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Peer-Assisted Learning Online: Peer Leader Motivations and Experiences

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Rebecca Rawson and Christine Rhodes

Abstract

This research explores the different types of motivation that inspired students to engage in an online peer-assisted learning (PAL) leader role. An interdisciplinary online PAL pilot programme at a university in the United Kingdom was reviewed to investigate the experience and perceptions of voluntary online PAL leaders. The purpose of the study was to address a paucity in knowledge about the motivations for this role, specifically from an online perspective, and to guide future online PAL leader recruitment.

A thematic analysis of in-depth qualitative semi-structured interviews was used to determine emerging and relevant themes. Three research questions guided the interviews, and findings are presented in response to these questions.

Findings indicate that different types of intrinsic and extrinsic motivation were key reasons for engaging in the online PAL leader role. The participants expressed an altruistic and empathic approach towards volunteering. Potential personal benefits motivated their participation, including improved study skills, transferable skills, and the possibility of an award. These motivations fell into two significant themes: the awareness of personal gain and the emergence of a desired version of self.

Recommendations are made for the recruitment and training of online PAL leaders and the logistics of the scheme to ensure it is well advertised, accessible, endorsed by academic staff, and combines synchronous and asynchronous modes. It is hoped that this research will be valuable given the shift to online study and blended learning in response to and as an outcome of the COVID-19 pandemic and the value placed on interactive virtual spaces to minimise isolation.

Introduction

The purpose of this study was to investigate the motivations and perceived benefits for students who volunteered to become online peer-assisted learning (PAL) leaders at the University of Derby, a mid-sized university in the United Kingdom, and to learn from their experiences. Motivation has been described as ethical self-formation, where individuals pursue learning as a way of creating a particular desired version of the self (Clarke & Hennig, 2013). This reflects a theme of Vygotsky's (1978) zone of proximal development, which examines the distance between what a learner can do without help and what they can do with support from a more knowledgeable other. Indeed, Bakhtin (1986 in Harvey, 2017) identifies a link between the constant striving to establish one's voice and human growth and creativity. There are two types of motivation: intrinsic and extrinsic. According to Fırat, Kılınç, and Yüzer, (2018),

intrinsic motivation triggers and sustains the interest of distance education students when it comes to learning within their own e-learning environments, while extrinsic motivation provides the potential to gain personal benefits.

Research into the motivation that prompts students studying remotely in an online format to volunteer for the role of PAL leader is limited. Whilst key motivational factors experienced by PAL leaders undertaking a face-to-face role have been identified to include skills development, a willingness to help others, opportunities for rewards, and previous positive experiences with voluntary positions (Gill & McConnell, 2016; Sneddon, 2015), these may not reflect the drivers for online students. Indeed, Tibingana-Ahimbisibwe et al. (2022, p. 15) identified a paucity of research in the context of "online PAL for fully online distance learning students in higher education (HE)." Further investigation is therefore needed to fully realise the value of PAL in an online format. We intend to provide information to support future implementation, recruitment, and training for online PAL schemes. This is an output that will be particularly valuable given the shift to online study and blended learning in response to and as an outcome of the COVID-19 pandemic and the value placed on interactive virtual spaces to minimise isolation and feelings of loneliness (Gillet-Swan, 2017; Kotera et al., 2020; Shah et al., 2020). This output also supports the achievement of the United Nations (2015) Sustainable Development Goal 4 for Quality Education, which aims to "ensure inclusive and equitable quality education and promote lifelong learning opportunities for all."

Literature Review

PAL is support for students, by students, usually taking the form of regular discussions, sessions, or workshops designed to develop a learning community. As stated by Longfellow et al. (2008, p. 95), "whilst teachers may be experts in their subject area, students are experts at being students and thus are arguably better placed to lead novice students towards becoming expert students." Bugaj et al. (2019) identified this connection as cognitive congruence, specifically referring to the assumption that PAL leaders and students will share interpersonal qualities and have similar learning experiences, thus facilitating an open, accessible, and welcoming space. Huijser, Kimmins, and Evans (2008) also emphasised the value of the informal environment afforded by PAL and the approachability of peer leaders because they are students themselves.

