IMPACT OF CULTURAL EVENT ATTENDANCE ON UNDERGRADUATE STUDENTS' PERCEIVED SENSE OF COMMUNITY AT A DUAL-MISSION UNIVERSITY, POST COVID: A PREDICTIVE CORRELATIONAL STUDY

Dear Jared Stephenson, Maryna Svirska-Otero,

The Liberty University Institutional Review Board (IRB) has reviewed your application in accordance with the Office for Human Research Protections (OHRP) and Food and Drug Administration (FDA) regulations and finds your study to be exempt from further IRB review. This means you may begin your research with the data safeguarding methods mentioned in your approved application, and no further IRB oversight is required.

Your study falls under the following exemption category, which identifies specific situations in which human participants research is exempt from the policy set forth in 45 CFR 46:104(d):

Category 2.(i). Research that only includes interactions involving educational tests (cognitive, diagnostic, aptitude, achievement), survey procedures, interview procedures, or observation of public behavior (including visual or auditory recording) if at least one of the following criteria is met:
The information obtained is recorded by the investigator in such a manner that the identity of the human subjects cannot readily be ascertained, directly or through identifiers linked to the subjects;

For a PDF of your exemption letter, click on your study number in the My Studies card on your Cayuse dashboard. Next, click the Submissions bar beside the Study Details bar on the Study details page. Finally, click Initial under Submission Type and choose the Letters tab toward the bottom of the Submission Details page. Your information sheet and final versions of your study documents can also be found on the same page under the Attachments tab.

Please note that this exemption only applies to your current research application, and any modifications to your protocol must be reported to the Liberty University IRB for verification of continued exemption status. You may report these changes by completing a modification submission through your Cayuse IRB account.

If you have any questions about this exemption or need assistance in determining whether possible modifications to your protocol would change your exemption status, please email us at irb@liberty.edu.

Sincerely,
G. Michele Baker, PhD, CIP
Administrative Chair
Research Ethics Office