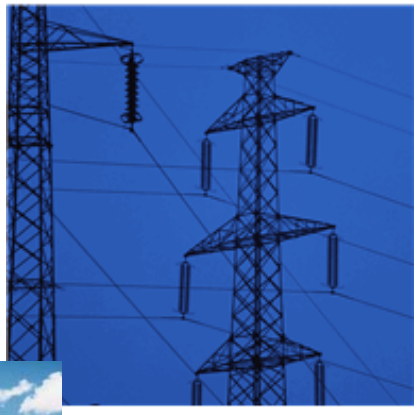
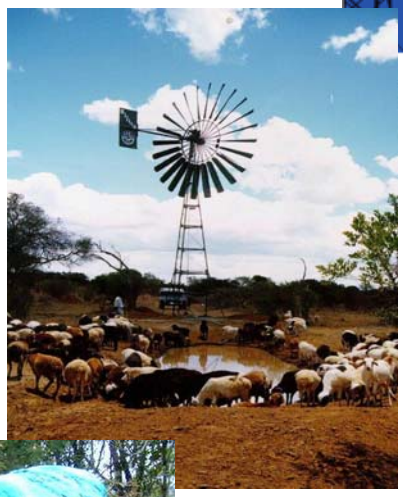
ADB FINESSE Africa Program

Compendium of National Energy Policies and Strategies





Compiled by
AFREPREN/FWD and ENDA – TM

October, 2006

Table of Contents

1.0 Background

The African Development Bank (ADB) is currently in the process of updating the 1994 Energy Sector Policy of the Bank and developing a specific strategy for Renewable Energy and Energy Efficiency. The updated Energy Policy and Renewable Energy and Energy Efficiency Strategy will enhance the operationalisation of sustainable energy projects and programs in the Bank, one of the activities of the FINESSE program. In particular the proposed strategy, which these compendiums will feed into, will link very closely to the Bank's policy for the Energy Sector.

The updating of the 1994 Energy Sector Policy and the development of the strategy for Renewable energy and Energy Efficiency are two technical issues directly related to the functioning of Africa's energy markets at the local, national, sub-regional and continental levels.

The updated Energy Sector Policy will provide a comprehensive policy framework for the operations of the African Development Bank that will align its investment with the current ongoing international momentum and which RMCs, as well as regional cooperation and international organisations, may choose to use as a guide in reviewing and updating their own energy sector policies to:

- ensure environmental sustainability in developing their energy resources; satisfy growing energy demand, paying special attention to the needs of energy-poor segments of the population particularly in the rural areas;

- promote steady growth of energy efficiency, productivity, and conservation at both the supply and demand sides;

- stimulate growing application of renewable energy resources, particular those with minimal harmful environmental impacts (e.g., solar, wind, geothermal, biomass, and mini hydro);

- explore RMCs' participation in the emerging global market arrangements envisaged under the Kyoto Convention on Climate Change for control of CO2 and other harmful emissions;

- support the role of civil society organizations in spearheading environmentally sustainable and socially equitable energy demand and supply solutions; and

- sustain the growing role of private enterprise and the development of efficient energy markets in Africa.

Given the nature of renewable energy and its potential role in poverty reduction and sustainable development, it is critical that the Bank develops a strategy that specifically addresses this vital sector.

2.0 Objectives

The assignment has two objectives:

- Update the African Development Bank's 1994 Energy Sector Policy based on the current state of affairs regarding the energy sector in Africa and issues faced in that regard.

- Prepare a strategy on renewable energy and energy efficiency projects for the African Development Bank, based on the updated Energy Sector Policy, updated with the current momentum created by the WSSD, the Renewables2004 conference in Bonn and for example the REEED, GVEP and AREED initiatives.

The policy and strategy will provide guidance to ADB task managers on the integration of (renewable) energy (components) in the Bank's operations and the development of the energy sector on the continent.

3.0 Compendium of Energy Policies and Strategies

The purpose of compiling this compendium by the AFREPREN/FWD and ENDA is to assist in the review of existing National Energy Policies and strategies so as to identify common threads as well as unique characteristics of energy policies of Regional Member Countries. By carefully assessing successful national energy policies (as well as examining less-successful policy initiatives), the national assessments provides valuable lessons that can inform the updating of ADB's energy policy. The aforementioned review and assesment will be carried out in the planned position paper – the primary output of Phase 1 of the assignment.

Though not yet undertaken, the national assessment will include a review of past, current and planned energy investments of selected RMCs. As the ADB is a major stakeholder in past and planned RMC's energy investment, a better understanding of past and planned energy investment patterns will be a useful input for updating ADB's energy policy.

The compendium forms a compilation of energy policies and strategies for African countries along with other energy sector interests that dovetail with those of ADB. The purpose of the review of existing national energy policies and strategies is to identify common threads as well as unique characteriscs to be highlighted in the planned position paper.

For each national policy examined, the available information is summarized in the following fashion:

i) General Information – This gives general information relating to the energy policy or strategy paper. It states the mission, vision and objectives of the policy/strategy paper in the cases where it has been provided.

ii) National Energy Priorities - This section provides a summary of national energy priorities as outlined by the energy policy document

iii) Executive Summary of Energy Policy Document - This table provides the executive summary where it has been provided.

It is important to note that the assesment of the energy policies is still ongoing and that since not all countries have developed energy policies, the Consortium has taken the liberty of compiling UNFCC related National Communications, Country Strategy Papers (CSPs) and Poverty Reduction Strategy Papers (PRSPs) to assist in updating information on the status of the energy sector of African countries and to extract the relevant information pertaining to ADB FINESSE priority areas.

4.0 Coverage of the Compendium

As shown in the following map and table, a total of 39 African countries are covered by this compendium.

