

The Complexities of Using Digital Social Networks in Teaching and Learning

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Abstract

The aim of this investigation was to gain a broad sense of the implementation of digital social networks for teaching and learning by instructors in higher education. We were particularly interested in examples of instructors' use of digital social networks in their courses, the benefits and challenges of specific platforms for teaching and learning purposes, and the perceived role of digital social networks in teaching and learning during the first years of the COVID-19 pandemic. The participants in this investigation (n=336) were faculty and graduate students. Data was collected via an electronic questionnaire with closed and open-ended questions using Qualtrics. The quantitative analysis included descriptive statistics. The data analysis also included qualitative data analysis of textual responses provided to various questionnaire items. The results illustrate the ways in which instructors successfully apply or integrate digital social networks into teaching and learning, broadly and with specific digital social networks. Yet, the findings also highlight several complexities that instructors have experienced when considering digital social networks in their teaching practices such as data privacy issues, misinformation, user interface issues, and the willingness of students to use less trendy digital networks, among other challenges.

Keywords: networked learning, teaching, learning, higher education, digital, social networks



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Introduction

Millions of people around the world connect daily via digital social networks. The use of digital social networks has changed the way in which we meet, communicate, and engage with others. In many ways, our social interactions have become increasingly mediated by these affinity spaces. We have also experienced change as these social network platforms evolve or as new platforms become available. Today there are platforms that allow multiple forms of text and media exchanges. Whether we like it or not, for good or bad, digital social networks will continue to infiltrate our lives and interconnections.

As many have already established, these digital social networks are also now part of our educational endeavors (Zachos et al., 2018). Educational institutions at all levels (elementary, secondary, and higher education) are using social networks to engage with stakeholders including learners, parents, community members, administrators, prospective students, and the general public (Watson, 2020; Kenna & Hensley, 2019). Digital social networks are also used by instructors as part of the learning experience or to engage with learners in less formal ways (Asino et al., 2021; Romero-Hall, 2021). In education research, there have been a number of investigations primarily related to how instructors and learners use specific digital social networks such as Twitter (Erhel et al., 2022), Reddit (Muljana et al., 2022), Instagram (Shelton et al., 2022), Facebook (Aydin, 2012), WhatsApp (Asino et al., 2021), and others by instructors and learners in higher education.

In this investigation, we aim to gain a broad sense of the implementation of digital social networks for teaching and learning. We were particularly interested in examples of instructors' use of digital social networks in their courses, as well as the usefulness and challenges of specific platforms for teaching and learning purposes in higher education. Last, our intent was to gain a sense of instructors' perspective on how digital social networks may have served them since the start of the COVID-19 pandemic.

Literature Review

The increased use of online learning technologies in education has opened the doors for digital social networks in learning environments. The reality is that “there is a new generation of students known as members of the digital and network generation who are surrounded by information and communication technologies” (Davidovitch & Belichenko, 2018, p. 51). These students consider the use of digital social networks as an enjoyable and universally accepted medium in their way of living (Zachos et al., 2018; Mese & Aydin, 2019). For many instructors, this has served as an invitation to consider the role of digital social networks in higher education. In fact, some research has established that students already use digital social networks in many different ways during their studies to help them a) reinforce their educational activities and b) in attempts to increase their academic performance (Zachos et al., 2018, Romero-Hall, 2017).

According to Lampropoulos et al. (2021), results from their 10-year longitudinal investigation of social media in education showed that there is a general readiness for using digital social networks in teaching and learning, by both instructors and students, due to the paradigm shift in education towards more student-centered pedagogies. Digital social networks for the most part are open and free, easy to learn and use, are increasingly part of everyday lives, and tend to be

collaborative in nature which makes them attractive for instructors and learners who are eager to engage in dynamic collective content creation (Lampropoulos et al., 2021).

However, the use of digital social networks in higher education for teaching and learning gives rise to critical conversations and observations about the risks that these mediums pose to the learning experience (Greenhalgh et al., 2021; Krutka et al., 2020; Krutka et al., 2019; Rosenberg et al., 2022). Risks associated with the use of digital social networks in teaching and learning include potential for online harassment (Hodson et al., 2018; Veletsianos et al., 2018), cyberbullying (Aydin, 2012), and misinformation (Eckberg et al., 2018; Gosse & Burkell, 2020), among others. These risks can have major consequences to personal safety, mental health, and sense of belonging. For teaching and learning, these risks could influence participation, creativity, intellectual discourse, and knowledge creation.

