on_education
Journal for Research and Debate

harnessing technology for cultural transformation: a case study from South Africa

Nompilo Tshuma

Taming the technology used for teaching and learning in higher education can take different forms. These taming activities are dependent on the context – and critical issues that affect higher education within those contexts – as well as the agency of academics to address those issues. The focus of this paper is on one such context, where cultural transformation is a key theme in higher education. In this paper, I reflect on how technology has been harnessed by academic change agents to challenge cultural norms while recognising diversity within their classrooms.

Keywords: cultural transformation, higher education, South Africa, technology

Cultural transformation – an introduction

Over the last decade or so, there have been increasing calls from students in different parts of the world for the transformation of higher education. These increasingly diverse student bodies are demanding a change in the culture of higher education, which often only accommodates one dominant culture; a transformation of the curriculum, teaching and assessments; and affordable higher education for students from lower-income homes (who are often the first in their families to go to university). In the Global South, there is also resistance against a colonial past that continues to perpetuate its culture, structures and curriculum in higher education, thereby failing to meet the needs of a contextually sensitive and culturally diverse student population.

In South Africa, where this study is located, higher education is still reeling from the effects of the apartheid system 26 years after independence. Deeply rooted racial segregation still pervades higher education in different – and often more subtle – forms. There are still schools (those in rural and lower-income communities) that are poorly resourced in terms of infrastructure and qualified human resources. What are termed historically black universities[1] often have to serve these students who have been poorly prepared for tertiary education. While historically white universities[2] have made great strides in opening up physical access to a diverse student population and staff complement, these changes are sometimes seen as meeting transformation quotas without adequate transforming practices within the institutions (Vandeyar, 2010). There are still missed opportunities for challenging the dominant culture of higher education and ensuring both symbolic[3] and epistemological[4] access for students.

Against this backdrop is the technology challenge that is perpetuated across African higher education – the use of technological tools for teaching and learning that have been developed in the Global North. While the technological tools in and of themselves are not the issue, academics in South Africa sometimes lament the assumptions around teaching and learning built into those

technologies – a challenge that has been aggravated by the pandemic and resulting lockdowns. These assumptions do not always cater for a deeply segregated student population with unequal access to these tools and sporadic access to the internet. Lack of access to technology is exacerbated by the high cost of smart phones and other mobile devices, as well as mobile data for internet access. Additionally, these embedded assumptions are not culturally relevant to the pedagogic approaches – and transformation agenda – of a diverse South African student body.

Taming the technology in my context therefore takes a different form from the other papers in this journal issue. With fewer technological innovations and a sensitivity to: 1) oppressive historical legacies, 2) a transforming and sometimes volatile context, and 3) cultural diversity, academics at times find themselves having to harness technology to respond to the challenges of higher education. Their classrooms are at times transformed into spaces that open up difficult societal conversations that challenge their own (academics') assumptions and values while recognising diverse students and lessening their feelings of alienation and disconnection in the classroom. In the case study presented in this paper, two academics harnessed technology to enable these spaces and facilitate critical discussions. While their positionality differed (as will be highlighted in the next section), both were able to use a simple tool (videos) to facilitate cultural transformation in their classrooms.

Harnessing the technology: A case study

A critical ethnographic case study was conducted in a historically white South African university with eight academics over a period of 18 months (Tshuma, 2018). The data I present in this paper was collected through multiple in-depth interviews, classroom observations, teaching portfolios and other documentation. The larger study collected data on academics' educational technology practices with a strong critical focus on the context of South African higher education. Historical and cultural forces within the context were seen as strong antecedents for the culturally transformative practices displayed by the academics in their classrooms. Two brief narratives from this larger study will be shared below.

The first narrative is about Khanyi, a young black academic who was born and raised in an area of South Africa which, 26 years after independence, still has a school education system that resembles the "racially divided and discriminatory" one inherited from the apartheid government (Lemon, 2004, p. 269). As has already been mentioned, learners attending these schools struggle with a lack of resources and teaching expertise for key subjects, and often fail to meet the requirements to enrol at a university. They are also mostly from lower income families and may struggle to meet the financial commitments of university fees.