PAL in HE is a well-established practice worldwide and a powerful pedagogy that benefits both students and tutors (Rutherford et al., 2017). Notable benefits of PAL for the attendees include the development of both subject knowledge and academic skills as well as familiarisation with institutional processes and expectations (Hammond et al, 2010; Huijser, Kimmins, & Evans, 2008; Capstick, 2004). The PAL leaders, on the other hand, experience greater student empathy, stronger staff–student interaction, personal growth, improved management, and communication and leadership skills (Young, Hoffman, & Reinhardt, 2019). Further benefits include improved motivation and confidence as well as an increase in collaboration amongst the PAL leader group (Best et al., 2011). Research also suggests that PAL leaders find the role to be empowering and of benefit to their own development (Scott et al., 2014).

Leadership can be defined in a variety of ways yet is most frequently outlined as "a process of influencing in which an individual exerts intentional influence over others to structure activities and relationships in a group or organisation" (Yukl et al., 2019, p. 775). Indeed, the benefits of PAL leadership are widely acknowledged (Gafni Lachter & Ruland, 2018; Skipper & Keup, 2017; Giles, Zacharopoulou, & Condell, 2016). In the United States, for example, findings show that an academic PAL leadership experience was a strong, positive predictor of self-reported academic performance (Young, Hoffman, & Reinhardt, 2019). This is further supported by Hoiland, Reyes, and Varelas (2020) who found that serving in this role positively impacted the academic mindset. From an educational standpoint, leadership may be exercised by teams as well as by individuals (Bush, 2018). Leadership plays an increasingly significant role in the implementation and success of online learning goals as well as an important role in motivating students to utilize online learning (Hofstede, Hofstede, & Minkov, 2005). Leadership can also be viewed as a process of influence based on specific goals and values that align with the vision of the educational establishment, where the vision is demonstrated by leaders who work to gain the commitment of all stakeholders (Bush, 2018). The vision at the University of Derby (2021a) includes a purpose to empower people across the globe to achieve their potential and make a positive contribution to society, intentions that align with the role of a PAL leader.

The University of Derby has over 15,000 full-time equivalent students (HESA, 2021) and an established PAL programme with 30 PAL leaders available for all on-campus students tailored to their subject discipline. The scheme is driven by the Student Experience Framework and focuses on supporting "the transition of students into university life through peer-supported sessions, with experienced students giving guidance to new students" (University of Derby, n.d.), thereby aligning with previous points from both Longfellow et al. (2008) and Huijser, Kimmins, and Evans (2008). The University of Derby Online Learning (UDOL) department, which has approximately 5,000 students from across 120 countries (University of Derby, 2021b), does not, however, have an established PAL programme. This aligns with findings from Motzo (2016) who stressed that interdependence and social presence in online learning have historically been overlooked, with importance placed on student autonomy. Members of the UDOL faculty initiated and piloted an online PAL scheme to deliver support for online students with the intent of providing an equitable campus experience, aligning with Sustainable Development Goal 4. An interdisciplinary approach to PAL was adopted for this online pilot scheme and PAL leaders were recruited from four different disciplines within the UDOL portfolio including nursing, counselling and psychotherapy, environmental management, and health and social care. Only students from three of the four disciplines expressed an interest in the scheme: no volunteers from the environmental management portfolio came forward. The students, four in total, were then invited to take part in online training for the new online PAL leader roles in a voluntary capacity.

Huijser and Kimmins (2006, p. 6) emphasised that online PAL schemes can "significantly enhance the learning experience for an increasingly diverse student population," a valuable outcome for student users. The number of online versions of PAL is expanding (McMaster & Fuchs, 2016), and as new technologies develop, increased possibilities for practice emerge (Stephenson, 2001). Evidence from users of online PAL schemes demonstrates the popularity

and benefits (Evans & Moore, 2013), namely improving student engagement through the flexibility provided by an online format (Watts, Malliris, & Billingham, 2015). Online PAL schemes also offer support and connection between peers and have the potential to reduce academic isolation and loneliness (Shah et al., 2020; Goldrick & O'Higgins-Norman, 2012). Furthermore, they have the potential to promote and enrich the cultural capital (Bourdieu, 1984) within online learning establishments through technical, emotional, and multinational recognition and development (Holden, 2010). That said, it has been reported that online PAL leaders have expressed concern over a variety of issues such as their own potential limitations and limited student engagement (Rutherford et al., 2017).

