

Fostering Digital Communities in Higher Education: Unlocking Belonging

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Abstract

In the present era, belonging is valued more than ever in contributing to students' attained success. This makes achieving a sense of belonging easier and is now necessarily coupled with positive transition, retention, and completion rates (Tang et al., 2023). Many educational researchers have noted that a solid sense of connection and belonging is constitutive irrespective of the context of learning, with global impacts on engagement and academic success. At the same time, there is a unique set of challenges in building connections that could influence students' feelings of belonging and familiarity, as well as retention inspired by their peers (Peacock et al., 2020). The last two decades have seen many efforts to create a sense of belonging to an academic institution, considering the evidence that this helps student retention, satisfaction, and attainment. Many educational researchers regard establishing a sense of belonging and personal connection as essential matters independent of the learning environment (Edwards & Hardie, 2024). Learners need to see other people present in the online environment and to regard themselves as part of that group, thereby creating the feeling of "belonging" (Stoytcheva, 2021). This article features innovative techniques and good practices in creating digital communities that encourage and reinforce students' sense of belonging. Additionally, the researcher discusses such digital platforms, which can even be the 'key' to deeper-felt engagement, social connection, and academic belonging, anything that would have provided students with opportunities of support and value. Building online communities becomes even more important because it facilitates student interaction, retention, and success in hybrid and fully online learning environments.

Keywords: sense of belonging, online learning, digital community

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As the higher education process transforms in the digital space, the question arises: Where are my keys? The question is relatively related to the understanding of belonging. As the keys provide access to places, in this case, to foster a sense of belonging in the digital context, one needs to unlock the path that provides entry into collaborative, inclusive, and supportive online communities. According to Strayhorn (2012), belonging has always served as a basic human need, one of the major determinants of student motivation for persistence and success during higher education. The theory maintains that students should feel valued, connected, and supported in the academic communities to engage fully in the learning experience. In online education, where physical presence is absent, institutions must intentionally create opportunities for students to experience this sense of belonging through digital interactions. Strayhorn's framework guides this discussion by reinforcing that belonging is not a passive experience but one that requires active cultivation through inclusive practices and structured engagement.

Given the increasing reliance on virtual classrooms, social media networks, and digital engagement tools, higher education institutions currently find it very challenging to rebuild the community feel that is a central part of the being-on-campus experience in the online space. Belonging seems particularly critical in the context of individuals, students, faculty, and staff members, who may cross multiple digital spaces that may not always promote feelings of connection or inclusivity. However, whereas students at physical campuses can chat and form friendships online and offline, teachers and administrators need to create digital communities. The 'unlocking belonging' online will not just mean giving access to platforms; it should mean creating sites where all community members can feel loved, appreciated, and enabled. New pupils consider the ambient transformation from teacher-centered to student-centered learning. In higher education, this foundation is

perceived as the ability to actively promote belonging in difficult but pressing avenues, especially as institutions extend online or hybrid access. Community inclusivity and a strong sense of community will necessitate connecting student engagement, retention, and academic success across campuses. This article examines the significance of digital collectives in higher education alongside practices to engender inclusive cybernetic spaces conducive to connectivity and fabric (Edwards & Hardie, 2024). Many universities realize that students are critical in driving academic communities. According to a high-quality study from the Buurtzorg team, a stronger sense of togetherness has generally been linked with better student outcomes, happier learners, and fewer dropouts (Edwards & Hardie, 2024). It also contributes to the issues of well-being and isolation. Students who are part of something and who are closely aligned with their institution tend to be less stressed with anxiety and depressive symptoms. Thus, the mode of higher education has come to feature a sizeable online learning presence. In the past decade, millions of online courses and programs have seen millions of participants (Seaman et al., 2018). Despite rampaging momentum and an impressive stack of enrollments in courses and programs indicating interest, many educators (and skeptics) doubt that real learning can occur here. Can instructors live-interact and have a social presence with their students? Is any true sense of community built between a teacher and student learner in this mode of delivery, which is entirely online (Trespacios et al., 2021)? The argument almost exactly resembles questioning whether online learners must be given access to a sense of belonging as an obligatory condition in the new learning interactions. Peacock et al. (2020) assumed that learning becomes alienating in the first instance of online teaching when students are isolated and lack interaction, unlike in traditional classroom teaching. The main objective of this article is to set forth usage guidelines for building the community around the type of technology that can be used in the process and the different ways that these could continuously be altered for community benefit. This approach assures interactive and

dynamic pedagogy and learning technology while creating a long-lasting engagement framework for communities in the digital spaces that support great community among learners.

