Selling the Selling Point: How to create users of architectural models in Second Life

Architects have access to a range of information and communication technologies through which they communicate design visions with other actors throughout the building process. They use paper and pencils, auto-CAD drawings, foam models, cardboard models, fly-through illustrations, and other forms of visualization (Gänshirt 2007). In practice, a lot of these technologies co-exist. Presently, there is a trend toward creating new models of communication that allow for immersion and online co-creation. In object-based, three-dimensional, online collaborative spaces, architects can communicate with contractors and other actors about design in new ways. This poses new opportunities to invite users into the design process. Traditional forms of user involvement in architecture have been constricted by a version of Collingridge’s control dilemma (Collingridge 1980): At the start of the process, prospective users potentially have a large amount of influence, but it is very hard for them to know what to influence, because the architects only has limited capacity to create models that allow users to imagine the proposed environments. Later in the process, various visualizations make it easier for users to understand the visions and also to imagine changes and suggestions, but by this time the architectural models might not be so easily changed anymore. In contrast, object-based virtual worlds promise a technology which affords elaborate models of buildings or cityscapes, while being very flexible and open to change.

For architects who can be seen as first movers (Rogers 1995) in relation to virtual worlds as a professional communication platform, this seems like a real selling point for the virtual technology. Users of architecture can be invited to test, inhibit and co-create new physical environments in an immersive way – in what has been termed a process of imaginative inhabitation (Rice 2007). A positive outcome of user-involvement is taken for granted as a way of democratizing (Von Hippel 2005) architecture, and users are expected to jump at this possibility for exercising user-driven, or at least user-involving innovation in physical space. Critiques of this idealized view of user-involvement in architecture have been raised (Pallasmaa 2005), but this paper will not take a normative stand in relation to debate. Instead, drawing upon the STS literature on innovation, this paper will focus on this configuring of the user (Grint and Woolgar 1997; Oudshoorn and Pinch 2005) and demonstrate how that is a task that creates work. A user is not a pre-existing entity waiting to be mobilized by the architect. Rather, the architect has to devote time and effort in order to create interest and enroll actors as users in the design process.

The paper looks at the use of Second Life (SL) for the purpose of communicating about projects which are to be realized physically. It focuses on two projects in particular: the construction of a shopping mall to be built in Cairo and the construction of a home to be built in the United States. In both cases, the paper tells the architects’ stories of why and how they have developed this type of communication platform, and how the process of making other actors interested unfolded. The analyses are based on ‘on-site’ observation as well as interviews in SL and e-mail correspondence. Other studies of user-driven innovation in virtual worlds have looked at the possibilities for testing buildings to be built in real life (Kohler, Matzler et al. 2009), but this has been a question of setting up experiments with SL residents, not engaging non-residents.

The analysis demonstrates how innovation of SL as a communication platform for architecture involves a difficult process of enrolling actors. It has to reconcile a contradictory movement between the high expectations of customers in relation to professionalism, immersion, and participation (stemming from prior experiences with 3D, fly through and immersion) and their inability to see through SL’s technical and aesthetic limitations and understand the specificity of what this technology affords. Since customers often have limited practical experience with advanced technologies, there is a negotiation between innovative architects and customers about the rationale and advantages of virtual worlds (VWs).

Because VW architectural models do not stand alone, but must be combined with other information and communication technologies, they currently represent a costly add-on to construction projects. This is another reason why the specificity of this technology has to be explicated in order to sell. To get actors interested they must be made to see 1) how space can be communicated when you can walk around in a specific building, 2) how space can be imagined as used in physical reality (with furniture, light simulation, etc.), 3) how the costumer can manipulate variables and gain power over the building process, 4) how new angles may be revealed. These features potentially put the costumer in control, but since costumers are often unskilled in relation to the technology, the architect becomes a powerful obligatory passage point. To gain control over the future building, users must pass through the VW architect, who becomes the judge of the doable and the impossible.

Seeing how users become dependent on the VW architect clearly poses serious questions to the idea of using object-based virtual environments to empower the user in the innovation process. The question is whether this is a passing phase that will be over once the users become technically more skilled in virtual environments, or whether the asymmetry is a more fundamental aspect of innovation within communication forms, such as virtual environments. Following the lines of thought of Grint and Woolgar, technologies sell themselves when many different readers find a use for them. This means that attempts to prescibe readings or delimit ways in which it can be read is recipe for disaster. Instead, in the case of virtual buildings or cityscapes, architects must provide for particular readings; delimits interpretative options, rather than determining them. User configuration involves boundary work; the user's character, capacity, possible future actions are sought structured and defined in relation to the machine. We cannot count on users to reach a final state of ‘skilled usage’ – the technology is open, and has to remain so to some degree. Also, the ad hoc character of construction projects has enormous significance for this question. Users never get the chance to acquire competence.

Questions about the enrolment of users, however, do not just have implications for the idea of democratizing the innovation process – it is also of importance for the process of marketization of new innovations (Çalışkan and Callon 2009; Callon and Caliskan Work in progress). From the perspective of Çalışkan and Callon, marketization is a laborious process that consists of the assembly of actions, devices, materialities and economic knowledges*.* Compared to the framework of Çalışkan and Callon, this paper puts particular emphasis on the role of communication in creating markets and it does so by pointing to the fact that marketization happens at several levels in the cases of SL architecture. Ultimately, the architects are trying to market the idea of the physical building as a user-involved and democratized project through the use of innovative communication in SL. However, in order to do this marketization, the architects first have to market the idea of using SL as a communication platform. What might have looked as an innovative means to another end turns up to be an object for marketization itself. In this process it becomes clear that a crucial thing is to balance the new and the recognizable in a suitable fashion. An innovation has to be sufficiently new and interesting to enroll actors in its creation, but it also has to be sufficiently recognizable as a worthwhile ‘realistic’ project.

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