Table 1: Coverage by Country

No.	Country	National Energy Policy and Strategy	National Communication (Excerpts on Energy Priorities)	Country Strategy Paper	Poverty Reduction Strategy Paper
1	Angola				
2	Botswana				
3	Burkina Faso				
4	Burundi				
5	Cameroon				
6	Cape Verde				
7	Central African Republic				
8	Comoros				
9	Congo – Brazeville				
10	Djibouti				
11	Egypt				
12	Eritrea				
13	Ethiopia				
14	Ghana				
15	Kenya				
16	Lesotho				
17	Madagascar				
18	Malawi				
19	Mali				
20	Mauritania				
21	Mauritius				
22	Morocco				
23	Mozambique				
24	Namibia				
25	Niger				
26	Nigeria				
27	Rwanda				
28	Sao Tome and Principe				
29	Seychelles				
30	Sierra Leone				
31	Somalia				

32	South Africa				
33	Sudan				
34	Swaziland				
35	Tanzania				
36	The Gambia				
37	Uganda				
38	Zambia				
39	Zimbabwe				

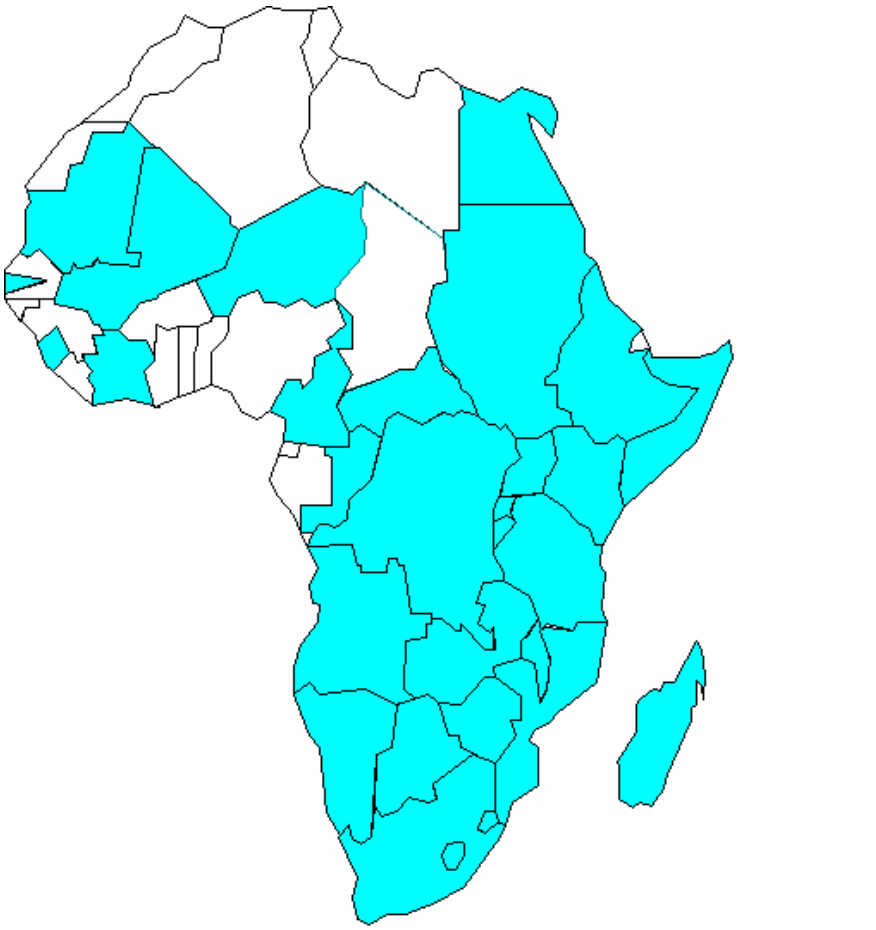


Figure 1: Countries Covered by the Compendium

The following table (Table 2) highlights the various National Energy Priorities identified from the National Energy Policies and Strategies assessed. The table also assesses how the various countries cover the identified National Energy Priorities.

Table 2: Assessment of National Energy Priorities

	Increasing investment in Energy	Enhance security of Supply[1]	Managing Environmental Impacts	Sustainable Energy Option (RE and EE)	Improving Energy Access	Gender and Energy	Reforms[2]	Enhance Energy to support rural development and Agriculture	Capacity Building [3]	Enhanced research	Employment Creation	Oil/Petroleum Exploration
Country												
Botswana												
Eritrea												
Ethiopia												
Ghana												
Kenya												
Lesotho												
Malawi												
Mali												
Mozambique												
Namibia												
Rwanda												
Sierra Leone												
South Africa (strategy paper)												
South Africa (white paper)												
Sudan												
Swaziland												
Tanzania												
Uganda												
Zambia												
Zimbabwe												
Benin[4]												
Burkina Faso												
Total	**16**	**17**	**20**	**19**	**19**	**2**	**15**	**15**	**16**	**6**	**3**	**1**

Note: The selected national energy priorities are based from the countries national energy policies and the strategy papers

[1] Through diversity or regional interconnection/power pool
[2] Including improving Energy Governance and Administration as well as enhancing competitive and fair market
[3] This involves enhancing capacities of the government entities, utilities, private sectors and NGOs
[4] The priorities are derived from summary of the report titled "ECOWAS Initiative: Access to energy services of the rural and peri-urban populations" and not the country's national energy policy.

National Energy Policies

a) Ethiopia

The table below lists general information on the national energy policy

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: National Mines, Water, Energy & Geo-Information Science and Technology Policy</td></tr>
<tr><td>Country:

Ethiopia</td><td>Commencement Year (Formulated):

Not indicated</td><td>Year Published (Finalized):

1994</td><td>Total number of pages:
20</td><td>Ministry responsible:

Ethiopian Science & Technology Commission</td><td>Nature of document:

Draft Policy on National Mines, Water, Energy and Geo-information Science and Technology</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">The main objective of the policy is, to build and strengthen science and technology capability in the mines, water, energy and geo-information sector commensurate with the national socio-economic conditions that will assist the development efforts of the country. The policy has the following specific objectives:

• To build the sector’s science and technology capability to study, develop and sustainably utilize mineral, water and energy resources; conserve and protect the environment, predict and prevent natural and man made hazards before they cause damage; and understand the geological conditions of the country.

