

Learning technology as contested terrain: Insights from teaching academics and learning designers in Australian higher education

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Learning and teaching is no longer the exclusive domain of teaching academics and is increasingly reliant on third-space professionals, in particular learning designers. The sharing of the design of the learning and teaching space is underlined by the increasing collaboration between teaching academics and learning designers. This qualitative study explores how these two key stakeholders understand learning technology, which is critical to shaping the teaching and learning process in contemporary higher education. Foucauldian discourse and power were employed as the theoretical lens to analyse semi-structured interviews with 12 teaching academics and 5 learning designers at a large Australian university. Although learning designers and teaching academics share a mutual interest in improving the learning and teaching process, the findings also revealed five discourses where practice was contested: centralisation, surveillance, institutional homogenisation, responsibility, and efficiency. This article calls for a new focus on the collaborative aspect of the learning design and teaching process that is constantly (re)negotiated between these two main stakeholders.

Implications for practice or policy:

- Teaching academics and learning designers should develop practices that recognise the collaborative nature of learning technology in higher education.
- Universities should develop practices and policies that reduce tensions within the five identified discourses of learning technology to ensure a more collaborative teaching academic-learning designer relationship.

Keywords: teaching academics, learning designers, learning technology, Foucauldian discourse analysis

Introduction

The global learning technology market is estimated to increase from \$200 billion USD in 2019 to \$375 billion USD in 2026 (Statista, 2022). Such a growth rate has fuelled the demand for third-space professionals in higher education, and in particular learning designers with key pedagogical and digital skills in technology-enhanced learning. Higher education's focus on using learning technologies was further compounded by the COVID-19 pandemic (Al-Marroof et al., 2020), which increased the need to employ learning designers (Adedoyin & Soykan, 2020). Teaching academics (along with students) have long been considered the key stakeholders in the learning and teaching process in higher education (Ertmer, 2005). However, the increasing integration of learning technologies has led to an emergence of learning designers being more influential in the design of learning environments (Halupa, 2019; White & White, 2016). This has prompted a greater focus on the relationship between teaching academics and learning designers (Chen & Carliner, 2021) and a recognition of the value of collaboration in the learning and teaching space (Richardson et al., 2019).

The complexities of the learning and teaching process involving these two stakeholders remains not well understood and under-researched (Heggart, 2021; White et al., 2020). Teaching academics are not only required to have content and pedagogical knowledge, but are increasingly expected to possess technological knowledge and skills (Brinkley-Etzkorn, 2018). Given the accelerated learning technology adoption, potential underlying tensions generated from sharing the learning and teaching space between teaching academics and learning designers could lead to challenges to the advancement of learning and

teaching in higher education. While studies from the learning designer's perspective aim to clarify and reduce the ambiguity associated with the role of the learning designer as a third-space professional (White & White, 2016), there is insufficient research that examines the tension between the teaching academic and learning designer in relation to learning technology adoption. Learning technology adoption research is often conducted from the perspective of teaching academics (Liu et al., 2020). This limited focus risks a somewhat narrow and impaired understanding of how learning technologies are adopted in higher education.

In response, this qualitative study aimed to explore how teaching academics and learning designers understand discourses, in the Foucauldian sense (Foucault, 1977), of learning technology in higher education. An analysis of learning technology discourses adopted by the two stakeholders can provide insights into how more productive and collaborative teaching academic-learning designer relationships could be built.

Learning technology discourses in higher education

The learning technology field focuses on the adoption and use of technology to support learning and teaching (Oliver, 2000). Learning technology research in higher education has been dominated by studies that examine the impact of adopting and using learning technologies (Müller & Wulf, 2020) as well as the factors that influence the adoption and use of learning technologies (Liu et al., 2020). Multiple stakeholders – such as institutional leaders, teaching academics, and students – are involved in shaping the adoption and use of learning technologies. However, teaching academics have been the dominant focus in educational technology research as they are the content experts and have traditionally been responsible for the development of university courses. Behavioural science, diffusion, information systems, and institutional theories have been used to explore the elements that influence the adoption and use of learning technologies (Lai, 2017; Oliveira & Martins, 2011; Saghafian et al., 2021). While such research is essential to understanding learning technology, the overwhelming focus on teaching academics' perspectives could limit an understanding of how learning designers influence learning technology adoption in an increasingly shared learning and teaching space.

