



Biomass Energy and the National Forest Policy

By Gladness Allan Mkamba Ag. Director Forest and Beekeeping Division Ministry of Natural Resources and Tourism Tanzania

1. FOREST RESOURCE

- Tanzania have about 48.1 million hectares of natural forest and woodland resources.
- About 31% of these environmental resources comprise of gazetted forest and woodland, more than 600 are central government Forest Reserves (FRs); 200 Local Authority FRs; 71 Village FRs and 409 of Declared Village Forests.
- On the other hand, 69% (almost 33 million ha) not gazetted spread in villages and general lands.

1. FOREST RESOURCE

- Forestry contributes much to the livelihood of the great majority of Tanzanians, mostly in the informal economy.
- Forestry has continued to form a large part of the informal sector through sale of firewood, charcoal, furniture, craft materials, fruits, honey, etc.
- This has resulted to huge impact on forests and woodlands.

2. BIOMAS ENERGY SITUATION

- The energy balance in Tanzania is dominated by biomass based fuels particularly fuelwood, charcoal and bio residues.
- Biomass-based fuels account for about 90% of primary energy supply. Commercial energy sources, the petroleum and electricity only account for about 9%, while solar, wind, and coal account for less than 1% of energy used.
- In 1999, the total wood consumption in Tanzania was estimated to be 42 million m³ per year.
- Today the annual demand (consumption) of wood is estimated at 62.3 million m³
- In 2009, One million tons of charcoal were consumed this figure rose up to 1.7 million tons in 2012.

2. BIOMAS ENERGY SITUATION

The contribution of woodfuels to national energy supply appears to be increasing, not reducing, and there are no indications that biomass energy is being produced or used any more sustainably.

Today, biomass is still the main source of energy for most Tanzanians, especially charcoal which is also an important source of income for rural and urban communities.

2. BIOMAS ENERGY SITUATION

- Study shows that for women, harvesting fuelwood from natural forests and selling could earn about Tshs 18,000 per month while for charcoal producers the average monthly profit is about Tshs 62,000.
- The ongoing large scale biofuel investment is likely to reduce access to these natural resources and this will affect the livelihood options by the rural communities.

3.CHALLENGES OF USING BIOMASS ENERGY IN TANZANIA

- Characterized by very weak governance and weak law enforcement. It is almost a free access to wood resources.
- Generally, illegally and unsustainably harvested and licenses and levies largely evaded
- Inefficient production & utilization technologies
- The sector is informal, almost totally unregulated, and open to any and all who wish to participate in it.
- Leading to deforestation and forest degradation

4. FOREST POLICY

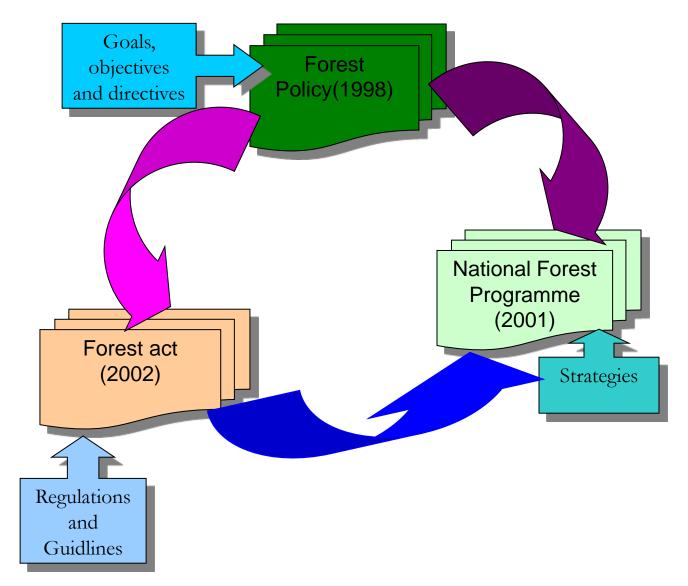
- The overall goal of the policy is to enhance the contribution of the forest sector to the sustainable development of Tanzania and the conservation and management of her natural resources for the benefit of present and future generations.
- This goal is to be realized through effective management of forest area, conservation of forest biodiversity, water catchments and soil fertility, and enhancing national capacity to manage and develop the forest sector through collaboration with all stakeholders.

4. FOREST POLICY

The objectives of the forest policy on the basis of the overall goal are:

- (i) To ensure sustainable supply of forest products and services by maintaining sufficient forest area under effective management;
- (ii) To increase employment and foreign exchange earnings through sustainable forest-based industrial development and trade;
- (iii) To ensure ecosystem stability through conservation of forest biodiversity, water catchments and soil fertility; and
- (iv) To enhance national capacity to manage and develop the forest sector in collaboration with other stakeholders.

4. FOREST POLICY Tools to implement the policy



4. FOREST POLICY

- The National Forest Programme framework guides implementation of the Forest Policy.
- The Forest Act (No. 14 of 2002) provide legal framework for the management of forests and bee resources.

The policy:-

- ensure sustainable supply and use of forest products including bio-energy, firewood and charcoal through participation of key stakeholders in joint forest management and communal based forest management.
- highlights the importance of forest resources in rural areas as the main source of energy and probably the only source of energy by the majority.
- acknowledge fuelwood and charcoal as one of the income generating activities besides agriculture both in the rural and urban.

- The policy promotes sustainable forest management and participatory approaches to forest management. These are important for addressing the issue of biomas energy in Tanzania.
- The policy provides the foundation, together with the Forest Act (2002) for Participatory Forest Management (PFM) and encourages community and private sector involvement in forest management through village land forest reserves, individual, group and community forests.

The Policy contains statements which support PFM:-

- Policy statement number 5 To enable sustainable management of forests on public lands, clear ownership for all forests and trees on those lands will be defined. The allocation of forests and their management responsibility to villages, private individuals or to the government will be promoted. Central, local and village governments may demarcate and establish forests reserves.
- Policy statement number 39 Local communities will be encouraged to participate in forestry activities. Clearly defined forestland and tree tenure rights will be instituted for local communities, including both men and women.

- The policy in its statement no. 9 recognizes woodfuel as the main source of energy both in rural and urban areas.
- It puts more emphasis on establishment of private woodlots and plantations for woodfuel production, promoting use of efficient wood conversion technology and methods as well as intensification of research and extension services.

- National Forest Programme identify energy as one of 9 cross sectoral issues, others being environment, agriculture, health, land, mineral, water, wildlife and gender.
- The programme strive to reduce the dependence on wood fuel in national energy consumption by 10%.
- Besides, Forest Act, provides regulations and guidelines on the production and trade of forest produce such as woodfuels.

- The current National Forest Policy is being reviewed and is awaiting approval by the government.
- The draft policy maintains woodfuel as one of the focus areas of the policy.
- It direct all stakeholders to be fully involved in production, harvesting, conversion and use of appropriate technologies, and in use of alternative sources of energy.

WHAT TO BE DONE

- It is a matter of fact that increasing demand for biomass energy means having significant impact on deforestation and forest degradation.
- Biomass is not only inefficiently produced and used but also unsustainably managed.
- Charcoal and firewood are an environmentally disasters commodity hence something must be done now to improve the situation.

To address the problem we need to:

- Provide conducive environment to enable switching from firewood and charcoal to other sources of energy like LPG, kerosene or electricity;
- Increase efficiency and effectiveness in the production and consumption of biomass energy;
- Put in place policy and legal frameworks to guide the sustainable development of biomass energy
- Formalize biomass into the economy as an important source of economic livelihoods.

THANK YOU FOR LISTENING