Literature Review

Understanding the Importance of Belonging

Belonging is one of the most intrinsic characteristics of a human being. It primarily defines how an individual interacts and works with the environment and the community. According to Strayhorn (2012), belonging is "the understood expression of social acceptance that the students feel they have from other students within the same academic space." Strayhorn developed this concept within the traditional campus through physical interactions in a class, student group, or social events. As more students work from remote or hybrid locations, this reality must transform how students connect and have a sense of belonging in a virtual context. Similarly, with the diversity in students' backgrounds and experiences concerning qualities like race, economic class, or learning modalities, all these factors would affect how actively they interact with the platforms. Prior research proves that students showing a strong sense of belonging within their institution are far more likely to persist in their studies and eventually graduate.

In this context, belonging becomes one significant determining factor in driving commitment to study, motivation for academic study, and even overall well-being in higher education. It is not just about being welcomed; it is a sense of recognition and value attached to something more significant regarding groups within the academic network and social exposure. Traditionally, belonging was built through personal interactions, shared physical spaces, and spontaneous social encounters between people within the campus premises. However, as this trend in higher education continues, with the growing number of digital

services and provisions, the challenge arises: How do faculty and staff create a sense of connection when there is less or no face-to-face contact?

Research on higher education continues to reveal that students enjoy a higher sense of belonging and that, in turn, their probability of persisting in their course and outdoing themselves in academia is higher. This attribute probably has the most significant importance for minoritized groups, such as first-generation college students, students of color, and students from lower economies, whose familiar disconnections may increase their feelings of isolation. This research is vital for lower-income, first-generation students and students of color (Beauchamp et al., 2020). Without intentional efforts to create inclusive and engaging spaces, online students will find themselves during their academic journey without peers, disconnected from professors and institutional support systems. In an educational landscape where hybrid and utterly online learning is becoming the norm, this responsibility for fostering belonging does not evaporate; its form changes.

The Role of Belonging in Online Higher Education

Numerous components may affect students' feelings of inclusion and community, i.e., interactions with teachers and peers, perceptions of stereotyping or tokenism, how instructor expectations are communicated, and the range of perspectives offered in course materials (Ambrose et al., 2010). Belonging equally needs to be designed deliberately in an online learning environment. Unlike students on a natural physical campus engaging in social and academic exchanges, online spaces would require structural approaches to opening doors to such engagement. Research has shown that students who report feeling isolated in online programs are more likely than their peers to find ways to disengage, struggle with academic performance, and eventually drop out of their courses. By contrast, institutions that engage in community building through virtual engagement strategies experience improved student

retention, satisfaction, and success rates. It is about creating spaces where students feel seen, heard, and valued, not just access to discussion boards or group chats.

The point is that the best distance programs do not treat digital interaction as an afterthought; instead, they seamlessly integrate it into the very texture of the learning experience. Either through virtual study groups, engagement initiatives between faculty and students, or peer mentorship programs, meaningful interactions provide much of a shared sense of purpose. However, a change of attitude is necessary to achieve all of this. Online education should go beyond an exchange of information into which fertile relationships can be created. Technology exists in learning management systems, social media platforms, and collaborative tools. How the technology is used determines whether students feel part of a thriving academic community or merely participants in an isolated digital classroom.

Unlocking Belonging in Digital Communities

Various elements can impact students' feelings of belonging and community, such as interactions with teachers and peers, views on stereotyping or tokenism, how to convey instructor expectations, and the diversity of perspectives in course materials (Ambrose et al., 2010). The feeling of belonging is critical for students as it is a psychological need that forms the foundation of their success and well-being in higher educational institutions (Walton & Cohen, 2007). Usually, physical campuses provide space for students to socialize, but currently, digital platforms have more space for social interactions. There is an opportunity and a challenge to unbundle such spaces to create a culture of belonging and inclusion in online spaces. As higher learning institutions adopt online learning spaces, they also need to pay closer attention to the sense of digital belonging in all students who should become active participants in education. Students who always discern online or offline contribute to education by engaging more and more in more profound issues, culminating in a positive response to online activities and challenges (Walton & Cohen, 2007). The sense of belonging

also contributes significantly to improving mental health status and reducing social isolation, an essential issue in the performance context in online environments. Such students may be less likely to be connected. When higher education institutions create a sense of belonging online, they can enhance students' satisfaction, retention, and academic performance.