The acceleration of technology-enhanced learning in higher education has induced a corresponding increase in the number of learning designers within the sector (Chen & Carliner, 2021). Although there are different roles and titles employed in higher education, including instructional designers (Caskurlu et al., 2021) and educational technologists (Ritzhaupt et al., 2018), the term learning designers has been prevalently used in the Australian higher education context (Davey et al., 2019; Heggart, 2021). The use of the term learning designers is ideal for this paper because it refocuses learning design through the adoption and use of learning technologies to improve learning and teaching (Heggart, 2021), rather than the more instrumental technology focus of educational technologists. In the context of Australian higher education, learning designers have become increasingly crucial to building pedagogical innovations supported by the adoption and use of learning technologies (Slade et al., 2020). Functioning as “third space blended professionals” (White et al., 2021, p. 161), learning designers provide support to teaching academics in relation to the adoption and the pedagogical use of learning technologies (Abramenka-Lachheb et al., 2021). The increasing demand to adopt learning technologies in higher education has elevated the significance of the role learning designers play in shaping the learning and teaching process, which has traditionally been dominated by teaching academics (Chen & Carliner, 2021). However, research on learning designers has been largely limited to studies that examine their roles and competencies in supporting the learning and teaching process (Abramenka-Lachheb et al., 2021; Xie et al., 2021).

Since the learning and teaching space is increasingly shared between teaching academics and learning designers, the relationship between these two stakeholders has generated recent interest (Chen & Carliner, 2021). This is especially critical in the Australian higher education context in which learning designers and teaching academics often collaboratively design online learning environments (Davey et al., 2019). Although trust and communication are seen as significant in facilitating collaboration between

these two stakeholders (Bawa & Watson, 2017; Chen & Carliner, 2021), underlying tensions can be seen to underpin their relationship to some degree. For instance, while there might be institutional strategies put in place to shape how teaching academics use learning technologies (Rudhumbu, 2020; Thanaraj & Williams, 2016), ambiguity in how teaching academics perceive the roles of learning designers is indicative of the tensions between the two stakeholders (Halupa, 2019). Furthermore, questions about possible resistance related to the use of learning technology remain unanswered (Richardson et al., 2019). Thus, while existing research could illuminate strategies to promote enhanced collaboration, current research directions neglect to consider underlying tensions embedded within the power relations between teaching academics and learning designers, and the implications of such tensions. Previous studies have revealed strains between teaching academics and information technology professionals as they sought to gain greater influence within universities (Salmon & Angood, 2013). Such tensions could be further exacerbated by the ambiguity of the roles and a lack of understanding of the competencies of learning designers by teaching academics (Halupa, 2019). Prior research has highlighted deficiencies in allowing critical voices within this relationship to emerge (Pan & Thompson, 2009). Without a critical stance, alternative discourses may not be uncovered, thus limiting an understanding of potentially valuable learning technology discourses. Therefore, more research into discourses of learning technology is crucial to understanding how teaching academics and learning designers can develop more productive relationships that may improve learning and teaching. To address this gap, a key research question guiding this study was formulated: How has the learning and teaching process been influenced by the combined input of teaching academics and learning designers in the Australian higher education context?

Method

With critical theory as the interpretive framework, reality is known through “the study of social structures, freedom and oppression, power, and control” (Creswell & Poth, 2017, p. 36). Using critical theory allows for the analysis of underlying power relations that influence how decisions are made in relation to the adoption and use of learning technologies. This qualitative case study thus used critical theory as an interpretive framework to examine how teaching academics and learning designers understand discourses related to learning technologies. The study complied with the required ethical clearance by University X’s Human Research Ethics Committee (Approval number: 2021000001).

Participants and context

A large metropolitan Australian university with over 40,000 students was chosen as the case study due to its emphasis on technology and innovation in learning and teaching. Participants were selected based on a combination of an initial convenience sample, followed by a snowballing technique and unique sampling method, which allowed for the intentional selection of individuals and sites to provide a richer understanding of the research problem (Creswell & Poth, 2017). Participants who had taught, or supported wholly online or blended undergraduate courses, were targeted in order to enable the researchers to gain deep insights into the collaborative efforts (involving teaching academics and learning designers) that shaped educational practice. Participants were recruited via email based on the selection criteria outlined in Table 1. The names of the participants have been anonymised to protect the confidentiality of participants, and they have been labelled as teaching academic n and learning designer n, for example, learning designer 3.