For an online PAL programme to be both effective and efficient, PAL leaders need to have established technical and linguistic skills (Watts, Malliris, & Billingham, 2015) and be enthusiastic individuals with proven competent performance (Malliris, 2012). Huijser and Kimmins (2006) advise that specific training is required to prepare online PAL leaders to facilitate peer support in an online environment. For the purposes of this research, a one-year pilot study, four students from different subject areas and at different stages in their studies were trained as PAL leaders. The scheme was hosted on Microsoft Teams and supported by three academic staff, who supervised the online PAL space. The online platform facilitated an asynchronous mode of student interaction for the 500 students from across the UDOL portfolio who opted to enrol in the programme. The use of Microsoft Teams supported both student-centred learning and student ownership of their participation, given that they could control when and how often they logged in and their engagement in discussions, which are noted benefits of PAL (Huijser, Kimmins, & Evans, 2008). Whilst Watts, Malliris, and Billingham (2015, p. 94) noted that the "trend in online PAL pilots is inclin[ed] towards synchronous modes, in line with technological developments," this pilot chose to utilise the more established asynchronous mode of delivery to accommodate the international student body at UDOL within their different time zones.

Research Questions

The following research questions were used to guide this study:

1. What are the perceived benefits that motivate students to become online PAL leaders in an online learning environment?
2. Do online PAL leader roles facilitate transferable skills?
3. What can be learned from the online PAL pilot to improve PAL recruitment and training for future implementation of PAL to online programmes?

Methods

Data collection

Participants for this research study were recruited from the online PAL leaders on the UDOL PAL pilot programme. The four PAL leaders included two male and two female students all studying part time and working full time in their professional fields. Three were international students, two of which had English as their second language, and one was based in the UK. All were studying online modules at UDOL, three at the undergraduate level and one at the postgraduate level. This dynamic reflects the diversity and demographics

of UDOL students using the PAL pilot scheme. Following approval from the University of Derby Ethics Committee, a study information sheet was distributed to all four students in this group via the university e-mail. All four students chose to participate and were asked to complete the consent form, and an individual interview date was set. The researchers are UDOL academic staff who were involved in the recruitment process for the online PAL leaders and subsequently established and managed the online PAL pilot scheme. No incentives were provided to participants to engage in this research: online PAL leaders volunteered their time for the study.

Individual semi-structured interviews were used as the primary source of data collection as they provided the opportunity for prior planning whilst permitting flexibility to explore participant responses, therefore allowing for more in-depth discussion (Wethington & McDarby, 2015). Open-ended questions enabled an understanding of a particular experience (Tran et al., 2016) and were used to explore the motivation and perceived benefits of becoming an online PAL leader. Participants were asked the following open-ended questions:

- What are the motivations for online student participation in PAL leader training?
- What is the importance of peer benefits when adopting a PAL role?
- What do you consider to be the transferable skills gained from the PAL role?
- Do you have any recommendations for PAL recruitment and training for the future implementation of PAL to online programmes?

A variety of probes were used in addition to these questions to elucidate deeper meaning, tools which Arsel (2017) contends enable a deeper understanding of the subject matter. For example, when participants discussed the benefits of becoming a PAL leader, if their comments were restricted to academic benefits, the interviewers probed into the possibility of any additional transferable skills, such as professional or other skills related to the workplace. Thirty-minute interviews were conducted with three of the four online PAL leaders using the Microsoft Teams platform and were recorded for subsequent transcription. The fourth online PAL leader was unable to commit to an interview and therefore provided responses via e-mail. To ensure the anonymity of the four online PAL leaders, each was assigned a code and will be referred to in this paper as P1, P2, P3, and P4.

Data Analysis
The purpose of the study was to explore the experience of a PAL leader rather than to gather categorical information. Therefore, a thematic analysis of the in-depth qualitative semi-structured interviews was employed using the Braun and Clarke (2006) guidelines to determine emerging and relevant themes. The three guidelines include familiarisation, generating initial codes, and themes. Details on each process are described below.

Familiarisation
Interview data was read repeatedly to establish initial interpretations and patterns.

Generating initial codes

Coding is a fundamental aspect of data analysis that enables researchers to break down their data to make something new (Elliot, 2018). It is important to note that the codes identified at this stage are not the same as themes (units of analysis), as the latter are generally much broader. In this study, coding was approached with the research questions in mind, and descriptive coding was employed to "summarise the primary topic of the excerpt" (Saldana, 2009, p. 3).