Analytical perspective

Online learning is always going to be isolated. However, that need not be the case. The problem is how to design and facilitate engagement within it. Some universities have cracked the code for bringing digital communities to life as vibrant and supportive as their traditional analogs. However, others still struggle, leaving students to fend for themselves in courses online, devoid of interaction and warmth.

Higher Education institutions must ask themselves: Are they providing content or connecting? The difference between these two methods is profound: Knowledge acquired with content delivery can be made available to students, while connection allows them to stay, persist, and thrive. If institutions want to do what they wish and 'unlock belonging' in online higher education, they must stop thinking that digital spaces are secondary to physical ones. Instead, it should be considered an integral part of the student experience, enjoying similar care, investment, and innovation levels. Institutions that understand this will serve their students far better and build learning environments reflecting the connected, collaborative world we live in today.

Methodology

The methodology created an approach to support a sense of belonging through digital communities in higher education without referencing any one study or collection of data. Through a qualitative review of existing literature, institutional practices, and expert perspectives, this article examines digital communities' role in creating a sense of belonging in higher education. A structured approach was identified rather than a formal study to digest

academic research, case studies, and real-world applications within higher education institutions. Information was collected through scholarly works, institution records, policy documents, and expert insights from educators, student affairs professionals, and community managers. Trends in the industry and digital platforms that are widely used were studied to gauge their impact on student engagement. The information synthesized yielded some key themes: the influence of digital communities on feelings of belonging for students, successful techniques for creating inclusive online spaces, and some of the challenges faced through digital engagement. A comparative approach examined the varying institutional strategies and their applicability to different educational environments. Because this analysis relies on secondary source material instead of empirical data, findings articulated herein come from existing studies and expert commentaries. It is also recognized that institutional contexts, technological access, and student demographics may affect the outcome. The author hopes to provide insights and valuable recommendations for generating belonging in digitally mediated higher education spaces through this analysis.

Key Concept Identification

The first step included defining the key concepts to guide the search process. The following concepts determined the focus of the search:

Digital Communities: These are digital spaces where students engage, collaborate, and communicate in theory through Learning Management Systems (LMS), discussion forums, and social media. Framing the key concepts is very important.

Belonging: This is a feeling of connectedness that students derive from being part of the academic community, expressed by acceptance, inclusion, and support. In digital education, belonging refers to the students' perceptions of their connectivity with peers, instructors, and the broader institution.

Online Learning Environments: These are learning environments delivered through digital platforms that include virtual classrooms, online courses, and collaborative tools with very limited or no face-to-face interactions.

Community Building in Higher Education: The term describes the intentional strategies and practices in creating and sustaining a connected, supportive community among the students, instructors, and peers involved in an online or hybrid educational environment.

Search Strategy

A systematic search strategy was adopted to identify relevant literature on the subject. This strategy included formulating specific search queries and the subsequent refinement during the process. The following took place:

Initial Search Queries:

- Digital communities in higher education
- Building a sense of belonging online in higher education
- Online learning and sense of belonging
- Community-building in digital education
- Student engagement in online higher education environments

Refined Searches:

- Fostering digital communities AND higher education AND student belonging
- Online learning platforms AND a sense of belonging AND community-building.
- Technology and student belonging in online higher education
- Building community through digital tools in online education

Boolean operators such as AND, OR, and NOT were used to balance the specificity of the search terms. The operators captured studies that address key themes of community-building and belonging and student engagement in digital learning environments.

Selection of Databases and Information Sources

The research was comprehensive and used various academic databases and sources. The platforms were selected due to their broad access to education, psychology, and technology content and high-quality, peer-reviewed research material. The databases used in carrying out the literature search are as follows:

Google Scholar: A free, open-access, multidisciplinary academic search engine focusing on research articles, theses, books, and conference papers.

ERIC: The Education Resources Information Center database has resources for specialized education research and gives access to many journal articles, research reports, and other materials about digital learning environments and student engagement.

ProQuest: This resource indexes many dissertations and theses among other research projects on various subjects, including online education and digital community studies.

These databases provided a broad and interdisciplinary range concerning the topic under scrutiny.

Inclusion and Exclusion Criteria

The literature was screened based on the relevance and quality of the studies included for review by a set of inclusion and exclusion criteria.

Criteria for Inclusion:

Peer-reviewed Articles: Peer-reviewed journal articles, conference papers, and reports were used to maintain academic rigor and validity.