Table 1

Participant type, selection criteria, sample size, and faculty

Participant type	Selection criteria	Sample size	Faculty
Teaching academics	Teaching in wholly online or blended undergraduate courses	12	Education ($n = 2$) Engineering ($n = 6$) Business ($n = 3$) Science ($n = 1$)
Learning designers	Supporting wholly online or blended undergraduate courses	5	

Data collection

Research interviews were selected as the key data collection method due to their capacity to generate rich insights aligned with the research question. A pilot interview was carried out to allow for adjustments to the wording of the interview questions (Merriam & Tisdell, 2015). Prior to the interview, consent was sought from the participants with regards to the video and audio recording of the interview. An interview guide was used to conduct the semi-structured interviews, which aimed to address the research questions formulated in this research. Semi-structured interviews of 1 hour duration were conducted with each of the participants. Participants were asked “predetermined but open-ended questions” using a specific order that could change depending on the participant’s responses (Ayres, 2008, p. 810). For teaching academics, 2 interviews were conducted face-to-face, while 10 interviews were conducted online via a synchronous video-conferencing tool – Zoom. All 5 interviews with the learning designers were conducted via Zoom. The interviews were audio-recorded and transcribed using an AI-powered speech-to-text transcribing tool – Otter. The transcripts were then emailed to the participants for them to verify the accuracy and completeness of the responses.

Data analysis

A Foucauldian approach to discourse analysis was used to analyse the data as it recognises that power relations, knowledge and discourse are interconnected (Carabine, 2001). Foucault’s (1977) concepts of power and discourse were used to deductively analyse the data to reveal how power operates in shaping the reality of how learning technologies were adopted and used by teaching academics and learning designers. The analytical process involved interrogating the collected data to illuminate the structures and systems that constituted the discourses related to learning technologies that teaching academics and learning designers drew on. Through this process, five main discourses emerged: centralisation, surveillance, institutional homogenisation, responsibility, and efficiency.

Results

The five discourses of centralisation, surveillance, institutional homogenisation, responsibility, and efficiency, which emerged from the data, reflected the contested terrain of learning technology from the perspectives of teaching academics and learning designers.

Centralisation

The discourse of centralisation related to learning technologies as well as corresponding support services. There were however clear contradictions in terms of how teaching academics and learning designers perceived centralisation of resources. Based on the responses, adopting institutional-supported learning technologies was seen as constraining yet safe (in terms of data security for example). Teaching academic 2 noted the paradoxical dilemma of using institutional-supported learning technologies:

So with universities adopting an entrepreneurial corporate model, it's a drive towards centralisation of resources [that] at the same time also stifles innovation. So even though many universities are adopting this entrepreneurial model, at the same time, its practices also stifle [innovation].

Learning designers however expressed support for the adoption of institutional-supported learning technologies. When asked what could be done to reduce student resistance toward using learning technologies, learning designer 3 stated: “use institutional technologies, ones that we’ve supported ... no security issues ... seamless with that overall system ... probably a first preference if we can”. Similarly, learning designer 5 noted: “our managers advise us to strongly discourage using other tools, because they’re not supported, because we can’t support them.” Learning designer 2 insisted on the importance of having “a clear central message about what the core technologies [are] that the university provides ... and ensuring that everybody is aware of that core list.” Teaching academic 6 illuminated the tension when using learning technologies in higher education: “you got that tension between the two in being

innovative but being non-standard or being standardized but being out-of-date.” This showed the constant contradictions faced by teaching academics between their desire to choose technologies that were supported centrally but also wanting to be innovative and acting in the best interest of students.

The centralisation of support services, which had resulted in changes to the relationship between teaching academics and learning designers who provided some of that support, was seen as a barrier to the effective adoption of learning technologies. For example, teaching academic 10 highlighted that:

The learning designers in the faculty used to be excellent, very supportive and very responsive. Since the restructure and the centralisation of some of those support services, they just don't have as much time. They're more stretched, I think. You also don't have that personal relationship with them. You're sending an email to a generic email address. You don't know who you're going to be talking to. So you don't get quite as much support.

Teaching academics expressed anger and frustration at the perceived move towards corporate technology solutions and rejected learning designers' rationale for prioritising centralised technology solutions:

Yeah. Too bad. So what, they're learning designer[s], that learning designer attitude, which is the corporate attitude that the learning designers have adopted, says that we should put teachers in a situation where they're using tools they don't like, tools they're not familiar with, just so that the corporation can keep our IP. And that's fine but the result is, rubbish is getting made. So by insisting that everything gets made centrally, where it can be kept, nothing is being used well, because nobody is excited. Nobody is motivated. Nobody feels competent, like ... we know about what we talk about here in terms of engagement. (Teaching academic 2)

Surveillance

Both teaching academics and learning designers demonstrated an acute awareness that learning technologies created affordances for greater scrutiny of staff and student behaviours. While teaching academics generally viewed hierarchical surveillance as being repressive and productive simultaneously, learning designers were keen to express how it allowed for a productive approach (without being repressive) towards improving the learning and teaching process. The perceived hierarchical observation of teaching academics was particularly contentious as teaching academic 4 highlighted when describing their experiences in a livestreamed tutorial:

The administrator ... jumps in and says something [in the chat box function of Zoom]. They're learning advisors or someone else. There are always other people who [are] in your unit who are kind of hidden but they're not students.