There are also disadvantages related to the use of digital social networks in learning including privacy concerns, intellectual property rights, copyrights and plagiarism, and time scarcity (Sutherland et al., 2020). Academics have raised concerns that social media can blur the line between personal and professional (Dennen & Burner, 2017). The same is true for students who are asked to engage in these digital social networks in their learning experience. Learners could experience context collapse as they use mediums that are primarily intended for personal purposes. There is also the concern of ownership of content creation in digital social networks (Sutherland et al., 2020). Without a formal policy, content created by the learners could be considered as belonging to the social media platform. The same could be said in terms of exchange of ideas. For students who are participating and sharing their thoughts, proposals, intentions, designs, and other postulations, exchanges in open and public digital social networks can pose a concern to plagiarism of ideas (Sutherland et al., 2020).

As researchers continue to investigate and explore the use of digital social networks, it is possible that others risks and disadvantages may be identified. Those of us who consider using these affinity spaces in our teaching practices need to safeguard our learners from the risks, fully understand the complexities of the disadvantages, and be prepared to navigate incidents that may occur with adequate policies or systems of support.

Purpose Statement and Research Questions

The purpose of this investigation was to explore how instructors in higher education implement digital social networks in teaching and learning. Higher education research is currently lacking literature that provides a general overview of the use of digital social networks in teaching and learning. Ideally, this investigation affords insights into the opportunities for use, as well as the problematization of digital social networks in higher education. The following research questions guided our investigation:

- How do instructors use digital social networks for teaching and learning?
- What are the advantages and disadvantages of specific social networks platforms for teaching and learning?
- What role have digital social networks played in higher education during the COVID-19 pandemic?

Methods

Recruitment and Participants

This investigation was approved by the institutional review board of the lead researchers (IRB 19-120). First, recruitment of participants was conducted via Twitter. The electronic questionnaire was distributed widely by the lead researchers who posted an invitation to participate and link to the questionnaire in their Twitter profiles. The tweets sharing the link to the questionnaire also included the #AcademicTwitter hashtag. Second, the link to the questionnaire was also distributed widely through the listserv of different academic professional organizations. Third, the questionnaire was distributed and posted in public groups in other social media frequently used by scholars such as LinkedIn and Facebook. The recruitment, distribution of the link, and data collection was conducted over a two-month period.

This study is one part of a multi-phase research project. Participants for this phase of the research were 336 instructors affiliated with institutions of higher education around the world. Participants were also active on social media for professional endeavors including teaching, learning, and professional development. All participants were 18 years or older.

Electronic Questionnaires

Data was collected via an electronic questionnaire with closed and open-ended questions using Qualtrics. The first page of the questionnaire specified the principal investigators' name and contact information, the purpose of the research project, confidentiality information, and the details of participation. All participants were asked to provide consent before proceeding with the questionnaire and participating in this investigation. The questionnaire included inquiries related to the participant's use of digital social networks for teaching purposes. At the end of the questionnaire, participants were given the option of providing their contact information (email or phone number) to participate in a raffle. The research team raffled two gift cards. After giving consent to participate in this investigation, participants were asked to indicate if they use social media as part of their academic career. If participants selected *Yes*, they were given the option to continue with the questionnaire and their data was included in the analysis. If participants selected *No*, then they were redirected to the end of the questionnaire, thanked for the willingness to partake in this investigation, and none of their data was included in the analysis.

Data Analysis

Quantitative data analysis of the responses provided via the electronic questionnaire was conducted which included descriptive statistics. The data analysis also included qualitative data analysis of textual responses provided (5,622 words) to various questionnaire items. For the qualitative analysis, the researchers employed an iterative and process-oriented team coding approach. First, open coding was conducted by two researchers independently. This was followed by an initial meeting to discuss the outcome of the open coding process including overlapping codes and themes. Together the researchers agreed on a specific set of codes. Next, the researchers coded another group of textual responses separately. A second meeting occurred in which codes were eliminated or added based on discussion between the two researchers. Finally, one researcher coded the remaining textual responses. Throughout the qualitative data analysis, the researchers focused on identifying patterns and clusters across the responses provided (Creswell, 2009; Tesch, 1990).