Themes

Codes were categorised into potential themes by focusing data analysis at a broader level. Using the Braun and Clarke (2006) mind map process, each code was attached to a thematic "pile." The codes were categorised into themes, and no codes were identified as an outlier. Vygotsky's (1978) zone of proximal development informed the clarification of themes for this data analysis.

Codes were read alongside the specific extracts from the interview data to further refine the differences between the themes. At this stage, the researchers returned to collated data extracts to refine each theme and ensure an internally consistent account with accompanying narrative (Braun & Clarke, 2006). Both researchers conducted independent analyses of the data and reviewed both sets of findings before defining and naming emergent themes. Investigator triangulation is a collaborative strategy using multiple investigators to decrease the potential of bias and increase the validity and reliability of the research findings (Moon, 2019).

Results

Research question 1: What are the perceived benefits that motivate students to become PAL leaders in an online learning environment?

Each participant was asked to identify the key benefits they perceived as motivation for joining the online PAL scheme as online PAL leaders. Both intrinsic and extrinsic motivation were reported: intrinsic, driven by a sense of purpose and empathy in helping fellow students, and extrinsic, where the students recognised opportunities to benefit personally from both an academic and a professional standpoint.

Intrinsic motivation. Most participants reported altruistic reasons as the most significant motivational factor for becoming online PAL leaders. Having experienced feelings of anxiety and confusion at the beginning of their own online studies, participants were motivated by a sense of empathy, cooperation, and willingness to be of assistance.

> "I know what it's like to feel concerned, and that motivated me. I wanted to help other students" (P1).

> "I enjoy helping others, something that comes naturally to me, and thus it seemed like a good idea to take part" (P4).

P3 also noted that "Helping fellow students [...], sharing tips and knowledge of an experience or journey" was a key motivation. Indeed, connecting with other students was reported as a two-way street, where the leaders saw an opportunity to increase their own feelings of connection with other students

who were studying online, thus confirming the findings by Goldrick and O'Higgins-Norman (2012) that online PAL schemes are a means to provide support and connection between peers and help to reduce academic isolation.

> "I see it as a way of connecting with other students and see the kind of problems other students are going through and also a way to feel relaxed because I am not alone" (P2).

The participants in this study reported positive reinforcement in the form of praise and affirmative feedback from their peers who were participating in the PAL pilot scheme, which in turn provided intrinsic motivation to continue in the role. Feelings of pride and accomplishment were expressed:

> "There was this occasion where a question was posted on PAL by a student who was from a different module. The question was about the library, and I responded to that student. The student posted that [they] had done that, and it was rewarding to see that I was appreciated" (P2).

> "The pride of being involved in university leadership. Being a part of it and knowing that I can do it" (P3).

> "It was a challenge and I now know I can do it" (P4).

The motivation and confidence expressed in these excerpts reinforces the findings of Best et al. (2011) and emphasises the sense of empowerment from PAL leadership identified by research from Scott et al. (2014), both of whom identify a variety of benefits gained from a positive PAL leadership experience.

> **Extrinsic motivation.** Alongside helping others, the participants recognised several personal benefits as motivation for becoming PAL leaders. The most predominant theme related to improving their own study skills and academic ability.

> "I saw it as a way of increasing my own knowledge and ease of access around the different learning toolkits and the platform itself. It helped solidify and discover resources. I discovered some new ones such as academic writing exercises, the 'Enhance your Learning Toolkit,' writing tips, e-books, as well as increasing my critical thinking, which contributed to my academic development and helped me to be the best I can be" (P3).

> "I saw it as an opportunity of improving my own leadership, and this would be conversational and writing skills, because we work through Teams, as well as improving my own orientation around the university resources and platform (P3).

Additional extrinsic motivation was identified by participants to enhance the PAL leaders' professional careers and to provide work-related benefits, which corresponds with their view of the transferable skills afforded by the role. This aligns with research from Graves and Sarkis (2018) who found that external motivation in the workplace, such as the adoption of leadership roles, can have a positive and significant impact on a variety of employee attitudes. The UDOL pilot PAL scheme had such an external motivation on P1, who emphasised that

their experience as a PAL leader has since been channelled into their work as a "mentor in nursing." This was supported by comments from P3, who noted that PAL "seemed like a very exciting opportunity with great potential […] to increase understanding of organisational leadership," an output which will also support future transferable skills.