• To support the development activities of the sector by developing technologies which are based on domestic resources and knowledge and by building and strengthening the capability to search, negotiate, transfer and generate</td></tr>
</table>

	appropriate technologies. • To undertake research and development activities which would help to develop and exploit mineral, water and energy resources in an environmentally sound and sustainable way and disseminate R&D results that are proven to be useful • To point out directions and establish efficient systems of operation for mines, water, energy and geo-information S&T activities.

N/A – Information not Available

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following summary may give an indication of the National Energy priorities:

- Science & Technology capability building activities to utilize the locally available energy resources such as wind, biogas, hydro, solar and geothermal power for electricity generation or harnessing them for direct use in view of enhancing rural development and improving the living standard of the peasantry.

- Research to select, use, repair, modify and locally produce equipment, goods and spare parts that enable to generate, transport, distribute and use energy.

- Research undertakings designed to reduce dependence on imported petroleum, improve efficiency of fuel use and substitute fuel imports by developing local energy resources.

- Activities designed to develop and disseminate energy technologies useful to transform traditional energy resources and agri-residues and refuse materials into modern energy for better use.

- S & T activities to select and appropriately develop multipurpose indigenous as well as imported tree species of fast growth rate, high calorific value and which do not compete for farm lands.

- R&D activities to tap and use new and renewable energy resources such as solar, wind and geothermal energies for different purposes.

- S&T capability building to prospect and develop extensively and intensively non-renewable energy resources such as petroleum, natural gas and coal.

- Nuclear S&T capability building to transfer and expand the peaceful uses of atomic energy in various sectors.

- Capability building in energy project study, design, other engineering works and consultancy services.

- Studies and research that enable to use energy economically, efficiently and environment friendly.

- Sensitization activities through appropriate popularization methods for wider participation of the society in energy development and utilization

- Need and plan based energy Science & Technoloy manpower training

- Activities to strengthen the capability to collect, store, compile, disseminate and exchange energy Science & Technology information

- Studies to set standards for energy technologies and their utilization

- Undertakings to strengthen and expand organizations that conduct Research & Development activities to develop and utilize the country's energy resources and establish new ones as appropriate.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* Formulation of detailed sectoral science and technology (S&T) policies is the next fundamental step towards the implementation of the National Science and Technology Policy which was issued recently by the transitional Government of Ethiopia. This sectoral S&T policy has been formulated by merging together the mines, water, energy and geo-information sub-sectors which are interrelated and complementary to each other. Although the geological conditions of Ethiopia indicate that the country is endowed with vast mineral resources, only very few of them have been exploited. The mining history of the country reveals that most of the mineral development activities undertaken so far have been concentrated on a single mineral - gold. The contribution of the mineral sector to the GDP does not exceed 2% owing to the low level development of the sub-sector. Weak investment capability and S&T base, limited local demand for mineral raw materials and poor quantity and quality of information resources in the sector are among the major reasons for the

	underdevelopment of the mineral endowments of the country. Exploration works show that minerals which can be used for construction and as raw materials for ceramics, cement, glass and fertilizer production occur in various parts of the country. The presence of a large amount of geothermal energy in the Rift Valley and natural gas in the Ogaden Region has been proved. Studies also indicate the possible occurrence of petroleum in the later region. Although the new economic policy, which encourages private investment, is believed to create a favorable condition for mineral resources development, strengthening the sector's S&T capability is an activity which deserves due attention. Despite the fact that Ethiopia is one of the African countries that are endowed with high potential of water resources, the country has been ravaged by repeated drought and famine due to its inability to use these resources effectively. It is estimated that the country has 3.5 million hectares of land suitable for large scale irrigation development, out of which only 3% has been developed so far. The hydropower generation potential of the country is estimated to be about 650 billion kilowatt hours, of which, according to some studies, an estimated potential of 120-160 billion kilowatt hours per annum could have currently been put into use. However, only about 1% of this potential is being used at the present. Although there is a potential to produce 20,000 to 40,000 tones of fish per annum from the water resources of the country, the present production level doesn't exceed 4,300 tones. In 1992, it was estimated that 26% of the country's total population, 77% of the urban population and only 19% of the rural population, are able to get potable water. The above figures indicate that the development level of the sector is very low and it would not be difficult to understand its negative impact on the health services and living standards of the people.

Source: *Science and Technology Commission (ESTC), 1994. National Mines, Water, Energy and Geo-Information Science and Technology Policy. ESTC, Addis Ababa*

b) Sierra Leone

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: The Energy Policy for Sierra Leone</td></tr>
<tr><td>Country:

Sierra Leone</td><td>Commencement Year (Formulated):

Not indicated</td><td>Year Published (Finalized):

2004</td><td>Total number of pages:

73</td><td>Ministry responsible:

Ministry of Energy and Power</td><td>Nature of document:

Draft Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td>If yes, please state/list:</td><td colspan="5">The broad energy policy objective is “to ensure adequate, cost effective and affordable supply of energy to meet development needs, while protecting and conserving the environment.” The specific policy objectives as indicated in the energy policy are to:

• Provide sustainable energy services for development

• Utilize energy as tool to accelerate economic empowerment for urban and rural development

• Improve access to affordable energy services

• Provide and enabling environment for the provision of energy services

• Enhance security of supply

• Promote development of indigenous energy resources

• Promote energy efficiency and conservation as well as prudent environmental, health and safety practices</td></tr>
</table>

ii) National Energy Priorities

- Developing positive linkages between the energy sector, poverty alleviation and economic growth
- Integrating the objective of environmental sustainability into all energy initiatives
- Demand side management and energy efficiency
- Developing an energy resource base and dissemination of key information
- Promoting private participation and the development of competitive markets in energy technology and services
- Developing, where necessary, appropriate regulatory frameworks and capacity.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* Sierra Leone is reasonably well endowned with energy resources particularly biomass energy, hydroelectricity and other renewable energy sources (e.g. solar energy). There is an extensive network of rivers and tributaries that provide a large hydroelectric power potential conservatively estimated at 1,200MW. These resources can play a catalytic role in sustaining Sierra Leone's development. The country however faces difficulties with commercial energy supplies, particularly electric supply. Sierra Leone also imports all of its fuel requirements. The Sierra Leone constitution states as one of its economic objectives that the state shall "harness all natural resources of the nation to promote national prosperity and an efficient, dynamic and self reliant economy." An energy policy that exploits the vast potential from biomass, hydro resources and other renewable energy resources is certainly geared towards meeting this economic objective. As the country embarks on a transition process, it is not only appropriate but also essential that it considers the centrality od energy to the realization of the country's economic development. The vulnerability of the economy in the last decades to insecure energy supply demands that a hard look is taken at the energy situation with a view to accomplishing two interrelated outcomes.