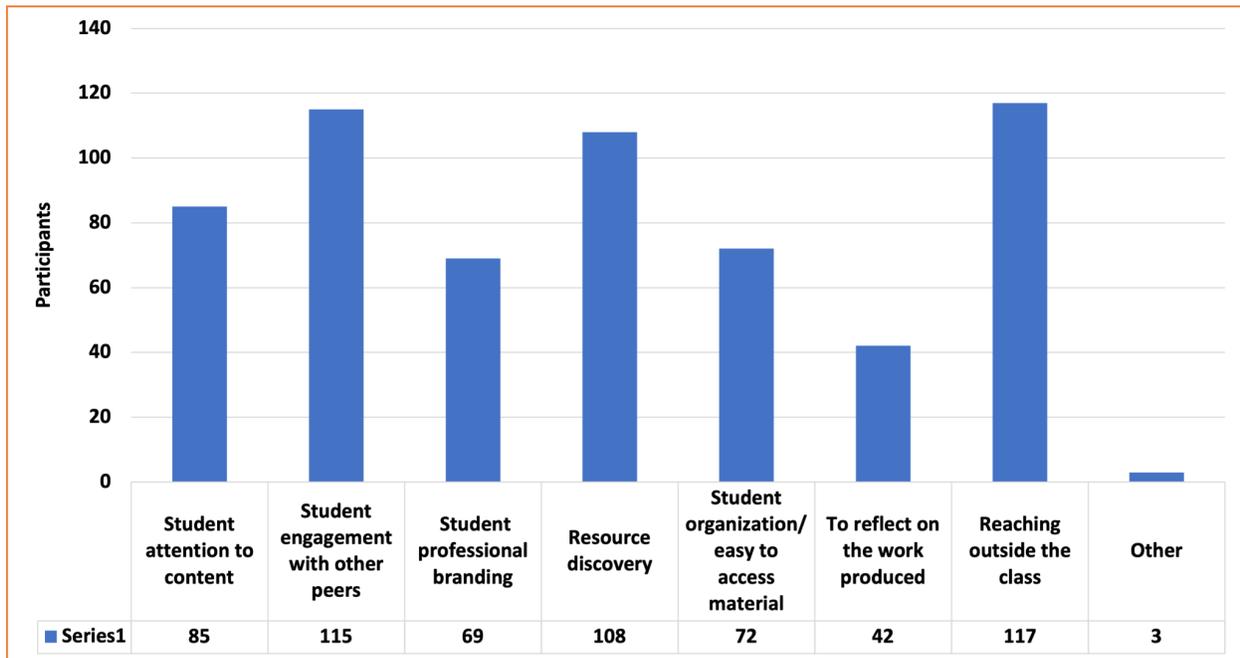
Results

RQ1: How do instructors use digital social networks for teaching and learning?

When asked to share benefits related to the use and integration of digital social networks in teaching and learning, participants selected “reaching outside the class,” “student engagement with other peers,” “resource discovery,” “promoting student attention to the content,” “ease of access to materials,” and “to promote students’ professional branding” as their main reasons. Figure 1 provides a complete list of reasons why instructors choose to integrate digital social networks into their teaching practices. Participants also shared “other” reasons in support of digital social networks in the teaching and learning experiences including the following statements: “reflecting about one’s online presence is easier if you are actually building one. Whether the world sees or not” and “links to future digital practices that student journalists benefit from learning about early-on.”

Figure 1

Why integrate digital social networks into their teaching practices?