Teaching academic 4 then went on to state that this was “repressive surveillance” and expressed concern that “it's also voyeuristic ... you feel like you're part of the panopticon?”. Highlighting the productive aspect, the same participant also mentioned that “this person who intervened was helpful for students”. Similarly, teaching academics also stated how the surveillance by them on students could be productive yet constraining. For teaching academic 5, such hierarchical surveillance allowed teaching academics to be able to “track individually how students are engaging with the video”. Teaching academic 12 stated that the use of *Discord* allowed them to “have an eye on what is going on ... keep tabs on the teams' progress ... giving enough autonomy to students to do whatever that they're doing”. The constraining aspect of such surveillance was illuminated by teaching academic 4 who pointed out that learning technologies were “also disciplinary technologies in that they set the limit of what you can do”. Recognising that there was a “tendency for the technology to be erased” by “lecturers, tutors, and students”, teaching academic 4 further asserted that: “We have to acknowledge that the online aspect is shaping what we teach, how we teach, and who we teach, and how students learn. I think a lot more attention needs to be paid to that.”

Although the use of learning technologies was constrained, it was perceived to be necessary to preserve academic integrity among students, as highlighted by teaching academic 6:

[W]e have the systems that we've had for quite a number of years to police that [academic dishonesty] we have the limited tools available to us around plagiarism, plagiarism detection software, in *Turnitin*, in *Blackboard* assignment. So that still constrains us somewhat to how we can have students submit assessment.

By contrast, learning designers generally perceived learning technology as creating conditions that allowed for observation as a form of relationship-building that was key to helping teaching academics construct a well-designed learning environment. Learning designer 12 mentioned that it was through the affordance of observing their progress that they “can interfere if something disastrous is happening, or they are not working”. When asked about how technology adoption could promote or hinder student participation, learning designer 3 stated that a “community of practice” could be a space in which good practices can be shared among teaching academics. This was echoed by learning designer 4 who said learning designers “see what other units are doing ... shared practice”. The affordance of observing using learning technologies could engender a hierarchisation of teaching academics, as highlighted by learning designer 5: “they (learning designers) probably have better relationships with people (teaching academics) who are more open-minded which often correlates with more technology-savvy.” Trust was determined to be key to building a healthier collaborative relationship, as highlighted by learning designer 4: “I believe that building a relationship with the academic is the most important thing because once you have the trust, you can start talking openly and honestly about the unit [or course].”

When asked what advice they would provide to other learning designers to improve the learning design, learning designer 3 stated: “as a learning designer, you don't have so much authority to tell people what to do. It's really about influence. So you're really suggesting, recommending, understanding and that trust happens over time”. While learning designer 3 acknowledged that the inherent lack of authority being a learning designer required trust to be built over time, the participant similarly asserted a need for trust to be able to influence how teaching academics engaged with learning technology adoption. It was however mentioned that “unit coordinators ... very rarely reach out” (Learning designer 2), indicating a lack of communication between the two stakeholders. Ambiguity around the role of learning designers was mentioned by teaching academic 11's response to the question of whether there was regular communication between the teaching academic and learning designers:

No regular communication. Just when I needed...we do not know what help we can get from learning designers, what skills they have...these are things that are probably not clear to the teaching academics.

Institutional homogenisation

Several teaching academics indicated the presence of normative institutional pressures to adopt learning technologies. When asked what influenced their decision to use learning technologies, teaching academic 9 stated: “definitely one is the university's instruction that we need to use learning and teaching technology”. Similar responses like “I don't have a choice” (Teaching academic 1), “something that is mandatory” (Teaching academic 2), and “a university requirement” (Teaching academic 10), reflected a notion of teaching academics having to comply with the institution's policies around using learning technologies. When asked what factors influenced the adoption and use of learning technologies, teaching academic 2's response clearly illuminated a climate of institutional homogenisation:

Some of it will be influenced by what is supported by the university. So I used to feel a lot more free to choose whatever platform or technology suited my teaching and the assessment. And now the emphasis has shifted towards using the tools that XXX [acronym of university] have endorsed, and XXX support. So all of a sudden, you know, two or three years ago, everybody started using *Padlet*.