Khanyi, however, beat the odds and found herself in a historically white university. But as a student, she experienced first-hand the oppressive culture of higher education which was so different from her own. She recounts how there were academics who failed (or refused) to acknowledge the diverse cultures of different students in their classrooms, and taught a curriculum that was blind to societal issues encountered by the majority of their students. And although as a lecturer she is now familiar with this culture, she is still exposed to oppressive behaviour from both staff and students who are at home in this dominant higher education culture.

Khanyi's response to this marginalising culture is driven by her experience as both a student and an academic. Her aim is to continually seek ways to challenge her students to critically reflect on the dominant culture of higher education, expose them to cultures that are different from their own and

provide safe spaces where they can openly discuss their assumptions and prejudices related to issues of culture. One of Khanyi's approaches is to challenge cultural perceptions through the use of videos prompting her students to think differently about the way they have been socialised into seeing the world and others.

In one of her first lectures, she kicks off the discussions with an Always commercial[5] titled #LikeAGirl which challenges gender stereotypes:

> "*And my first video is always the nice video of the Always advert. It talks about how basically we are socialised into certain stereotypes about gender. I'll show them in class and then say so what are your thoughts about that video and then most of them start laughing. They love that advert. So it's always a nice picture where they don't take it seriously at first but once you start deconstructing the advert and they see how it relates to their own lives they're like ahhh.*" (Khanyi interview)

After relating the video presentation to theoretical concepts, she has the students watch the video again and then draws them out into a discussion. Playing a video in class and drawing students into a discussion about it is a common teaching approach. However, in Khanyi's example, the *type* of video selected and the *reason* behind the use of the video are key to understanding how the technology has been harnessed. Firstly, in this instance, Khanyi selects an advertisement that has been developed for commercial purposes. While there are important lessons presented by the video, the main purpose for its development was to grow the company's customer base. Secondly, she uses the video because of her experiences with the marginalising culture of higher education as both a student and an academic staff member. Hence, playing that video and prompting the discussions is a form of resistance to cultural prejudices.

While drawing on commercial videos does not overtly challenge structural forces in the form of the dominant culture in this instance, it has allowed her to respond to the forces she experienced – and continues to experience – within the institution. Her aim is to not only challenge the dominant cultural perceptions, but also to support the development of a different breed of students who are not only aware of, but also sensitive to, the political and cultural issues affecting the majority of the country's population. Her videos, and the discussions that ensue, are selected and designed to model critical thinking and hence develop critical thinkers who are not afraid to speak out about the injustices and inequities still inherent in post-apartheid South Africa.

The second academic – Claire – is in the same institution as Khanyi. Claire describes herself as white middle-class, and acknowledges the privilege this status has given her as both a student and an academic in a historically white university in South Africa. Her racial and historical background, however, have sometimes made it difficult for her to discuss certain topics with her students. She worries that these topics may be perceived as sensitive because of her privileged background, and that some students may feel alienated or exposed if the examples she gives reflect negatively on the people from their communities, racial groups or countries.

Claire decided to introduce what she terms mini-movies by giving students the option to hand in a weekly tutorial in a format of their choice. While traditionally the weekly submission was in the form of a written essay, she encouraged her students to be creative in terms of how they packaged the topic they were presenting. These weekly submissions were for formative purposes, and were a

requirement in order to be able to sit for the examinations at the end of the semester.

While only a small number of students initially opted for a variation from the essay, their submissions ranged from video interviews with locals, video documentation of their communities' experiences of a particular phenomenon, cartoon stories of their understanding of particular topics, audio narrations with pictures and many other variations. With the permission of her students, she shared some of these creative pieces during her lectures as relevant and current examples about the specific topics under discussion. This allowed her to open up spaces for discussion and debates on topics that had initially been difficult and sensitive for her to address. It also allowed her to step outside of her comfort zone by allowing students to contribute to the knowledge generation project and bring in a richer set of resources that spoke to who they are and their understanding of the world.

Claire's incorporation of student generated content in her class can also be considered a harnessing of technology because of the *purpose* of its use and how it *contributed* to a rich knowledge base in her class. She incorporated this student generated content as a response to her positionality and the constraints it engendered in her teaching. Students had a choice whether to submit the creative pieces or follow the traditional essay route, as well as what technological tools and format to use. As a result, she was able to draw on a range of student voices in her class and explore sensitive topics that had been difficult to explore previously. This student generated content has also been archived as a resource for classes in subsequent years.