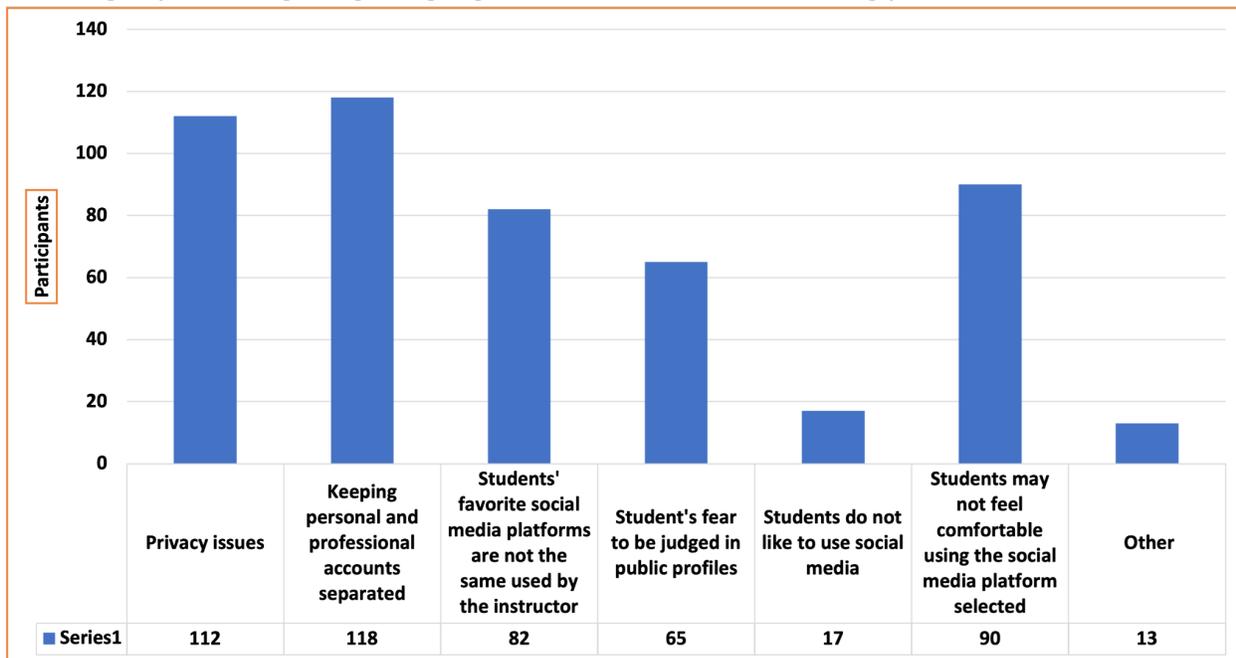


The results also indicate that participants identified various challenges to the use and integration of digital social networks in teaching and learning practices. These challenges include “keeping personal and professional accounts separate,” “privacy issues,” “students may not feel comfortable using the social media platform selected,” “students’ favorite social media platform are not the same as the one used by the instructor,” and “students’ fear to be judge in public profiles.” Figure 2 provides a complete list of reasons why instructors find digital social networks challenging to integrate or use in their teaching practices. Participants also shared “other” reasons why they do not use digital social networks in the teaching and learning experiences including the following statements: “data privacy issues,” “rate of consumption of Internet subscription,” “keeping up with digital platforms and which might be worthwhile adding to

lessons/teaching about, “issues with copyright when students create content,” “validity of information presented (anyone can put anything on social media without sources and go viral),” “too many notifications mixed together” and “ethical! Social media is ruining society and we should not promote it.”

Figure 2

Challenges preventing integrating digital social networks in teaching practices



As part of the electronic questionnaire participants were asked how they use digital social networks in their teaching and to provide an example of a successful application in one of their courses. The results indicate that participants have a range of successful methods in which they apply or integrate digital social networks into teaching and learning including to share material with others, use social media material(s) in class, conduct research, get ideas for class content, answer questions and connecting with other professionals, ask students to share their work, use the actual social media as part of the assignment, learn new information, and extend course discussion. Table 1 provides a selection of examples shared by different participants in their comments.

Table 1

Examples of Successful Application of Digital Social Networks in Teaching and Learning

How do you use social networks in your teaching?	n	Participants' Sample Comments

To share material with others (i.e., learners, other professionals)	37	“Live tweeting event coverage, Wakelet stories. I previously used Storify. I used to use Facebook to share and discuss news articles, but no longer do. And of course, I use YouTube to show videos in class all the time, and I share them on Blackboard as well.”
To use material(s) in class	21	“I sometimes use social media and interesting findings (like a post or opinion I’ve found) in my lectures to tie it in to my topics”
For research purposes	6	“From time to time I conduct virtual polls of different topics in New Media, or if I found something interesting, I will share it in my course’s Canvas platform.”
To get ideas for class content	7	“Crowdsourced syllabi development as a hands-on activity for students”
To answer questions and connecting with other professionals	15	“Organizing “slow” chats, where questions are asked and answered asynchronously throughout the week, as students have time. This also gives other people not in the class a chance to participate.”
To ask students to share their work	7	“I had the students find a tweet thread about statistics and then explain it on a video message or TikTok”
To use the actual social media as part of the assignment	35	“For example, in my class of Social Media and Political Communication, my students use Twitter to identify the behavior of a political person or identify a political message of an influencer.”
To learn new information	11	“I have used Instagram to create an informal learning community for Albanian youth. We share education-related struggles, ideas, discussion topics etc.”
To extend course discussion	18	“I have used Twitter as an alternative to LMS discussion forums for some courses. This experience had mixed reviews from students. I have also used Instagram/Twitter for a weekly “social media challenge” to help build community (e.g., “What is your favorite summer treat? Post a photo or video of yourself enjoying it.”

RQ2: What are the advantages and disadvantages of specific social networks platforms for teaching and learning?

