The Present Tense of Virtual Space

Dr Andrew Burrell

Faculty of Design, Architecture and Building University of Technology Sydney andrew.burrell@uts.edu.au

Abstract

This paper presents my ongoing investigation into narrative spaces in immersive virtual environments. It focuses on two recent projects, "p<AR>k*land*" and "loft," but also uses other examples from over twenty years of practicebased research utilising virtual environments to tell spatial stories. I develop an argument that our understanding of virtual space exists as an extension of physical space, rather than an adjunct to it. Using Robert Morris's seminal text, "The Present Text of Space" as a starting point, I explore the role of memory and imagination in our understanding of, and in environments relation to. virtual as phenomenologically real spaces. This leads into an exploration of classical mnemonic spaces, as environments, virtual support to an understanding of the functionality of some of the spatial affordances of virtual environments.



Fig 1. *p*<*AR*>*k***land**, 2017, Andrew Burrell and Nori Beppu, augmented reality installation.

"p<AR>k*land*" is a playful interactive augmented reality experience that presents a virtual parkland that comes to life before the viewer's eyes. The audience can interact with a menagerie of creatures as they help to create the augmented environment these creatures inhabit. "p<AR>k*land*" is designed for a wide audience, but targets children. It was created by ab:nb the collaborative duo of Andrew Burrell and Nori Beppu.

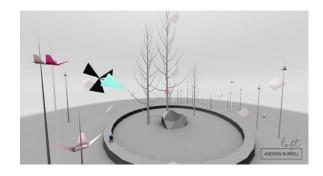


Fig 2. Loft, 2017, Andrew Burrell, interactive webVR project.

"Loft" is a webVR narrative experience. It consists of a self-contained environment that plays out for the viewer based on its own logic. With limited agency granted them, the viewer's role will initially feel like one of pure observation, but as the world unfolds around them, they will find that their point of view, and how they choose to navigate the space, will make critical differences to how they experience the narrative and logic of this world. 'Loft' premiered the 2017 ACM in SIGGRAPH Digital Art Community WebVR Exhibition.

What these two projects have in common is that they are part of an ongoing investigation into the use of immersive virtual environments (regardless of the technology used to access them) to bring the user into a narrative space designed specifically for the affordances of these environments. In many ways, these projects are developed in spite of, rather than because of, the emergence of consumer grade virtual and augmented reality headsets and are informed by a much longer history of working and creating in virtual environments – a practice originally informed by installation art practice.

Both of these projects, and the others I will discuss, are generative in nature, and the generative systems behind them influence and build the narratives created with the additional input of the viewer. "p<AR>k*land*" is built upon a combinatorial framework of characters and props brought together by the viewer as augmentations on the screen in front of them, while the virtual environment of "loft" is built in real time as the viewer literally floats in space building a narrative from the fragments generating around them.

These examples form a framework to support the argument that central to the experiential nature of the resulting virtual environments, is a reversal of the logic of Morris's original notion that "real space is not experienced except in real time" through an understanding that immersive virtual space, experienced in real time, becomes real via the resultant phenomenological experience of "the present tense of *virtual* space." [2]

References

- 1. Robert Morris, "The Present Tense of Space," Art in America, *January-February*, (1978): 70 81.
- 2. Robert Morris, "The Present Tense of Space," 70.

Biography

Andrew Burrell is a practice-based researcher and educator exploring virtual and digitally mediated environments as a site for the construction, experience and exploration of memory as narrative.

ongoing research investigates His the relationship between imagined and remembered narrative and how the multi-layered biological technological encoding and of human subjectivity may be portrayed within, and inform the design of, virtual and augmented environments. He is a lecturer in Visual Communication at the University of Technology Sydney.