

Urban Logic

A timber processing factory empowering rural areas through value addition



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Abstract

The acceleration of urbanization, has increased the interdependence between rural and urban dwellers - the resources they offer each other is the common thread that pulls them closer together. While this has introduced various forms of innovation in underdeveloped parts of South Africa, the balance between what the urban areas remove from the rural land versus what returns in the form of economic upliftment; industrial transformation; cultural and social development, as well as general living standards, is still very much debatable.

This research explores how architecture can improve the value chain between rural and urban areas in order to improve the balance these two areas share, by looking at activities that can be performed in rural areas using the raw material harvested, before the material is moved to urban areas for further processing. The research process begins by looking at a broad social economic plan; the infrastructural plan to make it work; and a small intervention where these issues will be addressed. By moving activities within the supply chain previously only dedicated to and reserved for urban areas closer to rural areas, it not only keeps the supply chain safely intact but improves the context and value found in rural areas. This begins to create an organic platform for ancillary economic movement to start building, in the hopes to improve industrial sustainability.

The building is an industrial timber processing factory in northern KwaZulu-Natal that allows the context to feed into it. The main activity, amongst many others this factory does, is take wood harvested from the forests plantations of northern KZN and add an additional step where it processes it into wood fibres, to be transported in larger quantities than previously possible to the urban industrial areas where the final stage of production takes place. In a social context of poor living standards due to lack of economic activity this building aims to – parallel to wood processing work – lend itself as a community workspace in order to be the focal point for skills development where locals can utilise the timber processing equipment, cultural transformation and most importantly a port for other industries to plug-in. The architecture looks to welcome back the design principles so often lacking in current industrial buildings - these principles present a great opportunity to effect social change over and above industrial functions. Parallel to that, it questions the function of a factory in a rural setting and re-imagines its function through design and program.

The farmer sells his corn for R2.00, after production it is sold back to him as popcorn at R10.00 – the farmer cannot afford the end product of his own labour. The tensions between urban and rural; raw and finished product and, architectural design and industrial engineering, are exposed and given the spotlight in the search for economic transformation and social balance in the value chain.