Participants were asked to select networks that they found advantageous in their teaching. The results indicate that instructors find a range of different digital social networks beneficial for teaching and learning practices such as YouTube (n=45), Twitter (n=31), LinkedIn (n=21), Facebook (n=15), Instagram (n=9), TikTok (n=6), Online Forum (n=5), Reddit (n=3), Snapchat (n=1), Blogging Sites (n=1) and others (n=13). Participants were also asked to share why a specific digital social network was useful to them. The responses illustrated creative ways in which instructors adapt the various digital social networks for their courses. The responses also showcase that instructors perceive some digital social networks differently: what may work some may not always work for others (see Table 2).

Table 2

Examples of Advantages of Specific Social Networks Platforms for Teaching and Learning

Social Network Platforms	Shared Perceived Advantages by Participants
YouTube	“Perhaps not the only platform for this, but I use YouTube a lot for sharing videos related to the course--both videos I create myself, as well as videos created by others.” “Great resource for video content to analyze. Also, easy to embed on learning management platforms.”
LinkedIn	“Professional networking and to encourage students to prepare for future careers” “This platform offers a more professional tone, along with learning opportunities, lessons, communities, and job postings.”
Facebook	“Because it's the one with the most resources. I can share different types of content, create ads, and it provides great information about the page statistics (demographic information, reactions to posts, etc.).” “Targeted Facebook groups allow for the most effective crowdsourcing of resources.”
Instagram	“Easy to respond to student questions instantaneously and can send pictures of homework steps to help resolve questions”

Other(s)	"I use GroupMe for my students to connect with me outside of class. They are in a class GroupMe which also allows them to connect with each other and ask each other questions, etc."
TikTok	"TikTok is useful for finding examples/clips to show in class that are a bit more relatable for students"
Snapchat	"Easiest way to connect with other students"
Blogs	"I create content for students and share (with permission) exemplary student work on blogs."

As part of the questionnaire, participants were also asked to select the digital social networks that they viewed as disadvantageous or unable to properly integrate in their teaching practice. The results were the following: Facebook (n=32), Snapchat (24), Tiktok (n=16), Online Forums (n=13), Twitter (n=12), Instagram (n=11), Pinterest (n=7), LinkedIn (n=2), and others (n=11). Participants were asked to provide reasons why these digital social networks were less adaptable for teaching and learning. The comments of the participants (see Table 3) highlighted several concerns such as data privacy issues, the format of content, distractions with the environment, and the willingness of students to use less trendy digital networks, among other challenges.

Table 3

Examples of Disadvantages of Specific Social Networks Platforms for Teaching and Learning

Social Network Platforms	Shared Perceived Disadvantages by Participants
Facebook	"The 'collapsed context' and genuine identity expected by Facebook makes it hard for students to protect their privacy from undesirable/unwanted audiences. Anonymized accounts (such as on Twitter) have better acceptance from students" "Due to the spread of misinformation. No trust in this platform."
Snapchat	"The nature of the platform (disappearing videos) makes it difficult to use in a sequential form for sharing contents and ideas." "Can be distracting for students with disabilities"
TikTok	"I think only present unimportant information." "TikTok seems to lean toward being silly"

Instagram	"Because it's such a visual medium I think it doesn't lend itself well to sharing academic info. The people who are big on IG focus more on lifestyle and products" "Distractions are a lot more prevalent"
Pinterest	"Image based, but limited"
Reddit	"But I would say that while Reddit creates good language data for research, it's less useful as an interface, and less balanced in its attitude."
ResearchGate	"Great repository but students often cite incorrectly"

RQ3: What role have digital social networks played in higher education during the COVID-19 pandemic?

Participants were asked about the role that digital social networks have played in their higher education experiences since the start of the COVID-19 pandemic. The responses provided to this questionnaire item indicated that digital social networks have served to provide resources and guidance (n=34), moral and emotional support (n=27), connection to others (n=56), a sense of community and belonging (n=13), opportunities for networking (n=7), and an outlet to communicate (n=11). There were a few participants (n=9) who did not experience any difference in the role of digital social networks between pre-pandemic and pandemic times. Table 4 provides some of the comments made by the participants.

Table 4

Examples of the Role of Digital Social Networks During the COVID-19 Pandemic

Role during the COVID-19 Pandemic	Sample Participants' Comment
Resources and Guidance	"I am part of the Pandemic Pedagogy Facebook group, which has been very helpful in sharing teaching ideas, successes, and woes during the pandemic"
Moral and Emotional Support	"I think it became the space for informal exchanges and commentaries. An infinite hallway with struggles and support"
Connection to Others	"Social media has really helped me connect more with students outside of class and email, especially when I taught virtually during 2020-2021 academic year"
Sense of Community and Belonging	"I have seen an increased need for sharing resources and building communities internationally"

Opportunities for Networking	“The sudden global switch to online only prompted more international networking and working groups in many instances.”
An Outlet to Communicate	“I'm a fan of asynchronous communication. So social media is a nice alternative to Zoom screens, yet a way to stay in touch with different communities.”