Expanding on the implications of institutional homogenisation, with the use of learning technologies, the learning process can be intricately designed to the point where one “can curate it down to the last detail” (Teaching academic 4). This however, according to the same participant, leaves less “opportunity for things to go off track”, something that was perceived to be undesirable by the participant.

Contrastingly, most of the learning designers in this study voiced unequivocal support for the adoption of institutional-supported learning technologies while repressing the use of non-institutional supported ones. For example, learning designer 1 specified that it was crucial for teaching academics to “use them [learning technologies] within the confines of an established set of institutional technologies”. Learning designer 5 further stated that the use of non-institutional supported learning technologies was actively discouraged:

So if they want to use other tools, we just have to clearly talk them through the fact that we can't offer technical support for those. But there's nothing stopping them using them if they want to. But generally, we don't support a lot of it.

This was further echoed by learning designer 1, a learning design manager, who stated: “I think it's about making sure that we're not using learning technologies just for the sake of, you know, because a particular academic might like a particular technology.”

While learning designers did not explicitly say they had to use institutional-supported learning technologies, two learning designers (Learning designer 1 and learning designer 3) stated the relevance of using technologies to being “recognized as digitally innovative university” and being on the “cutting edge” (Learning designer 1). University branding through technology adoption was suggested to be of significance when participants were asked about their personal learning design beliefs when designing online or blended courses. For example, learning designer 3 stated that it was “really important to XXX (acronym of university) ... having the brand of [anonymised]”. Learning designer 1 asked a rhetorical question that reinforced the imperative of gaining recognition: “Do we have enough technologies that can actually enable us, for example, to be recognized as a digitally innovative university?”

Responsibility

The discourse of responsibility (i.e., who is responsible for decision making, and who has agency) in relation to learning technology was constructed differently by the two stakeholders. While teaching academics and learning designers shifted responsibility to students for the successful use of their chosen learning technologies, there was evidence that learning designers asserted that it was the responsibility of teaching academics to adopt and use learning technologies. Two teaching academics perceived students to be responsible for using the available learning technologies. Teaching academic 9 used the term “lazy” to label students who chose not to attend livestreamed tutorials, implying an innate deficit, and thus shifting responsibility, for their inability to attend livestreamed tutorials. Teaching academic 5 stated that “if they (students) are very committed, the learning technologies can support them at midnight ... it can help them to succeed.” Teaching academic 9 further stated that “the students want the shortcut” by not watching the tutorial video guide that explains the use of a specific learning technology. In this way teaching academics assigned the responsibility for successful learning outcomes to students, rather than taking some responsibility themselves for the learning environment they had created, including for the use value of learning technologies within that environment. Similarly, learning designers shifted responsibility to students by stating that “students need to be more responsible, more autonomous in their learning” (Learning designer 3). Expanding on this view, learning designer 3 also suggested that “they [teaching academics] might devolve responsibility [to learn to use learning technologies] to the students rather than being a bit more active and understanding”. This view was further reinforced by learning designer 4 who stated that “students are expected to be able to enrol into their units online, and also access Blackboard to access their teaching resources”.

Given this expectation, there was also an implied responsibility for teaching academics to use, as well as learn to use, learning technologies. As learning designer 1 stated: “we have a huge number of teaching

academics who need to be responsible for their own use, the learning management system [Blackboard] and the capabilities to use ... if teaching academics learn how to use the technologies ... that's the ideal." Learning designer 2 shared a similar view, namely that "the faculty owns those courses. And it's their responsibility and they will run them the way they want to run them". It is not just about adopting learning technologies, but also the type of learning technologies adopted by teaching academics that matter to learning designers. According to learning designer 2, it is important for teaching academics to know the "core list" of technologies to use "before they go rogue". The tension was clear when learning designer 2 further stated that alternative non-institutionally supported technologies that teaching academics are "willing or wanting to try" are labelled as "rogue technologies". In this way, learning designers were using their professional expertise in design knowledge and their professional identity as design experts to exert influence over what and how learning technologies should be used by teaching academics. Further asserting their professional identity, learning designers celebrated their role in supporting the rapid transition to online teaching and again linked this to their expertise, noting it was also recognised by the university:

[T]he learning designers had the critical role in [ensuring the success of a quick transition to mostly online [in response to Covid-19]]. And they were able to do that because they have the skills and knowledge of digital technologies and how to learn best online or in a blended environment. They were definitely lauded for it ... their work was much appreciated. They did get a Vice Chancellor's Award for Excellence for their efforts as well. They had been nominated by the faculties. And that just goes to show how much the university appreciated their efforts at the time. (Learning designer 2)

