ABSTRACT:

In the rapid technological urbanisation of the built fabric of the city during the 21st century it has changed the way we engage spaces within the city. It has had both a positive and negative effect on existing social structures. The more digitally reliant society becomes the more essential the role of architecture and infrastructure networks become. The city is plugged in.

The young tech savvy generations have become consumed by technology in the era of mobile phones, tablets and personal computers while the older generations can feel overwhelmed or even rejected by the new technologically orientated processes and functions of the city. The city has become a network of information exchange; environments of high technical performance and reliance. This has created labour and work environments that require a more skilled work force with digital comprehension and technical proficiency.

It calls for an education system that includes advance digital literacy as part of basic education requirements to make students well equipped in a technological utopian state of living (Teletopia). In the context of Johannesburg, South Africa, with our diverse cultures and beliefs we struggle with both past and new social inequalities. In the telecommunication global village technology has no bias for race, age or culture if you are not technically proficient you are rejected and left behind.

The permanence of architecture gives it strength and integrity. The solidity of concrete, brick, steel and building materials that are assembled aid to the capacity to withstand loads and stresses. A built form that responds to contextual issues and the resolution of construction details that collectively makes for good design. The integration of technology within architecture calls designers to question its value it will add to the spaces created to the initial capital costs.

Would a more technological orientated education system be able to address the issues of schooling in South Africa today? Will technical solutions reach students who can’t afford the high cost of education, the shortage of quality teachers or the struggle to get text books to schools and liberate the school of the timetable and the availability of teachers? The role of technology in both schools and architecture will be determined by the demands of society. The internet is an agent like fire and water only given direction and purpose by those who use it. The true influence will how it will encourage spaces in schools to become more fluid and adaptable which will encourage accidental learning and peer-to-peer learning environments.

This makes the role of schools even more important to not only prepare students with the relevant technical skills required to engage the digital “Teletopian” city they live in but to develop the social skills that allows them to engage the physical environments of the city too. Society has drawn to technological advancements like a moth to a light bulb but no matter how technologically orientated we become we will always be tangible beings who need physical interaction with the spaces we appropriate from our homes, offices and schools.

more...