



Erosion Control Road Upgrade Ugie to Langeni, Eastern Cape

Case Study

Project:	Ugie to Langeni Road Upgrading Project	Date:	February 2007
Client:	Department of Roads and Transport, Eastern Cape	Product:	SoilSaver™
Consultant:	HHO Africa	Quantity:	80 000 m ²
Contractor:	Rumdel LM3 JV		



Numerous remote, isolated communities in the former Transkei are disadvantaged by a lack of public transport and transport infrastructure. Villagers regularly walk 17km between the village of Nyibeni and Langeni Sawmill to access transport. Local communities, the Ncembu Development Forum and emerging farmers, in consultation with the Department of Roads and Transport, initiated the Ugie to Langeni road upgrade project to address the issue.

This section of road goes through a steep mountain pass and traverses the indigenous forest of Langeni, which receives very high rainfall. All excavations and cuts have to be rehabilitated and vegetated. The high rainfall on the steep gradients washes away the topsoil, causing scour on the cut slopes. The contractor, Rumdel LM3 JV, was using the pegged log system to try to overcome this erosion problem, but it is labour-intensive and time-consuming. Workers have to carry logs up steep slopes and peg them down (to prevent them rolling down the slope).

Kaytech Engineered Fabrics proposed using SoilSaver™, an erosion protection product, as an alternative to the pegged log system. SoilSaver™ is quick, effective and easy to install. The product is rolled out and pegged at 500mm intervals, and then hydroseeded. Made from natural fibre, SoilSaver™ conserves moisture and holds seeds and soil firmly in place, thus speeding vegetation growth. All parties were pleased with the results. In one week of February, extreme rainfall was recorded, but the SoilSaver™ prevented scour and the loss of topsoil, keeping the slopes intact.

SoilSaver™ is designed to resist soil particle detachment by absorbing raindrop splash impact, and to discourage rilling by impeding run-off velocity, thus preventing scour erosion. SoilSaver™ is convenient and lightweight, and no special skills are required for installation: just seed it and leave it.

