

Dakatcha Woodland article for *Swara* (EA Wild Life Society magazine) by Fleur Ng'weno

The road from Malindi winds away from the sea and the coastal lowlands, passing among farms and patches of acacia scrub. It climbs slowly to the low, rolling hills. Near Marafa the view opens up to expanses of wide-crowned woodland trees interspersed with farms, and beyond, the River Galana that becomes the Sabaki, the long Mwangea Hill and the vast dry hinterland. This is Dakatcha Woodland.

Unique Outlier

Just as Kakamega Forest is a remnant of the Guinean-Congo rainforest, Dakatcha Woodland is an outlier of the *Brachystegia* woodland that covers vast areas in countries to the south. *Brachystegia spiciformis* trees, with graceful trunks and spreading branches, form almost pure stands on white or red sands. In the rainy season the leaves are intensely bright green, and seldom-seen flowers such as *Cyrtanthus* lilies with large, pink-orange flowers and tall yellow *Eulophia* ground orchids decorate the sparsely vegetated ground.

There are other habitats that together make up the dry forests of Dakatcha Woodland: low, almost impenetrable thickets of *Cynometra webberi* and other short trees on red soils and hilltops; and a mix of large, spreading trees in the valleys. Interspersed among them are farmlands, some under cultivation, and some abandoned as the soils quickly lose fertility.

In this remote outpost of *Brachystegia* woodland are characteristic birds of this habitat, such as the Chestnut-fronted Helmet-shrike. These birds lead a social life, always in groups, fluttering from branch to branch, calling to each other, roosting close together. Other bird species in Dakatcha Woodland, however, are found nowhere else on Earth except a few coastal forests: Sokoke Scops Owl, Sokoke Pipit and Clarke's Weaver.

Clarke's Weaver, in particular, has only been seen in Dakatcha Woodland and in Arabuko-Sokoke Forest to the south. Its nesting site has never been found, but adults were seen feeding young ones in Dakatcha Woodland. Because it is the likely nesting site of Clarke's Weaver, and shelters other globally threatened species of birds, mammals and plants, Dakatcha Woodland has been declared an Important Bird Area and is part of the Eastern Africa Coastal Forests Biodiversity Hotspot.

The people who live near the forest rely on it for many of their daily needs: firewood, timber, poles and ropes; forage for livestock; fruits, meat and medicinal plants. Traditionally, slash and burn provided new fields for farming, enriched by the ashes of the trees. When settlements were few and far between, these traditional practices of farming, hunting and gathering had little impact on the forest. As more people live near a forest, however, the traditional uses which were once in balance slowly become destructive.

Dakatcha Woodland, like other natural forests, also provides ecological services to the community, the nation and the planet. These are many, and difficult to quantify, but among the best known are water catchment, soil protection, climate moderation and carbon sequestration. Forests also shelter a disproportionate number of the country's biodiversity, on which our future food, fibre or medicine may depend.

Despite its importance for water catchment, for neighbouring communities and for plant and animal diversity, Dakatcha Woodland has no formal protection status. It is on Trust Land, and has survived up to now because of difficulty of access and the goodwill of neighbouring communities.

Multiple Threats

Today Dakatcha Woodland is threatened by exploitation on a commercial scale.

For a generation there has been selective cutting of large hardwood trees, with the timber sold in coastal towns. *Cynometra* thickets were also cleared to plant pineapples, which grow well on the red soils and find a ready market in urban areas. Timber and pineapples are an important source of income for farmers who have to contend with poor soils and scarce water. Meanwhile, hunters took advantage of the improving security conditions to hunt bushmeat for an ever-widening market, and antelopes are now rarely seen in the forest.

In the last decade, pressure has intensified dramatically. Charcoal makers who had exhausted the available trees in Kilifi District moved north to Dakatcha Woodland. They camp in the forest, cut, burn and ship out the charcoal. The Kenya Forest Service seems unable or unwilling to stop the trade in the area. Lorryloads of charcoal can be seen moving out of the forest every day, not for local use, but for sale anywhere in Kenya, perhaps for export.

This year an even more devastating threat is looming. The Malindi County Council has welcomed a proposal by a company called *Jatropha Energy Ltd* to clear large tracts of land for growing *Jatropha curcas*. This South American bush has been aggressively promoted in Kenya for the “biodiesel” extracted from the oil in its seeds. It is now being tried in locations that range from rainfall-rich Western Kenya to desert-like Magadi area. Yet little is currently known of the plant’s suitability, its yield under different conditions, and the market capacity.

Nevertheless, the investor is looking to growing *Jatropha curcas* on a large scale. Local people are promised jobs, clinics, schools. Suitable land is being identified. Most investors usually wish to economize by not having to compensate farmers. The *Brachystegia* woodland on Trust land is therefore targeted.

The irony of climate change

Biofuels – fuels made from living plants instead of ancient, fossilized ones – are meant to be a positive response to climate change. On the ground, however, the effects usually turn out to be the opposite. For example, there is a net energy cost to growing maize for fuel in the United States.

In this year of historic drought, Kenyans have become painfully aware of the link between forest cover and the impacts of drought and flood. Droughts and floods may be more severe because of fossil fuel use in industrialized countries; but their effects are more devastating because of poor environmental stewardship in Kenya. Forests and wetlands play a crucial role in regulating the hydrological cycle, now gone wildly out of control.

Every day different Kenyan leaders exhort the people to protect forests and plant trees. It has become an accepted national dogma.

“How then can we condone cutting down the trees of Dakatcha Woodland to plant an untested crop?” asks Paul Matiku, Executive Director of Nature Kenya – the East Africa Natural History Society. “What will happen to local communities if we remove the trees’ capacity to catch and store water, protect the soil from erosion, and nurture medicinal plants? How do we measure the loss of a bird species found nowhere else on Earth?”

The Better Options

There are many possible paths to development for the people of Dakatcha. Here as elsewhere, conservation is often contrasted with development, as if the two were mutually exclusive, although it is people who need the environment. Now that people can see that land is limited, water is limited, it becomes critical to weigh development projects with environmental sustainability.

The people who live near Dakatcha Woodland established a number of local community organizations to improve their lives in recent years. Since 2005 Nature Kenya has been working with local groups to develop livelihood options that bring in money without destroying the forest. These options include, among others, keeping bees to produce honey for a ready market; growing trees as crops in woodlots; and guiding visitors to see the special birds of Dakatcha Woodland. A number of local organizations recently came together to form the Dakatcha Woodland Conservation Group, and a *Checklist of the Birds of Dakatcha Woodland* has already been published.

These activities may not look as new and shiny as a thousand hectares of biodiesel, but they bring in a steady income and open up new opportunities. The upgrading of the Malindi to Baricho road, as projected by the Government, will bring more local and foreign visitors to Dakatcha. Already the local groups are looking to developing accommodation for tourists and working with the local festival in honour of Mekatilili wa Menza, a heroine of the struggle against colonial rule.

Apparently oblivious to other options, the *Jatropha* project proponents continue with their search for land to clear and plant. There are old farm fields in Dakatcha, no longer in use, where *Jatropha curcas* could be grown on an experimental scale. It is not clear, however, that this alternative is even being considered. After all, cutting the trees to clear the land would earn money for “investors”, even if it leaves local communities with eroded soil and springs gone dry.

The future of Dakatcha Woodland, and Kenya’s own bird species, Clarke’s Weaver, hangs in the balance.