Finally, some participants were motivated by the possibility of a reward and the opportunity to add their experience as an online PAL leader to their resume. P1 stated, "For me, I could add this to my CV," and P4 explained, "I understand there is some level of acknowledgement at graduation [and] there was mention of a participation award." However, it is worth noting that according to Delello et al. (2018), the successful implementation of extrinsic motivators in the form of digital badges and awards requires advance planning and an indication of the usefulness of these awards to students in HE. This was not a driving factor in the planning of the PAL pilot scheme.

Research question 2: Do online PAL roles facilitate transferable skills?
The participants in this study were undergraduate and postgraduate students engaging in online learning as a means of enhancing their professional careers. This represents the majority of UDOL students. As such, the link between becoming an online PAL leader appeared to offer opportunities to practice a variety of skills that would benefit them in the work environment. The most predominant transferable skill identified by the participants was the leadership role and the chance to practice leadership skills, benefits alluded to by Bugaj et al. (2019). P1 found that "It motivated [them] to be a better leader" whereas P2 stated that "Leadership definitely, solidification of confidence reaffirming confidence" were welcome outcomes.

Digital skills were highlighted by several participants, a benefit also noted by Bugaj et al. (2019). P3, for example, stated that the use of Microsoft Teams allowed them to "get used to another platform and see how it works," and P2 valued the opportunity to learn how to use tools such as Microsoft Teams and felt the training on this would help the PAL leaders to encourage students. Further transferable skills identified were connected to the individual participants' specific career paths:

> "I thought that I stand a chance of learning how to become a coach" (P3).

> "Recently I have been looking at studies on COVID-19. A lot of jobs have gone online with people who are going back to learn IT and the internet and computer skills. The diversity of being a member of the PAL has actually enriched me to see where I find myself. This makes me wonder how I can connect counselling to other branches. Yesterday I was able to connect with a researcher in 'Care' and 'Dementia.' We touched on the topic of healthcare, and one of the ideas is that I can join what I have learned with HC and management" (P2).

P3 stated that they had added the PAL leader role to their LinkedIn profile, demonstrating their perception of the wider value of this position and its transferable skills as well as the opportunity to share this with the professional community via social networking, further confirming research by Delello et al. (2018) on extrinsic motivators.

A final benefit associated with this interdisciplinary PAL scheme was the knowledge gained by the online PAL leaders from supporting students across a variety of subject disciplines. This finding is in line with the study from Kimmins and Evans (2008) as it relates to the widening of student knowledge in different subject areas. P2, for instance, recalled that "someone doing their master's degree in an environmental programme asked questions. This made me actually go online and be aware of different topics, and I got some insight [through] searching the online library, which I couldn't have done if I had not responded to the question to that student."

Research question 3: What can be learned from the PAL pilot scheme to improve PAL recruitment and training for future implementation of PAL to online programmes?
While the participants provided positive feedback relating to their experience as PAL leaders and emphasised the value of the pilot for providing "online students the same service as campus students" (P1), an endorsement of the equitable experience this PAL pilot had aimed to achieve in line with Sustainable Development Goal 4, they also made several suggestions to improve the future of the online PAL programme. These suggestions fell into two broad areas: firstly, the training, logistics, and location of the PAL area and secondly, the benefits and recognition of the PAL leader.

All participants recommended maintaining the separate Microsoft Teams platform rather than hosting PAL on the university Virtual Learning Environment (VLE). For instance, P3 stated, "It is handier for me that it is separated." P1 reinforced this, noting that "One [area] for study, one [area] for PAL is better than combined." PAL leaders would, however, prefer to see the use of a specific tile on the VLE platform for ease of access to the PAL programme site. P4 felt "the PAL scheme wasn't very well advertised," and both P3 and P4 recommended adding a link to the scheme on the university homepage. P3 stated that "If there was a tile on the page […] you could click on it to see what PAL is," whereas P4 noted that "there could be a toggle/square on the homepage." As this was a pilot scheme, it was intentionally not advertised to the entire UDOL student body—only those students in the targeted subject areas from which the PAL leaders were recruited. Moving forward with the scheme and establishing it as a provision for all online students will require wider publicization. However, care will need to be taken with any expansion of the scheme, as results from the research of Watts, Malliris, and Billingham (2015, p. 95) identify that efforts to raise awareness of PAL opportunities can be disappointing, and content of such "promotion needs to reflect the context in which online PAL is proposed."