	Firstly, it is necessary to adopt a policy that has short, medium and long term perspectives on how to address the energy needs of the country. Secondly, an environment must be created for the sustainable supply of affordable energy services. A critical factor in this direction will be improvement in the governance of the sector including the efficient management of the sector, affordability of the service and widened access to cover rural productive sectors.

Source: *Ministry of Energy and Power (MEP), 2004. The Energy Policy for Sierra Leone. MEP, Freetown*

c) Tanzania

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: The Tanzania National Energy Policy					
Country: Tanzania	**Commencement Year (Formulated):** 1992	**Year Published (Finalized):** 2003	**Total number of pages:** 32	**Ministry responsible:** Ministry of Energy and Minerals	**Nature of document:** Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please provide:	The vision of the energy sector is to effectively contribute to the growth of the national economy and thereby improve the standard of living for the entire nation in a sustainable and environmentally sound manner.				
Is the mission of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please provide	The mission for the energy sector is to create conditions for the provision of safe, reliable, efficient, cost-effective and environmentally appropriate energy services to all sectors on a sustainable basis.				
Are the objectives of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please state/list:	The national energy objectives are to ensure availability of reliable and affordable energy supplies and their use in a rational and sustainable manner in order to support national development goals. The national energy policy, therefore, aims to establish an efficient energy production, procurement, transportation, distribution and end-use systems in an environmentally sound and sustainable manner.				

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following energy strategies may give an indication of the National Energy priorities:

Market Economy:

In line with the overall economic policy of the country, the market oriented concept shall apply to the supply of energy products and services. Implicitly, medium and long-term services of independent economic actors should determine allocation of resources. Competition on fair and equitable conditions among independent actors shall form the basis for market efficiency.

Regulatory Regime:

In order to ensure that the market functions without distortions, there will be independent regulatory regimes for all relevant parts of the energy sector, namely electricity and petroleum. While the institutional framework and the regulatory mandate may vary in the different energy sub-sectors, the regulatory regime will be characterised by its autonomy, transparency, predictability and stability. To safeguard this, the regulatory regime shall be anchored in legislation.

National Interest versus Market Forces:

In order to achieve the national development objectives of economic growth and poverty reduction, the reliance on market forces is not intended to hinder the role of the state to intervene when and where market forces fail to deliver desired results. Keeping its role as facilitator of an enabling environment for the market, the state shall regulate or deregulate the market in order to enhance the benefits of development for the economically weaker communities and groups. The state needs to unconditionally protect and promote the interests of society as a whole. Thus, the state will apply transparent fiscal (taxes, duties, levies) and non-fiscal (fees, subsidies, concessional credits, guarantees) measures to direct market forces and, when necessary, correct market failures.

***Regional Cooperation and Trade*:** In the Southern Africa region, there are apparent differences between areas with electric energy production potentials and regions with electricity deficits. Regional interconnection and integration of the power systems are therefore essential for the economies of Tanzania and its neighbouring countries to achieve efficient energy markets. Long-term decisions must therefore be based on regional energy considerations.

Energy Conservation and Efficiency:

Economic development correlates strongly with energy consumption and energy independence. The utilisation of energy is related to exploitation of natural resources and of life supporting elements as water and forests. Efficient use of energy is therefore a necessary condition for sustainable economic development. Energy conservation and efficiency issues should, therefore, be high priorities of the Government.

Environmental Management: Crosscutting all energy sub-sectors and all relevant sources of energy are the environmental impacts of energy exploration, production, distribution and consumption. Environmental impacts and hazards shall be addressed by rigorous environmental management regimes on all energy activities and by applying the economic instruments for changing market behaviour. This will discourage any use of environmentally unsound energy technologies (energy inefficiency, unclean practices).

Gender Issues, the Social Role of Women and Men:
Inferior energy practices, particularly among poor households in rural and semi-urban areas, are mainly affecting women. The collection and use of fuel-wood are related with heavy and often low productive time-consuming work, performed by women in search of fuel wood. It also represents a serious health hazard through smoke and carbon dioxide, generated by using inferior stoves/fuel types.

The energy policy, therefore, introduces an institutional focus on improvements of rural and semi-urban energy practices in order to reduce women workload and to involve them in the problem solving and decision-making processes on energy issues. Women are under represented on the supply side of the commercial energy. The involvement of women at all levels of the sector shall, therefore, be prioritised to better utilize available potential competence and capacity. Training and incentives for increased female participation as decision-makers at all levels need to be encouraged.

Financial and Fiscal Implications:
The energy sector represents a substantial part of the national economy. The Government shall balance between the use of the energy sector for revenue generation and the need for affordable energy by limiting the impact of high taxes, levies and other duties on production costs. This balance could include strict cost pricing on the market of major energy products, as well as the requirement of the sector for subsidies, incentives and other costs, which have to be covered within the sector itself or by the national state budget. The cost of energy represents a significant part of the total cost structure of companies consequently it affects the competitiveness of products at domestic as well as export markets. Cost effectiveness in the production and supply of energy may be achieved through continued opening up and liberalisation of the energy market and further introduction of competition at all levels of the sector. The elimination of cross-subsidisation from large energy consumers to households and other smaller consumers is a major challenge for the sector.