Conclusion

The two examples presented above paint a picture of how video technology can be harnessed for cultural transformation. While the two academics were positioned differently in terms of race and historical background, their responses to the cultural transformation needs of the students in their classes allowed them to harness the power of technology to accomplish what they felt was a critical role in their classes – in effect taming the technology to suit their requirements.

Taming the technology in this form is not the norm for South African academics. In order to accomplish this, they need to have a strong sense of agency that drives them to make themselves vulnerable and open up what are sometimes painful and difficult conversations in their classes. For Khanyi and Claire, their agency emanated from their cultural sensitivity and passion for the transformation imperatives within the university. They were both also actively involved in other transformation discourses in other sections of the university.

While there may be dominant discourses about technology use and what constitutes innovation in higher education, the act of cultural transformation and challenging dominant practices in developing countries is an act of courage. Harnessing technological devices to support these endeavours allows developing countries to share contextualised experiences of technology use and how it is making a difference in higher education spaces.

References

Case, J. M. (2008). Alienation and engagement: Development of an alternative theoretical framework for understanding student learning. *Higher Education*, *55*(3), 321–332.

https://doi.org/10.1007/s10734-007-9057-5

Lemon, A. (2004). Redressing school inequalities in the Eastern Cape, South Africa. *Journal of Southern African Studies*, *30*(2), 269–290.
https://doi.org/10.1080/0305707042000215392

Morrow, W. (2009). *Bounds of democracy: Epistemological access in higher education*. HSRC Press.
http://repository.hsrc.ac.za/handle/20.500.11910/4739

Tshuma, N. (2018). *A critical realist exploration of the culture of resistance in educational technology integration practices in a South African university* [Doctoral dissertation, Rhodes University].
http://hdl.handle.net/10962/72318

Vandeyar, S. (2010). Shifting selves: Constructing and negotiating academic identities. *South African Journal of Higher Education*, *24*(6), 914–934.
https://doi.org/10.10520/EJC37658

Recommended Citation

Tshuma, N. (2021). Harnessing technology for cultural transformation: A case study from South Africa. *On Education. Journal for Research and Debate, 4*(12).
https://doi.org/10.17899/on_ed.2021.12.4

Do you want to comment on this article? Please send your reply to editors@oneducation.net. Replies will be processed like invited contributions. This means they will be assessed according to standard criteria of quality, relevance, and civility. Please make sure to follow editorial policies and formatting guidelines.

nompilo tshuma

Nompilo is a Lecturer in the Department of Curriculum Studies and the Centre for Higher and Adult Education at Stellenbosch University. She has been working with educational technology since 2005 in both student and staff development, and as a researcher. Nompilo holds a PhD (Rhodes University) which focused on understanding the agency of academics as they integrate educational technology and quietly resist a range of constraining structural forces. Developing from this, her current research interests focus on reflexivity and critique by seeking a nuanced understanding of educational technology practices in higher education through a better understanding of context and the use of social theories.

1. South African universities are termed historically black or historically white based on the population group they served prior to independence in 1994. Historically black universities are mostly located in black and rural communities and were poorly funded prior to independence. Additionally, the qualifications they offered were mostly designed to prepare students for blue-collar and other lower-income jobs. After independence these universities have received a larger share of

government funding in order to improve resources, qualifications, research and student throughput.

2. Historically white universities received the lion's share of funding prior to independence. As such, they were able to build up their research capacity and today still have the highest research outputs and student throughput rates in the country. They also attract a diverse mix of academics – including international experts – to add to the richness of their offering. These universities have had to open up access to underprepared students from lower-income homes and have partnered with the government in providing additional support to these students in the form of extended or foundation programmes.
3. The culture of historically white universities in South Africa still favours the dominant white population despite the opening up of physical access to other racial groups. As such, the majority of black students often feel alienated or disconnected (Case, 2008) from the teaching approaches and other services provided for their support.
4. While students can gain physical access to the university, they often struggle with other types of access – and in this instance what Morrow (2009) terms epistemological access. This refers to their discipline's knowledge structures, conventions and values – not just what is known, but what is valued as knowledge and how disciplinary experts come to know what they know. While academics may be able to articulate disciplinary knowledge to their students, their knowledge of disciplinary values is often implicit and intuitive, and therefore difficult to articulate.
5. URL for commercial: https://www.youtube.com/watch?v=XjJQBjWYDTs