Teaching academics perceived themselves having to alter their behaviours, which indicates responsibility, in terms of how they used learning technologies. Teaching academic 8 indicated that "I had to train myself to do it [Zoom] for nearly a year". Teaching academic 8 however also highlighted how a lack of equipment and training was an impediment to them accumulating digital literacy to maximise the affordances of these learning technologies: "we don't have that training ... they (*YouTube* video creators) talk to a proper digital camera ... we are doing it to a webcam". Transforming their thoughts to embrace greater diversity of learning technologies, teaching academic 2 stated: "we all did professional development on how to use Padlet. Everybody had Padlet in their Blackboard ... it became cringy ... it was saturation ... it's a hard balance, because I like to have a diversity of platforms and tools." Again, this showed a common desire on teaching academic 2's part to be afforded more agency in terms of their choices around the use of learning technologies.

Efficiency

Teaching academics generally complained about a lack of time to learn about new technologies stemming from increased workload: "the workloads are just too big" (Teaching academic 2), "it takes a lot of time" (Teaching academic 8), "I don't have time to do that" (Teaching academic 1), which then became a barrier to learning technology adoption. Teaching academic 2 further exposed a tension between professional development and support designed to enable them to do the work themselves, with a preference for having learning designers undertake some of the work as this would be more efficient:

Then you can do professional development, and then they can all talk to each other ... Doesn't matter how much support there is, how many workshops you do, how many tip sheets you make, they just don't do it ... the workloads are just so big, because they open their calendar, and they say: 'you show me where I'm supposed to fit in this extra thing'. And without cutting something else, like we tend to just pile on, do this, do an extra thing, do an extra and we don't take anything away, or make anything efficient to be able to provide more time. I'm sorry, I can't give you more time.

The time-deficit affecting the time and space required for self-development was further echoed by teaching academic 10 who stated: "it takes some time to teach yourself [to use *Microsoft Teams*] ... even if there is a course, you've got to find the time to go...my time is already very, very stretched." Teaching

academic 11 highlighted the difficult task of balancing between learning technologies and learning objectives: “If I divert too much time in technologies ... I have to compromise on the actual objectives of the unit.” According to teaching academics, time (or the lack thereof) was closely intertwined with academic workload. For example, when asked if there were restrictions to using learning technologies, teaching academic 12 responded:

But perhaps like, you know, it's an additional thing, right. So like, I have a lot of responsibilities for the research and other things that I have to do, like I have to teach students specific things. They have to get their assessments done. And trying to think about different technologies, how I can embed it in their learning experiences is an additional thing.

By contrast, other teaching academics alluded the increase in efficiency to the use of learning technologies, as highlighted by teaching academic 2 who stated: “it's so much easier with digital technologies”. This view was synonymous with the learning designers who broadly agreed that improving efficiency was a critical impetus to adopt and use learning technologies. To help improve efficiency of teaching academics, learning designer 4 stated that it was their job to teach educators how to use learning technologies to “save time answering all those emails or improve the marking process”. When asked about challenges or barriers faced in the adoption of learning technologies, learning designer 5 pointed to “academic workload” from the perspective of teaching academics. Learning designer 2 also highlighted that a consequence of being time-poor was that adopting learning technologies might “not be a priority for them [teaching academics].” Reinforcing their professional identity by emphasising on the enhancement of efficiency for teaching academics, learning designer 4 further stated: “So a lot of things that we hear quite common is academic set their time full ... they won't have the time to know [to learn how to use] it extensively ... having a learning designer to help them integrate that tech into their particular learning activity”. Learning designer 2 offered a way forward by suggesting that they (learning designers) should work towards meeting the “key priorities across the faculties” but also acknowledged that “not everybody (teaching academics) is going to do it”.