Appropriate Technologies:
There is a broad range of technological alternatives to be applied within the energy sub-sectors. Extensive research and development have been made both in Tanzania and internationally. Consideration needs to be on the application of appropriate technologies that are affordable, environmentally sound and well adapted to local needs. There is a need to scale up and thereby commercialise some of the technologies already in place in Tanzania. Furthermore, research and ongoing pilot testing should continue.

Legal Interventions:
Legislation is one of the main instruments by which the Government steers and controls the development of the energy sector. Generally, some legislation is missing and applicable existing laws are outdated and consequently do not reflect recent developments. There is a need to update the legislation and existing laws.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide:	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The first national energy policy for Tanzania was formulated in April 1992. Since then, energy subsectors as well as the overall economy have gone through structural changes, where the role of the Government has changed. Hence the policy document has been revised taking into account structural changes in the economy and political transformations at the national and international levels. However, the national policy objective for the development of the energy sector remains to provide an input in the development process by establishing an efficient energy production, procurement, transportation, distribution and end user systems in an environmentally sound manner and with due regard to gender issues. The revision has, therefore, focused on the maket mechanisms and means to reach the objective, and achieve an efficient energy sector with a balance between national and commercial interests. An interactive and participatory process between government, other stakeholders and relevant groups has been necessary as part of the formulation process in order to incorporate views of market actors and energy consumers to address the complex nature of the sector. An interactive and participatory process between government, other stakeholders and relevant groups has been necessary as part of the fourmulation process in order to incorporate views of market actors and energy consumers to address the complex nature of the sector.

Source: *Ministry of Energy and Minerals (MEM), 2003. The National Energy Policy. MEM, Dar es Salaam*

d) Uganda

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: The Energy Policy for Uganda					
Country: Uganda	**Commencement Year (Formulated):** Provision for Energy Policy set in 1995	**Year Published (Finalized):** 2002	**Total number of pages:** 43	**Ministry responsible:** Ministry of Energy and Mineral Development	**Nature of document:** Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide:					
Is the mission of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please provide	The main policy goal is "To meet the energy needs of the Ugandan population for social and economic development in an environmentally sustainable manner".				
Are the objectives of the energy explicitly policy provided? (yes or no)					**Yes**
If yes, please state/list:	The broad energy policy objectives include: • To establish the availability, potential and demand of the various energy resources in the country • To increase access to modern affordable and reliable energy services as a contribution to poverty eradication • To improve energy governance and administration • To stimulate economic development • To manage energy – related environmental impacts				

ii) National Energy Priorities

In defining the national energy priorities for Uganda, short and medium term policy priorities (2002-2012 years) are highlighted below:

1. Increase Power Generation
   - Complete the Owen Falls extension Project (Kiira Power Plant)
   - Construct two hydroelectric power plants

2. Diversify Power Generation Sources to Ensure Security of Supply
   - Develop selected renewable energy projects e.g. Kakira Sugar Co-generation, Small and Mini-Hydros

3. Increase Access to Modern Energy in Rural Areas
   - Implement the rural electrification programme by grid extension, development of isolated grids and dissemination of solar photovoltaic systems

4. Increase Operational Efficiency in the Utility Companies and Connect More Customers to the Grid
   - Concession out UEB generation, distribution business and invest in the refurbishment of the distribution network
   - Expand the transmission network

5. Determine the Petroleum Potential of the Country
   - Carry out exploration drilling in Semliki basin
   - Carry out seismic survey of Lake Albert area
   - Acquire more geological and geophysical data in the unlicensed areas
   - Monitor exploration programme of the licences

6. Create a Competitive Petroleum Supply Market in the Country
   - Establish and run a petroleum monitoring system based on the new petroleum act
   - Promote and develop the pipeline extension from Eldoret to Kampala
   - Improve the management and safety of the national strategic reserves
   - Build additional strategic petroleum products reserves

7. Promote the use of Renewable Energy and Energy Efficient Technologies
   - Evaluate renewable energy resources
   - Promote through awareness and capacity building renewable energy and energy efficient technologies

8. Manage Energy Related Environment Impact
   - Monitor the implementation of environmental impact assessement of energy investments (e.g. large hydropower dams, petroleum exploration)
   - Negotiate for benefits accruing out of the Kyoto Protocol

9. Improving Energy Governance and Administration
   - Build capacity of the regulatory agencies; energy department; electricity regulatory authority; electricity tribunal; department of petroleum supplies; petroleum exploration and production DPT, atomic energy council.
   - Establish a regulatory framework on atomic energy/ionizing radiation.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The 1995 constitution of the Republic of Uganda provides the mandate to establish an appropriate energy policy when it states: "The state shall promote and implement energy policies that will ensure that people's basic needs and those of environmental preservation are met." This constitutional requirement makes it incumbent upon Government to formulate an energy policy that will not only sustain the impressive economic growth of the last decade or so, but also ensure widespread access to affordable modern energy services for improving the living standards of all the people of Uganda. This policy document provides Governments vision for increased and improved modern energy supply for sustnable economic development as well as improving the quality of life of the Ugandan population. To translate it into reality, an indicative short and medium plan has been developed and appended. Enormous resources will be required to implement this action plan. It is, therefore, now incumbent upon all those Government agencies that have a stake in this matter to work togethor to realize this vision.