With regards to training, P1 recommended "a crash course (yearly) to keep ourselves updated on what is and what is not our role." P3, however, considered a PAL leader-led approach and suggested to "explicitly encourage PAL leaders to go and get lost in the resources so it benefits both the leader and the students." This reinforced the value of the programme for both the leaders and the students, as the participants focussed on improvements that would benefit not only themselves but also the wider student body, demonstrating the intrinsic and extrinsic motivations previously discussed.

From a benefits perspective, participants offered a variety of suggestions. These included the provision of digital badges as incentives or rewards, experienced PAL leaders to be awarded a consultant status for use in recruitment and training of new PAL leaders, and the provision of encouragement from wider academic staff to reinforce the value of the role (P2, P3). This aligns with previous comments about extrinsic motivators and as emphasised by Delello et al. (2018); these must be planned by the academic team.

Discussion

The purpose of this study was to explore what motivates students to volunteer as online PAL leaders, learn from their experiences, and identify the benefits and value of their role to inform future recruitment and training. The interviews provided rich data for both feedback on the pilot programme and feedforward for future online PAL schemes. In terms of the motivations for participating as PAL leaders, two key themes emerged: an awareness of personal gain and the emergence of a desired version of self.

The first theme, the emergence of a desired version of self, indicated that the participants believed the role enabled them to address shortcomings in their own personal skillsets. These included lack of confidence, where confidence was built, and improved academic skills such as writing, where these skills were perceived as deficient. These findings corroborate the research outcomes from Best et al. (2011), Goldrick and O'Higgins Norman (2012), Gill and McConnell (2016), and Sneddon (2015) and highlight similarities between motivational factors for face-to-face and online PAL leaders. Increased opportunities to connect with other students and lessen the sense of loneliness and isolation were also identified during the interviews, reinforcing the importance and value of an online PAL provision to provide an equitable campus experience. The experiences from the COVID-19 pandemic have also highlighted the value of student connections, such as those afforded by the online PAL scheme, which have the potential to reduce reported loneliness and isolation (Shah et al., 2020).

The second theme, an awareness of personal gain, relates to those unexpected benefits that transpired because of the experience as an online PAL leader. The participants reported that their involvement with other students enabled a window into different academic fields beyond their own specific path and enabled familiarity with the work required at different academic levels. P2 reported that this experience inspired them to study at master's level, having worked with master's-level students through the online PAL scheme. This reinforces the findings of Bunting (2020, p. 3), who stated that "the very best peer learning programs […] open the door for ongoing learning and success among students, even after their formal peer learning role has ended." The awareness of personal gain as a motivation to volunteer in a PAL leader role was also reflected in research for face-to-face schemes (Gill & McConnell, 2016; Sneddon, 2015). However, the interdisciplinary approach adopted by this online scheme provided an opportunity to interact and learn from students from different disciplines and at different stages in their university education, which further enhanced the educational and personal growth of the online PAL leaders.

A recurring comment related to the small number of questions posed by the students enrolled in the scheme and the perceived low engagement, which aligns with the limitations of engagement noted by Rutherford et al. (2017). P1 had expected more questions from the students and considered that "this could be a good sign that students are doing well or [...] could be a sign they are too scared to ask." A consideration of optimum group size for PAL schemes is offered by Fredriksson et al. (2020), who specifically stated that if the number of attendees at a session is smaller than 4–5, the collaborative learning conditions will be less effective as, when there are too few attendees, the collective knowledge and viewpoints may be too small and the PAL leader too prominent. This echoes the report by Lundmark et al. (2017), who identified that PAL leaders can dominate centre stage and resist operating on the side lines. Therefore, the asynchronous nature of the scheme with one or two students posting at irregular intervals could have exacerbated the prominence of the PAL leaders during this online pilot. This furthermore contradicts the reported benefit of improved student engagement through the flexibility of online PAL schemes (Watts, Malliris, & Billingham, 2015). Fredriksson et al. (2020) specifically stated that the ideal number of students in a face-to-face session is about 11–12. Whilst this may not apply directly to an online scheme that uses an asynchronous mode of student interaction, it could guide future interaction through the establishment of drop-in sessions with the PAL leaders, which would have the potential to encourage a larger group of students to be active on Microsoft Teams at one time. Indeed, recommendations from Watts, Malliris, and Billingham (2015, p. 101) include "trialling different forms of online PAL"; therefore, the idea of adopting a combination of synchronous and asynchronous PAL support would be a valuable approach to test in future research.

