A critical analysis of learner participation in virtual worlds: how can virtual worlds inform our pedagogy?

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Abstract. This paper reports on an exploratory case study of learner participation within the context of online language learning in virtual world platforms. Data for this investigation was collected through a case study of a Business English course within a qualitative Case-Study Research framework. This study examines learner activity in virtual worlds in relation to three main features of the platform: avatars, artefacts and spaces. The study makes use of *Reflexivity* and *Exploratory Practice* as its core methodological approach to the building of the case. The virtual world data is analysed from a multimodal perspective and makes use of *visualisation* as the primary analytical tool. In an attempt to broach the Eurocall 2015 conference topic of Critical Computer-Assisted Language Learning (CALL), this paper will present and discuss three findings: a broadening of our understanding of learner participation in virtual worlds, the critical role played by course designers and teachers in the shaping of learner participation in virtual worlds, and the potential of virtual worlds as a tool for reflective practice and practitioner research.

Keywords: virtual worlds, learner participation, multimodal research, telecollaboration.

1.   Introduction

The discussion of this paper draws on data collected by the author under a recently awarded PhD on learner participation in virtual world platforms (Panichi, 2015). The focus of this paper will be on those research findings that are relevant to a discussion of *Critical Call*. With the term "critical", the author intends to discuss to what extent the virtual world platform can inform us about our practice as
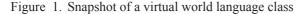

CALL practitioners and act as a tool for teacher reflectivity. It is argued that the characteristics of virtual world platforms are such as to allow for a particularly powerful critical evaluation both of what we do as teachers and course designers (our practice) and of our pedagogic rationale (why we do what we do).

1.1. Virtual worlds and language education

Virtual world platforms are generally understood as computer generated environments where users can interact online in real time with other users and the environment via an avatar (Figure 1). An avatar is a graphic representation of the user which is visible within the environment. Without doubt, the most significant characteristic of 3D virtual worlds for language learning and teaching, compared to other online learning platforms, is their "immersiveness" (e.g. Deutschmann & Panichi, 2009a; Jauregi et al., 2011). This immersive nature of the platforms has implications in terms of language learner activity and participation (e.g. Deutschmann & Panichi, 2009a; Jauregi et al., 2011). Role-play activities are considered to be particularly enhanced by virtual world platforms (e.g. Dalgarno et al., 2013; Deutschmann & Panichi, 2009a; 2013), as are action-based learning activities (e.g. Molka-Danielsen & Deutschmann, 2009), and problem-based learning approaches (Brown, Gordon, & Hobbs, 2008). The immersiveness of the platform also has implications in language education in relation to intercultural learning (e.g. Jauregi et al., 2011; Panichi, Deutschmann, & Molka-Danielsen, 2010) and learner identity construction (Wigham, 2012).

Figure 1. Snapshot of a virtual world language class

1.2. Learner participation in virtual worlds

One of the main challenges in Web-based education is to understand and encourage student participation (Bento & Schuster, 2003, p. 157). Initially, virtual world research in Computer-Mediated Communication (CMC) within CALL was limited to an investigation primarily of learner interaction and participation as a linguistic activity (Deutschmann & Panichi, 2009b). However, at the outset of her research project, it seemed to the author of this paper that the focus of the virtual world research literature on learner participation as a linguistic activity was providing a limited understanding of the phenomenon and of the context within which it was being discussed. Thus, the aim of the study was to go beyond the existing understandings of participation at the time and to take a closer look at the specific affordances of the platform in particular.

2. Method

It can be argued that virtual world platforms, with their visual and graphic dimension, demand a methodological approach which is able to take into consideration the visual data generated by the platform as well as the linguistic data. Indeed, in line with a call for a more multimodal approach to research into learner interaction in CALL (e.g. Lamy, 2004; Lamy & Hampel, 2007), the study also aimed to provide for an *exploratory research framework* which would allow for the development of a broader analytical approach to learner participation in context than previous research.

2.1. Research framework

The study reported on in this paper makes use of *Reflexivity* (Alvesson & Sköldberg, 2009; Mason, 2002) and the practitioner research framework of *Exploratory Practice* (Allwright, 2005) as its core methodological approach to the building of an exploratory Case Study (Yin, 2009) within the qualitative Case Study Research tradition (Hood, 2009).

At the heart of the case study research project was the *Talkademy Business English Course*. The course was made up of a total of 10 2-hour lessons which took place in both the virtual world of Second Life® and in Skype®. The course was the result of a telecollaboration project under the umbrella of the EU funded Euroversity Network (www.euroversity.eu) which ended in November, 2014. The partners involved in the running of the course were Hull University, UK, Bielefeld University, Germany and the Talkademy online educational charity, Austria. A total

of 16 people were involved in the course (teaching and support staff, and learners). Informed consent was obtained from all participants and the virtual world data was anonymised.

2.2. Data collection and analysis

The research project considered as data all of the information that was produced as part of the researcher's direct engagement with the teaching and design of the *Talkademy Business English Course* described above. In this sense, the Case Study frames and captures data that was generated during the design and implementation of the course and it includes both primary and secondary data as defined by Lamy and Hampel (2007). Recordings, screenshots and snapshots of teacher and learner activity in the virtual world platform were considered primary data. The virtual world data collected under the study was analysed from a multimodal perspective (Lamy, 2004) and made use of *visualisation* as the primary analytical tool (Mason, 2002). The data was analysed in relation to what had been identified during the data classification stage as the three main relevant features of the platform: avatars, artefacts and spaces.

3. Results and discussion

Through a systematic analysis of the case-study data in relation to the features of the virtual world and the definitions and understandings of learner participation from the literature, the following understandings of learner participation emerged.

As far as learner and teacher avatars are concerned, learner participation emerged as being characterised by a *representational* and *performative* dimension. The first dimension refers to the visual impact of the platform on users and is determined by how learner-teacher avatars appear to other avatars and themselves. The latter refers to the nature of learner interactions as avatars within the platform. Within this framework, the data indicated that avatar interaction within the context of language teaching and learning is determined by avatar proximity and positioning, avatar contextualised movement, the scope of avatar interactions and avatar-learner agency.

If we examine avatar use of virtual world artefacts and spaces through the same template, learner participation manifests itself as the sharing of information and experience, learner linguistic contributions to the environment and through the visualisation of learner-avatar intentions, understanding and learning.

In addition, the case-study data clearly indicates that there are three fundamental issues that come into play in relation to learner participation in virtual worlds. They are the learners' motivation and willingness to participate, the features of the platform and the quality of learners' interaction with these features and, last but not least, the role played by the teachers as designers of virtual world tasks and environments for learner interaction.

Finally, as video-recordings capture the interactions of language learning classrooms, current technology enables us to capture the interactions of the virtual world classroom. However, I would like to argue that the representational and performative dimensions of virtual world interactions afforded by the visual nature of the platform provide us with an additional interpretative tool. Indeed, I would argue that it is within this heightened immersive dimension that our practices and our assumptions about language education become more critically "tangible".

4.   Conclusions

This paper has made use of data from an EU telecollaboration project to inform a discussion of language-learner participation in virtual worlds. Virtual world platforms have been presented both as a site for the collection of relevant data and as an analytical tool. Through the use of visualisation and the inclusion of non-verbal data as part of a multimodal approach, the study has attempted to address bias towards verbal data in the research literature. The findings are considered to be relevant to research into learner participation in general, course and task design for language learning in virtual worlds and language teacher reflectivity.

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