Source: *Ministry of Energy and Mineral Development (MEMD), 2002. The Energy Policy for Uganda, MEMD, Kampala*

e) Kenya

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: Draft National Energy Policy</td></tr>
<tr><td>Country:

Kenya</td><td>Commencement Year (Formulated):

1987</td><td>Year Published (Finalized):

2004</td><td>Total number of pages:

72</td><td>Ministry responsible:

Ministry of Energy</td><td>Nature of document:

Draft National Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4">The vision of the government for the energy sector will be for every Kenyan to enjoy and derive the comfort of ample energy supplies at all times provided at least cost while protecting the environment.</td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">The broad energy policy objective is “to ensure adequate, cost effective and affordable supply of energy to meet development needs, while protecting and conserving the environment. The specific policy objectives as indicated in the energy policy are to:

• Provide sustainable energy services for development

• Utilize energy as tool to accelerate economic empowerment for urban and rural development

• Improve access to affordable energy services

• Provide and enabling environment for the provision of energy services

• Enhance security of supply

• Promote development of indigenous energy resources
• Promote energy efficiency and conservation as well as prudent environmental, health and safety practices</td></tr>
</table>

ii) National Energy Priorities

a) Electricity Sub-Sector

- Provide sustainable energy for socio economic development
- Increase national access and affordability
- Provide an eneabling environment for the provision of energy services
- Promote energy efficiency and conservation

b) Petroleum Sub-Sector

- Provide sustainable energy for socio economic development
- Enhance security of supply
- Provide an enabling environment for the provision of energy services
- Promote energy efficiency and conservation

c) Renewable Sub-Sector

- Increase national access to energy
- Provide energy to accelerate rural development
- Promote development of indigenous energy resources
- Provide sustainable energy for socio economic development
- Provide an eneabling environment for the provision of energy services
- Promote energy efficiency and conservation
- Enhance security of supply

d) Energy and Environment

- Ensure that energy production, conversion, transmission, distribution and utilization do not impact negatively on the environment

e) Energy Efficiency and Conservation

- Promote energy efficiency and conservation
- Ensuring disaster preparedness and management in energy sector.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The overall national development objectives of the Government of Kenya are accelerated economic growth and the rising productivity of all sectors, equitable distribution of national income, alleviation of poverty through provision of basic needs, enhanced agricultural production, industrialization, accelerated employment creation and improved rural-urban balance. The extent to which these objectives can be realized on a sustainable basis and in an environmentally sound manner is dependent on the degree of economic efficiency with which crucial factors of production are made available and combined with each other optimally to produce desired results. The realization of these objectives is only feasible if quality energy services are made available in a sustainable, cost effective and affordable manner to all sectors of the economy. The need for an integrated national energy policy cannot therefore be gainsaid. This energy sessional paper therefore sets out the national policies and strategies for Kenya's energy sector in the short to long term.

Source: *Ministry of Energy (MoE), 2004. Draft National Energy Policy. MoE, Nairobi*

f) Rwanda

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: Energy Policy for Rwanda					
Country: Rwanda	**Commencement Year (Formulated):** N/A	**Year Published (Finalized):** 2004	**Total number of pages:** 40	**Ministry responsible:** Ministry of Infrastructure	**Nature of document:** Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please provide:	The vision of the energy sector is to effectively contribute to the growth of the national economy and thereby improve the standard of living for the entire nation in a sustainable and environmentally sound manner.				
Is the mission of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please provide	The mission of the energy sector is to create conditions for the provision of safe, reliable, efficient, cost-effective and environmentally appropriate energy services to all sectors on a sustainable basis.				
Are the objectives of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please state/list:	The national policy objectives are to ensure availability of reliable and affordable energy supplies and their use in a rational and sustainable manner in order to support national development goals. The Rwandan national energy policy therefore, aims to establish an efficient energy production, procurement, transportation, distribution and end-use systems in an environmentally sound and sustainable manner.				

N/A – Information not Available

ii) National Energy Priorities

The short and medium term priority policy actions for Rwanda include;

- Increase the energy supply
- Improve access to energy
- Rational use of energy resources
- Promote rural access to affordable/sustainable energy
- Improve energy sector governance/management

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* Since 1994, the energy sector as well as the overall economy has gone through structural modifications, where the role of the Government has changed, markets have been liberalised and private sector initiatives encouraged. Hence, the energy policy document has to take into account structural changes in the economy and political transformations at national and international levels. The national policy objective for the development of the energy sector is to provide an input in the development process by establishing an efficient energy production, procurement, transportation, distribution, and end-user systems in an environmentally sound manner. The Energy Policy has, therefore, to focus on market mechanisms and means to reach the objective, and achieve an efficient energy sector with a balance between national and commercial interests. An interactive and participatory process between Government, other stakeholders and relevant groups has been necessary as part of the formulation process in order to incorporate views of market actors and energy consumers to address the complex nature of the sector. Specifically, the energy policy takes into consideration the need to: (a) Have affordable and reliable energy supplies country wide; (b) Reform the market for energy services and establishes an adequate institutional framework, which facilitates investment, expansion of services, efficient pricing mechanisms and other financial incentives; (c) Enhance the development and utilisation of indigenous and renewable energy sources and technologies, (d) Adequately take into account environmental considerations for all energy activities, (e) Increase energy efficiency and conservation in all sectors; and (f) Increase energy education and build gender-balanced capacity in energy planning, implementation and monitoring.

Source: *Ministry of Infrastructure (MoI), 2004. Energy Policy for Rwanda. MoI, Kigali*

g) South Africa

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: Draft Energy Efficiency Strategy of the Republic of South Africa</td></tr>
<tr><td>Country:

South Africa</td><td>Commencement Year (Formulated):

1994</td><td>Year Published (Finalized):

2004</td><td>Total number of pages:

44</td><td>Ministry responsible:

Department of Minerals and Energy</td><td>Nature of document:

Draft Energy Efficiency Strategy</td></tr>
<tr><td colspan="5">Is the vision of the energy energy efficiency strategy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4">To encourage sustainable energy sector development and energy use through efficient practices thereby Minimising the undesirable impacts of energy usage upon health and the environment, and Contributing towards secure and affordable energy for all.</td></tr>
<tr><td colspan="5">Is the mission of the energy energy efficiency strategy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy efficiency strategy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">The following is a summary of the policy objectives stated in the draft energy efficiency strategy:
• Social Sustainability
• Environmental Sustainability
• Economic Sustainability</td></tr>
</table>

ii) National Energy Priorities

1. Improve the health of the nation

Energy efficiency reduces the atmospheric emission of harmful substances such as oxides of Sulphur, oxides of Nitrogen, and smoke. Such substances are known to have an adverse effect on health and are frequently a primary cause of common respiratory ailments.

