

Three cases of hybridity in learning spaces: towards a design for a Zone of Possibility

John Cook, Yishay Mor and Patricia Santos

Email J.Cook@em.uni-frankfurt.de

Extended Abstract

Overview

Our work contributes to design discourse by drawing on Educational Design Research (EDR) that has been conducted into what we call a Zone of Possibility (ZoP) over the past seven years. Specifically, this paper presents how our initial research question (RQ1) has evolved (also provided below as RQ2).

RQ1 “In the context of socio-technical environments, how can the design process and design thinking advance or bridge our social capital?”

RQ2 “In the context of hybrid learning spaces, how can the design process and design thinking advance or bridge ‘successful communication’ and an understanding of social context in a ZoP?”

To describe this RQ evolution, the full submitted paper is presented as 3 cases (Confer, ZoP Stokes Croft and Google Lens in HE) that have provided insights to explore the concept of the ZoP and its implications for EDR. The real world is a messy place and both RQs and the related cases attempt to reflect this. For example, the second case (Stokes-Croft project), had it worked, was clearly integrating both the questions of the messy political positioning of self *and* the use of a tool. For us positioning practices are necessary for group interactions with other humans in contexts like the work-place or higher-education. What are the rules of engagement? What is the underlying game? Do I want to play? As a learner, how do I realize my potential? Positioning can be viewed as coping strategies for dealing with real world. Specifically, we view positioning as being in a systematic relation to the distribution of power and principles of control. Thus, social positioning underlies practices of communication and gives rise to the shaping of identity. The implication is that a ‘subject’ inhabits a space of possibility, thus a subject would be represented “by a socially structured zone of possibility rather than a singular point” (Daniels, 2008, p. 164). How we design for positioning in a ZoP is an under-explored area; both RQs and the related cases attempt to reflect this. **A key point is that we move to notions of ‘bridging’, which from a design perspective is ill-defined, in RQ1 towards a Zone of Possibility (ZoP)**

which is central to RQ2. See Meta Design Principle 1 (MDP1) for more detail: *MDP1. Respect Learners' Zone of Possibility*, <http://ilde.upf.edu/layers/v/brn>

The full (submitted) paper has sections that describe the implications for Educational Design Researchers and clarifies the main aspects covered by the Zone of Possibility. Section 2 and 3 look at Meta Design Principles (MDPs) for the ZoP. Specifically, section 2 outlines detailed work on the groupware tool Confer which was developed for work-based learning using the guidance of MDP1. In section 3, we go on to present an extension of MDP1 and clarify some aspects by using the case of the ZoP-Stokes Croft community enterprise. Section 4 further explores the ZoP in a Higher Education context. Preliminary conclusions are then drawn. Below for this extended abstract we provide a summary of the conclusions.

Preliminary conclusions and future work

One of the main conclusions is the importance of bridging positioning practices as ‘successful communication’ and an understanding of social context in hybrid contexts (i.e. the ZoP).

Project software developers must not be allowed to lead us into an over-blown system; in the end Confer, in the first case (Cook et al, 2016), became overly complex and the users who had helped co-design it could not find the time to help evaluate it. Furthermore, we must also heed the lessons from the ZoP-SC project (Cook, Lander & Santos, 2016). The ZoP-SC project found that users who trailed the ZoP-SC did shoot video clips and annotated them. However, they did not go on to use the discourse tools, which may have been regarded as an unnecessary overhead. An alternative approach to bridging learners into a ZoP needed to be found and hence the Google Lens in Higher Education case emerged. Google Lens has the potential to mediate hybrid learning in the ZoP. However, there are many ethical and privacy concerns related to the growing dominance of Google, Facebook and other organizations and the spread of related products and surveillance approaches. There is also an attendant apprehension felt about the Artificial Intelligence that underpins tools like Google Lens. This was surfaced by the Goethe HE case, where one student group commented that Lens is both ‘awesome yet scary’ with one member reporting that after the activity they uninstalled Lens. This has implications for data analytics and the use of recommender systems.

Future work will look for partners and funding for a new project with the working title: Designing for the Zone of Possibility using Lens+. Specifically, we will use the Participatory Pattern Design (PPD) methodology in a variety of settings, e.g Higher Education (HE) and work-based learning, to feed into a

rethinking of how the use of Google Lens, plus other apps, can further learning in a ZoP.

Given the above considerations, the research question posed in the introduction is modified as follows, on the basis of the previous experience, to guide this future work:

RQ2: In the context of hybrid learning spaces, how can the design process and design thinking advance or bridge ‘successful communication’ and an understanding of social context in a ZoP?

What we mean by this, following on from Daniels (2008), is that where power and control may be unevenly distributed to individuals or groups or categories of professionals, this translates into principles of successful or unsuccessful communication and understanding of social context. Bridging an understanding of social context will include an undertaking to develop ‘low flying’ or ‘low overhead’ meditational tools that address ethical and privacy concerns of citizens but that also sit easily in users’ learning cultural and work practices. We offer this extended abstract as an invitation to engage in a debate on these issues.

Acknowledgments

Some of the work described in this paper was conducted as part of the EC funded Learning Layers project (<http://results.learning-layers.eu/>). Thank you to all the first author’s Learning Layers colleagues, and other colleagues, who are all named on the cited papers. Thanks also to James Griffith, first author’s then PhD student who assisted, and Professor Debbie Holley. Thanks also to first author’s students at Goethe University Frankfurt. Finally, thank you for the feedback from: the reviewers, the Shepherd and participants at the HLS:D3 Workshop.

Acknowledgments

This is an extended abstract of a paper currently under review for the British Journal of Educational Technology. The first author may be contacted for a draft of the full paper.

Reference

Cook, J., Mor, Y., Santos, P., Treasure-Jones, T., Elferink, R., & Kerr, M. (2016, June). Using the participatory patterns design (PPD) methodology to co-design groupware: Confer a tool for workplace informal learning.

In *EdMedia 2016—World Conference on Educational Media and Technology, Vancouver, British Columbia, Canada. LearnTechLib* (pp. 563-572).

Cook, J., Lander, R., & Santos, P. (2016). Urban regeneration within the zone of possibility in citizen led 'hybrid cities'. Paper presented at Digital-Cultural Ecology and the Medium-Sized City

Daniels, H. (2008) *Vygotsky and Research*. Routledge, UK.