Discussion

This study aimed to explore how teaching academics and learning designers understand learning technology in the context of a large Australian university. The findings revealed five contested but interconnected discourses that reflected how the two stakeholders engaged with learning technologies. Based on the findings, the discourse of centralisation can be categorised into centralisation of technologies and centralisation of support services associated with these technologies. While centralisation of technology management is suggested to be a phase within the diffusion of innovation process, it could be a potential site for tensions between stakeholders (Shibeika & Harty, 2015). Tensions were evidently present when the teaching academic participants expressed general discontent, while learning designers often unequivocally supported centralisation of learning technologies. Centralisation of learning technologies could be situated within the centralisation of resources as part of the institution's management policy related to resource allocation and priority setting (Tao et al., 2021). However, from a learning and teaching perspective, the broader issue, as pointed out by some teaching academics, was how the notion of centralising resources could stifle innovation, which can in turn affect learning and teaching processes. This finding is consistent with that of Toh et al. (2016) who suggested that such centralisation practice engenders perceptions of policing, which could stifle innovation. This then raises questions about the legitimacy of centralising learning technologies and their support services. Furthermore, teaching academic participants highlighted reductions in personalised support from learning designers, possibly emanating from the centralisation of resources, which could translate into a sense of isolation. This points to the significance of having learning designers attached to a faculty where more personal support can be provided to teaching academics, or at least partnering with academics to achieve a shared rationale around learning technology support. Such a shared rationale is thus dependent on a shared trust as part of collaborative practice.

The discourse of surveillance that some participants drew on, encompassed notions of repression and productivity. The practice of having other staff members placed within units with the ability to intervene anytime while observing, put teaching academics under a perpetual sense of discreet surveillance (Mills, 2003), or at least that was their perception. Some of the teaching academics however did recognise the potentially productive aspect of such panoptic surveillance as they themselves were able to cast the same hierarchical surveillance over students by tracking their progress. Furthermore, through the adoption and use of learning technologies that allow for such surveillance of all aspects of the learning process, teaching academics reported that there was little possibility for divergent ideas which teaching academics perceived to be a requirement for learning. For the learning designers, the discourse of surveillance was not related to the affordances of learning technologies, but more about how peer observation and sharing of practices, based on trust, could build a collaborative relationship with teaching academics. However, possible tensions could arise between teaching academics who might prefer the use of certain learning technologies and learning designers who might prefer a more standardised design of learning geared towards achieving learning objectives. Through this hierarchisation of teaching academics, learning designers could then use their design expertise to exert greater influence into the transformation of not just teaching academics but also learning and teaching processes to be shaped into the way learning designers wanted them to be.

These findings reflected how surveillance could influence systemic changes in using learning technologies in ways that were normalising, with the effect of institutional homogenisation. Through the use of learning technologies that could afford surveillance, learning designers could classify and hierarchise teaching academics into those who were more open to using technologies and those who were not. Not only did most participants reportedly accept, without coercion, the adoption and use of learning technologies, but there was also a drive by learning designers to promote the use of learning technologies that were institutionally adopted and supported. This illuminated a normative institutional pressure to adopt dominant learning technologies, which is consistent with findings in previous studies (Oliveira & Martins, 2011; Saghafian et al., 2021). Yet, there was also a level of discontent among some teaching academics that transitioning to using learning technologies was eroding or at least limiting the possibility for diversity of learning experiences during classroom interactions. The homogenisation process seemed to be antithetical to the innovation agenda pushed by many universities. The mention of university branding and reputation by learning designer participants could be an indication of how institutional pressures have led to the normalisation of using institutional-supported learning technologies. Such positioning could be due to the inherent roles of learning designers who were employed by the institution to promote the use of such learning technologies. Learning designers thus appeared to be more inclined to follow the university agenda of how certain learning technologies should be prioritised. In this way, the type of learning technologies offered could become skewed towards technologies that benefit particular employers or industries but not necessarily students. Fostering university-industry relations with an emphasis on innovations could be an important strategy for universities to reinforce the push towards the development and importance of digital literacy (Rumyantseva et al., 2020) and technical expertise in certain learning technologies (and not others) among teaching academics and students (Perkmann et al., 2013). While it might be necessary to maintain university-industry relations, this could possibly create a dilemma of whether higher education is subordinate to industrial demands or whether the purpose of higher education is the development of intellectual thought.

The institutional homogenisation of learning technologies was broadly met with a shifting of responsibilities among the stakeholders. While the extent of this centralisation may be different in different institutional contexts, the potential impact is similar. In this study, centralisation reflected how resources were consolidated into a central source of management that allowed for easier exercise of disciplinary power through hierarchical observing and normalising judgement. Institutional homogenisation, however, entailed the exercise of disciplinary power that produced normalising processes of classifying, comparing, hierarchising, and homogenisation of learning technologies towards those that were institutionally endorsed and supported. Thus, centralisation represented consolidation of learning technologies and support services while institutional homogenisation represented sameness, conformity, and compliance. Centralisation and institutional homogenisation are therefore conceptually distinct from each other. While both teaching academics and learning designers had sought strategies to