Discussion

The results of this investigation serve to highlight the many ways in which instructors use digital social networks for teaching and learning. The findings are in line with other investigations in which digital social networks served to increase outreach, engagement, immediate feedback, and sense of community (Masele & Rwehikiza, 2021; Watson, 2020; Lampropoulos et al., 2021). However, as previously states in the research literature, instructors shared a number of challenges and concerns with the use of digital social networks in teaching and learning (Dennen & Burner, 2017; Greenhalgh et al., 2021; Krutka et al., 2020; Krutka et al., 2019). Comments shared by the instructors who participated in this investigation help establish that some of these challenges and concerns are related to specific platforms and applications, while others are related to the use of social media in education in general (see Table 3).

The findings from these investigations are also significant because they help scholars reflect on future plans for implementation of digital social networks in our instructional practices. As instructors in institutions of higher education further consider innovative learning strategies, it is likely that digital social networks will continue to be contemplated in efforts to engage learners in networked learning practices. Ideally, these networked learning practices constitute experiences in which (a) there is shared responsibility for the learning process amongst all stakeholders involved, (b) learning takes on a collaborative format, (c) there is opportunity for critical reflection, and (d) social exchanges support the knowledge and identity creation (The Networked Learning Editorial Collective, 2020). In fact, researchers and scholars have already highlighted the potential for networked learning initiatives using digital social networks to support learners in higher education (Romero-Hall, 2022; Castellanos-Reyes et al., 2021; Muljana et al., 2022; Shelton et al., 2022; Aydin, 2012, Asino et al., 2021).

This investigation also allows instructors to take a critical stance regarding digital social networks. Faculty must take time to reflect on the role of these social networks in higher education practice. As scholars we need to problematize to gain a full picture of the advantages and disadvantages of any digital technology for consideration in teaching and learning. The reality is that the constant changes in digital technologies give instructors an opportunity to expose learners to new applications and learning strategies. However, at the same time, these constant changes can create confusion, additional work for the student, and involve professional and personal risks. It is imperative that instructors do not make assumptions about the digital skills and knowledge of their students. Adequate judgment can help us, as instructors, to determine when and how the use of educational technology is beneficial for the learner as well as help identify risks as well as when we are creating barriers for a good learning experience.

It is also clear from the results of this investigation that digital social networks have been a major driving force of connection with others since the start of the COVID-19 pandemic. Like

many around the world, instructors and students have seen changes to their physical and digital learning spaces. When forced to isolate in order to reduce COVID-19 infection rates or to recover from illness, instructors and learners have used digital social networks as affinity spaces to engage with other colleagues, classmates, members of their field, and a larger community of professionals.

Limitations

The researchers made every effort to disseminate and share the questionnaire with as many instructors teaching in a higher education setting in different regions of the world. However, the results are more representative of participants residing in North America. Another limitation of this investigation is that the data collected are self-reported by the participants. This self-reported data can be representative of the participants' positionality, biases, and privileges. However, given the number of participants in the investigation the researchers aimed to adequately present all participants.

Future Research

Future research endeavors could consider alternative data collection methods such as social network analysis of public data shared in different platforms. Also, more traditional data collection methods such as interviews and focus groups could provide rich descriptions of how instructors in higher education use and implement digital social networks. Research projects that center culture and specific geographical locations should be considered, in order to better understand contextual ecologies of using digital social networks in colleges and universities for teaching and learning.

Author's Contributions

Dr. Enilda Romero-Hall was a lead researcher in this project. She helped conduct this investigation while affiliated with The University of Tampa, before transitioning to her current role at The University of Tennessee, Knoxville. She participated in the recruitment, data analysis, and writing of this publication.

Dr. Lina Gomez-Vasquez was a lead researcher in this project. She participated in the recruitment, data analysis, and writing of this publication.

Laila Forstmane was a graduate research assistant supported through this grant funded project. She helped with the data analysis, literature review, and writing of this publication.

Caldeira Ripine was a graduate research assistant supported through this grant funded project. She helped with the literature review and writing of this publication.

Carolina Dias da Silva was an undergraduate research assistant supported through this grant funded project. She helped with the questionnaire creation, recruitment, and literature review.

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Funding

This project was funded by a Research Innovation and Scholarly Excellence (RISE) Grant (GR3143) from The University of Tampa.