2. Job creation

Studies show that jobs will be created by the spin-off effects of energy efficiency implementation. Improvements in commercial economic performance, and uplifting the energy efficiency sector itself, will inevitably lead to nationwide employment opportunities.

3. Alleviate energy poverty

Energy efficient homes not only improve occupant health and wellbeing, but also enable the adequate provision of energy services to the community at an affordable cost.

4. Reduce environmental pollution

Energy efficiency will reduce the local environmental impacts of its production and use. These impacts include the atmospheric emission of harmful and odorous gases.

5. Reduce CO2 emissions

Energy efficiency is one of the most cost-effective methods of reducing Greenhouse Gas emissions, and thereby combating Climate Change. Addressing Climate Change opens the door to utilising novel financing mechanisms, such as the CDM, to reduce CO2 emissions.

6. Improve industrial competitiveness

It has been demonstrated that one of the most cost-effective ways of maximizing commercial profitability is the adoption of appropriate energy efficiency measures. Nationwide, this will improve South Africa's export performance and improve the value that her economy derives from indigenous energy resources.

7. Enhance Energy Security

Energy conservation will reduce the necessary volume of imported primary energy sources, crude oil in particular. This will enhance the robustness of South Africa's energy security and will increase the country's resilience against external energy supply disruptions and price fluctuations.

8. Defer the necessity for additional power generation capacity

It is estimated that the country's existing power generation capacity will be insufficient to meet the rising national maximum demand by 2007-2012. Energy efficiency is integral to Eskom's Demand Side Management programme insofar as it contributes 34% towards the 2015 demand reduction target of 7.3GW.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	This is the first Energy Efficiency Strategy for South Africa. It is the first consolidated Governmental document geared towards the development and implementation of energy efficiency practices in this country. The Strategy takes its mandate from the *White Paper on Energy Policy*, published in 1998, and links energy sector development with national socio-economic development plans. In addition, it provides clear and practical guidelines for the implementation of efficient practices within our economy, including the setting of governance structures for activity development, promotion and coordination. This Strategy allows for the immediate implementation of low-cost and no-cost interventions, as well as those higher-cost measures with short payback periods. These will be followed by medium-term and longer-term investment opportunities in energy efficiency. The Strategy acknowledges that there exists significant potential for energy efficiency improvements across all sectors of our national economy. The vision of the Strategy is to contribute towards affordable energy for all, and to minimize the effects of energy usage upon human health and the environment. This will be achieved by encouraging sustainable energy development and energy use through efficient practices. The three cornerstones of sustainable development are embraced within the strategic goals of this document, these being environmental, social and economic sustainability. The Strategy sets a national target for energy efficiency improvement of 12% by 2014. This target is expressed in relation to the forecast national energy demand at that time, and therefore allows for current expectations of economic growth. It is accepted that this target will be challenging, but at the same time it is considered to be readily achievable through the means described within the following pages. Energy efficiency improvements will be achieved largely via enabling instruments and interventions. These will include *inter alia* economic and legislative means, efficiency labels and performance standards, energy management activities and energy audits, as well as the promotion of efficient practices. The Strategy will cover all energy-using sectors and will be implemented through Sectoral Implementation Plans as outlined within. Systems will be put into place in order to periodically monitor progress against the target that will be reviewed at the end of each phase

Source: *Department of Minerals and Energy (DME), 2004. Draft Energy Efficiency Strategy of the Republic of South Africa. DME, Pretoria*

h) South Africa

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: White Paper on the Energy Policy of the Republic of South Africa</td></tr>
<tr><td>Country:

South Africa</td><td>Commencement Year (Formulated):

1995</td><td>Year Published (Finalized):

1998</td><td>Total number of pages:

110</td><td>Ministry responsible:

Department of Minerals and Energy</td><td>Nature of document:

White Paper on Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the white paper on energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide:</td><td colspan="5"></td></tr>
<tr><td colspan="5">Is the mission of the white paper on energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide</td><td colspan="5"></td></tr>
<tr><td colspan="5">Are the objectives of the white paper on energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td>If yes, please state/list:</td><td colspan="5">The following is a summary of the policy objectives stated in the policy document:
Increasing access to affordable energy services
Improving energy governance
Stimulating economic development
Managing energy-related environmental and health effects
Securing supply through diversity</td></tr>
</table>

ii) National Energy Priorities

The following subsections highlight the short-term and medium term energy policy priorities:

a) Short-term policy priorities

In the short-term, government will concentrate on the following priorities

Objective 1 - Increasing access to affordable energy services

- Improve the delivery of household energy services, including electrification
- Develop a national electrification policy, planning and financing system

- Treat off-grid electrification in the same way as grid electrification
- Facilitate the production and management of woodlands for rural households
- Establish voluntary guidelines for the thermal performance of low income dwellings

Objective 2 - Improving energy governance

- Improve government's capacity to govern
- Improve energy policy formulation processes
- Restructure the Department of Minerals and Energy's budget to reflect the new policy priorities
- Promulgate a new regulatory bill to consolidate the electricity regulatory regime
- Maintain the liquid fuel regulatory system until a re-regulated system, based on competition, has been planned and implemented
- Establish suitable energy information, statistical and database systems

Objective 3 - Stimulating economic development

- Encourage energy sector actors to facilitate economic empowerment, through the creation of SMMEs and by assisting previously disadvantaged people to gain entry to the energy sector
- Appoint an authority to oversee the restructuring of the electricity distribution industry
- Restructure the state's other energy assets
- Develop and implement strategies to remove energy trade barriers, improve the availability of information and facilitate investment in the energy sector
- Introduce special purpose levies to fund dedicated regulatory and energy development agencies in a transparent manner

Objective 4 - Managing energy-related environmental impacts

- Improve residential air quality
- Monitor the effect of electrification on the number and severity of fires caused by candles and paraffin
- Introduce safety standards for paraffin stoves
- Follow a no-regrets approach on energy-environment decisions