Publication Date: Publications in the last 15 years (2010–2024) were prioritized to guarantee a reflection of contemporary trends, technologies, and theories in digital education and community development.

Concentration on Higher Education: Only research on higher education was incorporated. Studies from K-12 settings or other unrelated educational fields were omitted unless they directly pertained to higher education.

Importance of Digital Communities and Belonging: Only documents that directly addressed the impact of digital communities on fostering a sense of belonging and involvement in an online educational setting were included.

Criteria for Exclusion:

Non-Peer-Reviewed Sources: Articles omitted included non-academic or non-peer-reviewed sources like blogs, news publications, or opinion articles.

Unrelated: Articles that centered mainly on the technical features of digital tools without addressing community-building or belonging were omitted.

Screening and Selection Process

The researcher identified only the articles' titles, abstracts, and keywords for relevance. Full-text studies that met the inclusion criteria were retrieved and further reviewed for the appropriateness of the research focus, excluding irrelevant, redundant, or articles not meeting the criteria from further analysis.

Data Extraction and Synthesis

The researcher extracted data for key information from each study for selected relevant articles. Data extraction focused on identifying the following in the data analysis:

Community-Building Strategies: Techniques and approaches used to engender a sense of community in collaborative activities, discussion forums, peer mentorship, and social media engagement.

Digital Tools and Platforms: Learning Management Systems, social media tools, and video conferencing platforms are digital platforms identified by the literature as supporting the development of a connected, engaged, in-country learning environment.

Psychosocial Aspects of Belonging: The concept of how emotional connection and digital platforms facilitate social support and a sense of inclusion.

Implications for Student Success: Outcomes related to students' sense of belonging through digital communities affect their engagement, academic performance, and retention.

Synthesis provided an overall understanding of how the role of digital communities contributes to students' development and maintenance of a sense of belonging within online higher education settings.

Synthesis and Reporting

The findings were synthesized from the literature search into a comprehensive report organized around the identified key themes and findings. Synthesis focused on the following aspects:

Psychosocial Implications: Emotional and social factors enhance students' sense of belonging and engagement.

Educational Implications: Recommendations can be offered to educators, institutions, and policymakers on creating supportive, inclusive digital communities that foster belonging among students.

Strategies for Designing Belonging in Digital Communities

- **Build Inclusive Platforms:** Use tools and platforms where online interaction can occur. Learning Management Systems (LMS) such as Canvas or Moodle, discussion forums, and social media groups provide a platform for students to exchange messages, work on projects in collaboration, or simply network and build rapport.
- **Facilitate Open Communication:** With openness as a core value, facilitate dialogue in which students are encouraged to share their thoughts and experiences. Get into the conversation using icebreakers, polls, and discussion prompts. Students learn that faculty and staff care and hear them using these approaches.
- **Peer Mentorship:** Develop peer mentor programs for students to help each other. However, not only does this allow connection-building, but it also supports student

ownership of their learning. Mentorship may be a valuable resource for first-time enrollees transitioning from offline learning.

- **Encourage Group Work:** Give learners assignments where they need to work in groups. Projects can be coordinated via digital collaboration tools such as Google Workspace or Microsoft Teams, enabling students to collaborate to establish common goals.
- **Embrace Diversity:** Acknowledge and celebrate the different cultural experiences that students bring to school. Foster sharing of cultural viewpoints through conversations by promoting traditions and practices committed to content. The aim is to create an environment where all the students are part of a familiar narrative.
- **Student Well-Being:** Ensure that full student access to the mental hygiene resources and support services is offered in an institution. In this way, the community of well-being members would reshape the holistic sense of belonging for a disconnected and disillusioned learner.
- **Get Feedback:** Regularly request feedback from students on their perspectives surrounding the engagement with the online community experience. In this manner, requirements and expectations on the part of students can be understood by faculty and staff and thus improve their educational experience while making it clear that their views matter.

Conclusion

Belonging is crucial to student success in higher education, and doing so for online communities can be facilitated. Through several broadly recognized approaches to promote interaction, collaboration, and support, institutions can create beehive-like atmospheres where the students are connected and engaged. So, as higher education continues to evolve through digital learning models, putting connections and community at the forefront positions

students for a meaningful college career from an academic and social standpoint. Through this process, institutions not only make the education of students a more enriching experience but also prepare future global leaders to navigate our complex and connected world successfully.

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