Ethics Statement

This investigation was approved by the institutional review board of the lead researchers (IRB 19-120).

Conflict of Interest

The authors do not declare any conflict of interest.

Data Availability Statement

Data and materials for this investigation can be shared, if requested in writing via email to the corresponding author. The researchers choose not to make the data public to maintain respondents' confidentiality while presenting rich, detailed accounts related to the topic of the investigation.

References

- Asino, T. I., Gurjar, N., & Boer, P. (2021). Bridging the informal and formal learning spaces with WhatsApp. *The Journal of Applied Instructional Design*, 10(3), 191-208.
<https://dx.doi.org/10.51869/103/tangpb>
- Aydin, S. (2012). A review of research on Facebook as an educational environment. *Educational Technology Research and Development*, 60(6), 1093–1106.
<https://doi.org/10.1007/s11423-012-9260-7>
- Castellanos-Reyes, D., Maeda, Y., & Richardson J.C. (2021). The relationship between social network sites and perceived learning and satisfaction: A systematic review and meta-analysis. In M. Griffin & C. Zinskie (Eds.), *Social media: Influences on education* (pp. 231-262). Information Age Publishing.
- Creswell, J.W. (2009). *Research design: Qualitative, quantitative, and mixed methods approaches* (3rd ed.). Sage.
- Davidovitch, N. & Belichenko, M. (2018). Using Facebook in higher education: Exploring effects on social climate, achievement, and satisfaction. *International Journal of Higher Education*, 7(1), 51-58. <http://doi.org/10.5430/ijhe.v7n1p51>
- Dennen, V. P., & Burner, K. J. (2017). Identity, context collapse, and Facebook use in higher education: Putting presence and privacy at odds. *Distance Education*, 38(2), 173-192.
<http://doi.org/10.1080/01587919.2017.1322453>
- Eckberg, D.A., Densley, J., & Dexter, K. (2018). When legend becomes fact, tweet the legend: Information and misinformation in the age of social media. *Journal of Behavioral & Social Sciences*, 5(3), 148-156.
- Erhel, S., Michinov, N., Noël, A., & Gonthier, C. (2022). Tweet to teach: Using a twitter-based instructional method to improve student motivation and academic outcomes in higher education. *Internet & Higher Education*, 55(4).
<https://doi.org.utk.idm.oclc.org/10.1016/j.iheduc.2022.100876>

- Gosse, C. & Burkell, J. (2020). Politics and porn: How news media characterizes problems presented by deepfakes. *Critical Studies in Media Communication*, 37(5), 497-511 <http://doi.org/10.1080/15295036.2020.1832697>
- Greenhalgh, S. P., Krutka, D. G., & Oltmann, S. (2021). Gab, parler, and (Mis)educational technologies: Reconsidering informal learning on social media platforms. *The Journal of Applied Instructional Design*, 10(3). <https://dx.doi.org/10.51869/103/sgdkso>
- Hodson, J., Gosse, C., Veletsianos, G., & Houlden, S. (2018). I get by with a little help from my friends: The ecological model and support for women scholars experiencing online harassment. *First Monday*, 23(8). <https://doi.org/10.5210/fm.v23i8.9136>
- Kenna, J. & Hensley, M.A. (2019). Utilizing social media to promote civic engagement in the social studies classroom. *The Social Studies*, 110(2), 86-94. <http://doi.org/10.1080/00377996.2018.1524360>
- Krutka, D. G., Heath, M. K., & Mason, L. E. (2020). Editorial: Technology won't save us – A call for technoskepticism in social studies. *Contemporary Issues in Technology and Teacher Education*, 20(1). <https://citejournal.org/volume-20/issue-1-20/social-studies/editorial-technology-wont-save-us-a-call-for-technoskepticism-in-social-studies>
- Krutka, D. G., Manca, S., Galvin, S., Greenhow, C., Koehler, M. & Askari, E. (2019). Teaching “against” social media: Confronting of profit in the curriculum. *Teachers College Record*, 121(14), 1-19. <http://doi.org/10.1177/016146811912101410>
- Meşe, C. & Aydin, G. (2019). The use of social networks among university students. *Educational Research and Reviews*, 14(6), 190-199. <http://doi.org/10.5897/ERR2018.3654>
- Muljana, P.S., Staudt Willet, K.B. & Luo, T. (2022) Adjusting sails for changing winds: Exploring Reddit use for professional purposes in higher education. *Journal of Computing in Higher Education*, 34, 679-707. <https://doi.org/10.1007/s12528-022-09317-2>
- Lampropoulos, G., Siakas, K., Makkonen, P., & Siakas, E. (2021). A 10-year longitudinal study of social media use in education. *International Journal of Technology in Education (IJTE)*, 4(3), 373-398. <https://doi.org/10.46328/ijte.123>
- Romero-Hall, E.J. (2022). Supporting instructional design graduate education through networked learning and institutional social media. In Stefaniak, J. & Reese, R. (Eds.), *The instructional designer's training guide: Authentic practices and considerations for mentoring ID and Ed tech professionals* (pp. 206-218). Routledge. <http://doi.org/10.4324/9781003109938-20>
- Romero-Hall, E.J. (2021). Undergraduate students in online social communities: An exploratory investigation of deliberate informal learning practices. *Journal of Applied Instructional Design*, 10(3), 159-174. <https://dx.doi.org/10.51869/103/erh>
- Romero-Hall, E.J. (2017). Social media in higher education: Enriching graduate students' professional growth outside the classroom. In S. Şad & M. Ebner (Eds.), *Digital tools for seamless learning* (pp. 255-277). IGI Global. <http://doi.org/10.4018/978-1-5225-1692-7.ch013>
- Rosenberg, J., Borchers, C., Burchfield, M. A., Anderson, D., Stegenga, S. M., & Fischer, C. (2022). Posts about students on Facebook: A data ethics perspective (2022). *Educational Researcher*, 51(8), 547-550. <https://doi.org/10.3102/0013189X221120538>
- Shelton, C., Curcio, R., Carpenter, J., & Schroeder, S. (2022). Instagramming for justice: The potentials and pitfalls of culturally relevant professional learning on Instagram. *TechTrends*, 66. <https://doi.org/10.1007/s11528-022-00758-1>