The feedforward from the PAL leaders provides a platform to enhance the current online PAL programme. Their recommendations regarding increased input from other academics supports the commentary from Zhang and Bayley (2019), who suggest that staff could discuss opportunities for peer learning in their classes to promote student awareness and encourage involvement to build a community of learners. This academic endorsement would also serve to address the issue of engagement above and should be pursued by UDOL to facilitate a more actively utilised online PAL scheme.

Finally, a key driver for this online PAL pilot scheme was to provide an equitable campus experience for online students at UDOL who, until this programme, did not have access to PAL leaders for support. This was a vision shared by the PAL leaders, who highlighted the benefits of providing this resource to the online student community. Equitable and inclusive learning is central to the achievement of the United Nations (2015) Sustainable Development Goal 4 for Quality Education. Through the provision of an online PAL pilot scheme, UDOL has provided an opportunity for an inclusive and equitable experience to its global student base, which covers 120 countries and a range of subject areas. The online pilot also allowed the students who volunteered as PAL leaders to experience a new role, one that had not previously been available to them. The equitable and inclusive experience thereby applies to these students, too, who had the opportunity to benefit from the widely acknowledged advantages associated with a PAL leadership role.

Conclusion

PAL schemes are well established in HE, particularly in on-campus settings, providing welcome assistance to newly enrolled students by their more experienced peers. Although the number of online PAL schemes is increasing, research about their efficacy, value, and success rates is scant at this time. This research provides an insight into views of online PAL leaders, adding to the emerging knowledge base regarding factors that motivate students to become online PAL leaders prior to accepting the post and their experience of the role in retrospect.

Motivation was reported within two broad categories: intrinsic and extrinsic. Intrinsic motivation was related to an altruistic and empathic approach to helping other students to adapt to study in an online environment. Extrinsic motivation included the potential for PAL leaders to improve their own study skills, to gain transferable work-related skills, and the possibility of an award to acknowledge their involvement. Participants reflected positively on their experience as online PAL leaders and reported several benefits above and beyond those anticipated. These fell into two key themes: an awareness of personal gain and the emergence of a desired version of self.

Suggestions for future development of online PAL schemes provide ideas, inspiration, and recommendations on the training of online peer leaders and the logistics of the scheme. From a motivational standpoint, the participants suggested that digital badges or other tangible rewards would serve as incentives and aid in the recruitment of new leaders. The offer of "consultant" status for PAL leaders was also recommended as a strong influencing factor for future programmes. It was noted that, while the participants worked independently and felt supported, wider engagement and recognition from a broader staff base, not restricted only to those managing the programme, would add encouragement alongside subject-specific guidance, when needed. Additionally, and from a practical perspective, the participants recommended ensuring the scheme is well advertised and accessible, endorsed by academic staff, and combines synchronous and asynchronous approaches to student support. They also suggested that the online PAL site have its own separate toggle or tile on the university dashboard for ease of access for all involved, including leaders, students, and staff.

While this research has identified several points that contribute to the emerging knowledge base, several limitations must be acknowledged. The sample size (four) and the selected online PAL student base represent a small minority of the much wider schemes available in other universities. It was not feasible to use focus groups or to embed the PAL leaders in an online classroom setting as the participants in this pilot group were working full time, studying asynchronously in different academic areas, and living in different countries. These ideas could, however, provide inspiration for future study. Additionally, the research revealed that the online PAL leaders for this pilot scheme came from a counselling and nursing background, whereas students from an environmental management portfolio declined the offer. This element was beyond the scope of this research but was an interesting additional outcome. Future research could therefore enable a determination of the different types and strength of the drivers that motivate students from different academic backgrounds and consider whether these change over time.

With an increasing number of HE institutions engaging in online education and blended learning in response to and as an outcome of the COVID-19 pandemic, it is hoped that this research study will shed light on the importance of providing an equitable and inclusive experience for all online students. Additionally, we hope that the value of utilising interactive virtual spaces to minimise feelings of isolation among students will be of interest and importance to practitioners who continue to use existing online PAL schemes and to those who are in the process of transitioning PAL schemes to an online format. There are clearly opportunities for creative and transformational thinking and practice as we move towards what Salmon (2019, p. 104) describes as "ubiquitous connectivity and the symbiosis between humans and machines."

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