gain greater influence over the learning process, they also shifted this responsibility to use learning technologies in a general sense to others. The responsibility to enact and use learning technologies seemed to be shifting constantly: from learning designers to teaching academics, and from both learning designers and teaching academics to students. The findings showed that while the adoption of learning technologies afford flexibility and ubiquitous learning, responsibilities of learning success or failure were frequently attributed to individual attributes (Sellar & Gale, 2016). The reproduction of a reality in which technologies provide accessibility to learning, and continuity in learning, whereby students can access their learning anytime anywhere, was shown in how teaching academics and learning designers expected students to be responsible for their learning. Learning designers could be pushing staff to become experts in learning technology. Teaching academics however, while showing a desire to understand the use of learning technologies, they also demonstrated that they wanted academic freedom and autonomy in the choice of learning technologies used and not be confined by whether they were institutionally supported or not. At the same time, teaching academics might not necessarily want to be solely responsible for using learning technologies in teaching but also showed desire for learning designers to provide continued and personalised support for their use.

The discourse of efficiency emerged from the emphasis on the maximising of time due to a perceived increase in academic workloads. Teaching academics generally mentioned a lack of time and increasing academic workloads as impediments to their use of learning technologies, which aligns with other studies (Sagnak & Baran, 2020). The time-deficit issue faced by teaching academics was also acknowledged by the learning designers. The notion of how the use of learning technologies could be seen as a panacea to reduce time pressures, often claimed by learning designers, was not shared by teaching academics. A possible explanation for this could be that learning designers were using time-deficit as leverage to influence teaching academics to adopt and use learning technologies. Thus, to promote the adoption and use of learning technologies, learning designers aligned the use of learning technologies with enabling improved efficiency. However, as one teaching academic highlighted, the common solution here was to have teaching academics undergo professional development to develop their technological-pedagogical knowledge, which itself was reported by this participant to be time consuming, adding to their workload. This is echoed in previous research that has highlighted a need to allocate additional time to develop teaching academics' capability to use learning technologies (Gregory & Lodge, 2015). There was a perceived increase of more academic workload with time remaining finite. While teaching academics perceived that using learning technologies takes up a lot of their time, learning designers promoted the use of learning technologies as a solution to time poverty experienced by teaching academics. These results were consistent with previous studies that have revealed performance expectancy and effort expectancy as significant predictors of learning technology use (Hu et al., 2020). Although the priority for learning designers is for institutional-supported learning technologies to be adopted in the learning and teaching process, teaching academics' priorities gravitate towards pedagogical needs as well as their own research, resulting in a lack of time and/or non-prioritisation of adopting institutional-supported learning technologies.

Conclusion and implications

The purpose of this study was to explore how teaching academics and learning designers understand learning technologies in the Australian higher education context. This study identified five discourses in relation to learning technology emerging from interviews with the teaching academics and learning designers: centralisation, surveillance, institutional homogenisation, responsibility, and efficiency. Underlying tensions were uncovered within these discourses, which suggested mutual and contrasting views of how teaching academics and learning designers in a particular Australian higher education institution understood learning technologies.

Despite the tensions, the results of this study also suggest that teaching academics and learning designers in the context of this study shared a mutual desire to improve learning and teaching. Reflecting the dynamic nature of designing courses using learning technologies, constant renegotiation through regular communications between these two stakeholders may be needed to ensure meaningful collaboration

based on trust. Thus, an important implication of this study is a call for universities to develop learning technologies policies that prioritise the collaborative aspect of the design process. Based on the analysis of the discourses in this study, practices can be adapted to reduce tensions and build consensus on technology affordances that move towards a collaborative relationship between teaching academics and learning designers. The findings may be transferable to higher education institutions with a similar context, especially as related to collaborative processes between learning designers and teaching academics.

Limitations and future research

The generalisability of these results is subject to certain limitations. For example, the findings relate specifically to an Australian context and might not be directly applicable in other cultural contexts. The study focused on participants in one university and did not interview participants from other universities in other parts of Australia. This could have an impact on the findings. To mitigate this limitation, teaching academic participants were recruited from a range of disciplines. Notwithstanding these limitations, by using Foucault's notion of discourse, this study has offered deeper insights into the underlying tensions and complexity of both the use and adoption of learning technologies. Further research could investigate potential interventions that may reduce the tensions within the identified discourses to achieve more collaborative and productive relationships, which would ultimately benefit student learning outcomes. Investigating the impact of policies and how these influence collaborative relationships between learning designer and teaching academics has the potential to gain a deeper understanding of the resulting learning environments, and by extension the student learning experience.

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