- Sutherland, K., Terton, U., Davis, C., Driver, C., & Visser, I. (2020). Academic perspectives and approaches to social media use in higher education: A pilot study. *International Journal of Teaching and Learning in Higher Education*, 32(1), 1-12.
- Tesch, R. (1990). *Qualitative research: Analysis types and software tools*. Falmer Press.
- Veletsianos, G., Houlden, S., Hodson, J., & Gosse, C. (2018). Women scholars' experiences with online harassment and abuse: Self-protection, resistance, acceptance, and self-blame. *New Media & Society*, 20(12), 4689-4708.
<http://doi.org/10.1177/1461444818781324>
- Watson, E. (2020). #Education: The potential impact of social media and hashtag ideology on the classroom. *Research in Social Sciences and Technology*, 5(2), 40-56.
<http://doi.org/10.46303/ressat.05.02.3>
- Zachos, G., Paraskevopoulou-Kollia, E., & Anagnostopoulos, I. (2018). Social media use in higher education: A review. *Education Sciences*, 8(194) 1-13.
<http://doi.org/10.3390/educsci8040194>

Appendix A

Social Media Use for Teaching and Learning Questionnaire

1. What are the benefits related to the use and integration of digital social networks in teaching and learning (Check all that apply):
 - Student attention to content
 - Student engagement with other peers
 - Student professional branding
 - Resource discovery
 - Student organization and easy to access materials
 - To reflect on the work produced
 - Reaching outside the class
 - Other
2. What are the challenges or deficits that you find when considering social media in teaching and learning? (Check all that apply):
 - Privacy issues
 - Keeping personal and professional accounts separated
 - Students' favorite social media platforms are not the same used by the instructor
 - Students' fear to be judged in public profiles
 - Students do not like to use social media
 - Students may not feel comfortable using the social media platform selected
 - Other
3. If you use social media in your teaching, how do you use it? Please provide an example of a successful application of social media for teaching and learning in one of your courses.
4. What is the most useful social media platform for teaching and learning in your classes? Please use the space provided to explain your response.
 - Facebook
 - Twitter
 - Instagram
 - TikTok
 - Pinterest
 - YouTube

- Weibo
- LinkedIn
- Reddit
- ResearchGate
- Academia.edu
- Publons
- Blogs
- Wikis
- Podcasts
- Social Bookmarking
- Forums
- WhatsApp
- Telegram
- Other

5. What is the most challenging social media platform for teaching and learning in your classes? Please use the space provided to explain your response.

- Facebook
- Twitter
- Instagram
- TikTok
- Pinterest
- YouTube
- Weibo
- LinkedIn
- Reddit
- ResearchGate
- Academia.edu
- Publons
- Blogs
- Wikis
- Podcasts

- Social Bookmarking
 - Forums
 - WhatsApp
 - Telegram
 - Other
6. How have online social media communities played a role for higher education faculty and graduate students during the COVID-19 pandemic?