

## **Archeologies of the Future**

Immersive science theatre and the proto-digital

My presentation aims to excavate the notion of science theatre through its past. Through the interplay between present performances, its archaeological traces and technological artefacts, I intent to trace the history of technologies as performing objects and the role spectacular technologies have played in a pre-digital era. By foregrounding media archaeology as a promising methodological approach to contemporary theatre and intermediality I propose to historicize notions of play, performance and participation. Inversely, this approach implies a discussion of the ways in which digital technologies today refocus, enhance and/or disrupt past pre-digital theatrical practices.

More specifically, I will present two case studies, both of which operate on the verge of art and science: (1) the futuristic performance art of the Brussels based company CREW and (2) the planetarium performances by for instance Adam Walker and his son, who, throughout the nineteenth century, attracted large audiences in theatres and opera houses across London. As a result of this historical parallel, I will briefly touch upon (3) the 'Embodied Orrery', an currently ongoing research experiment in art and science, theatre and technology.

(1) Since 1998, the immersive live art of CREW has successfully been challenging common notions of (tele)presence, spectatorship, theatricality and narration. Its immersive embodied environments trouble established categories of art and science. Scientific invention plays a constitutive role in the creative process, as engineers from different universities develop innovative technologies for CREW to use on stage. At the same time the engineers find in theatre a laboratory where they can test the progress and feasibility of their interface designs and cognitive theories. I will exemplify the impetus of this collaboration with a discussion of omni-directional video and the cognitive implications thereof for user experience.

(2) The 19th century was a time for mass involvement in science and visiting demonstrative lectures in both learned environments, such as lecture halls and observatories, as well as popular venues, such as theatres and opera houses, proved to be a popular public pursuit. As a case in point, I will propose a discussion of the spectacle of astronomy, the visual science par excellence long put forward as a blueprint of what science should be. These planetarium performances animated the moving of the celestial bodies - the stars, planets and comets - in front of a lively audience. They delivered cosmological narratives that situated the place of man, his progress and technology in a rapidly evolving world.

(3) Since the early 19th century and into the 21th century, the planetarium, a theatre built for presenting educational and entertaining shows about astronomy, remains a locus of innovations on the verge of art and science. Moving ever further into the 21th century, due to new scientific discoveries, revolutionary digital technologies and urgent global concerns, the art of making maps of the universe is changing accordingly. The 'Embodied Orrery', through the re-enactment of a planetarium on experimental grounds and by implementing previously unused technologies, pictures the specific exchange of art and science in the wake of the digital aferlife. It will thus serve both as artistic outcome and as object of research into the history of planetarium performances.