- *Objective 5 - Securing supply through diversity*
- Develop the Southern African Power Pool to the mutual benefit of all of its members
- Actively pursue energy sector co-operation with appropriate countries and international bodies
- Stimulate energy research and development partnerships between local role players and international agencies
- Actively facilitate regional co-operation on energy matters

b) Medium-term policy priorities

In the medium-term government will concentrate on the following policy priorities

Objective 1 - Increasing access to affordable energy services

- Stimulate the development of new and renewable sources of energy
- Promote improved combustion techniques and appliances for fuelwood and other traditional fuels
- Support the development and implementation of capacity building, education and information dissemination programmes

Objective 2 - Improving energy governance

- Facilitate the development of a research strategy to improve energy research and development
- Develop and implement an appropriate system to co-ordinate energy research
- Restructure state energy assets
- Implement new regulatory arrangements within the nuclear sector
- Clarify the mandate and role of the various nuclear energy bodies, including the separation of governance and implementation functions, by means of appropriate legislation
- Establish suitable renewable energy information, statistical and database systems
- Create appropriate institutional capacity to implement energy efficiency programmes

Objective 3 - Stimulating economic development

- Adjust electricity market structures to achieve effective forms of competition
- Establish regulations which promote a cost-of-supply approach to electricity pricing for non-domestic consumers
- Re-regulate the liquid fuels industry to achieve higher levels of competition and unrestricted market access
- Promote energy efficiency in all sectors of the economy
- Establish the necessary legislative and regulatory arrangements for the development of the up and downstream natural gas industry
- Develop standards and codes of practice for the correct use of renewable energy systems
- Introduce a voluntary energy appliance labelling programme

Objective 4 - Managing energy-related environmental impacts

- Develop a policy on nuclear waste management
- Facilitate the monitoring, evaluation and demonstration of clean energy technologies
- Investigate options for the use of coal discards
- Monitor international developments and participate in negotiations on response strategies to global climate change

- Investigate an environmental levy on energy sales to fund the development of renewable energy, energy efficiency and sustainable energy activities

Objective 5 - Securing supply through diversity

- Utilise integrated resource planning methodologies to evaluate future energy supply options
- Reappraise coal resources and support the introduction of other primary energy carriers as appropriate

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	The South African government last published a white paper on energy policy in 1986. With the end of apartheid South Africa experienced fundamental shifts resulting in significant changes in the energy policy context. The election of a new government necessitated a review of existing policy. In response to democratisation, a number of negotiating processes began spontaneously within the energy sector, usually in stakeholder-based forums such as the Liquid Fuels Industry Task Force and the National Electrification Forum. Government's wish to integrate these and provide policy stability led to it formally launching the energy policy white paper process in 1994. The general approach to policy formulation has also changed and places greater emphasis on transparency, inclusiveness and accountability. The energy white paper process has therefore attempted to make government's approach more *transparent*; to build public *confidence*; to *clarify* organisational roles; to *communicate* policy effectively; and to *integrate* policy processes. The process commenced with the drafting of an Energy Policy Discussion Document by a multi-disciplinary team of experts. It described the energy sector and identified 111 major energy policy issues. Informally known as the 'Green Paper', it was released by the Minister of Mineral and Energy Affairs in August 1995 for analysis and comment. Formal and informal workshops were then held with interested parties. In August 1995, a team of expert 'issue rapporteurs' was appointed to draw up the first draft white paper. Their contributions were then edited for review by an editorial committee. The Draft White Paper was revised during 1997/98 in the Department and Cabinet approved its release in July 1998. The general approach to policy formulation is to recognise problems; to identify causes and solutions; to analyse their implications and make choices; and to implement, monitor and evaluate the effects of policy. In his historic, budget speech in Parliament on 21st May 1997, the Minister of Minerals and Energy, Dr P M Maduna, set forth a new vision for energy, especially for the liquid fuels industry. He identified the opportunity which exists to restructure and consolidate the state's assets in the industry, whilst achieving maximum value for them. Such restructuring was to be informed, *inter alia*, by the need to redress economic

	and social power imbalances. Emphasis was also placed on the pursuit of cooperation among African countries and the need for a Pan-African energy strategy. This speech has helped to illuminate South Africa's policy challenges. Broadly speaking the energy sector can be viewed from demand and supply perspectives. The South African energy sector has historically tended to promote policies, which predominantly address supply side issues. In South Africa the demand side is generally analysed in terms of the energy requirements of households, industry, commerce, mining, transport and agriculture. Supply sub-sectors include the coal, electricity, nuclear, liquid fuels, gas and renewables industries. From a policy perspective, social problems can arise in both demand and supply sub-sectors. Identifying the causes of these problems can be difficult. Causal linkages may extend beyond the energy sector. Energy policies must, therefore, be carefully co-ordinated with other social sectors and also be co-ordinated between energy sub-sectors. To cope with multiple causal linkages, energy policy analysis usually commences with the demand side by means of the process entitled-'integrated energy planning'. This recognizes that energy is not an end-good but is rather consumed as a means to an end. Policy must facilitate optimal energy consumption and production to meet social needs. This requires consumer choice and the operation of market forces. Integrated energy planning suffers from the same drawbacks as other ideal models. It requires a great deal of data and analysis to implement, of which South Africa has a scarcity. Nonetheless, this white paper identifies integrated energy planning as the most suitable base for planning purposes and also addresses the issue of data scarcity. The logical components dealt with in each demand, supply and cross cutting section are: a *background* to the sector; the key policy *challenges*; government's proposed *policies* with *motivations* where necessary; *implementation*; and *monitoring* and *evaluation*. Clear policy objectives have been established.

Source: *Department of Minerals and Energy (DME), 1998. White Paper on the Energy Policy of the Republic of South Africa. DME, Pretoria*

i) Zambia

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: Zambia National Energy Policy					
Country: Zambia	**Commencement Year (Formulated):** 1993	**Year Published (Finalized):** 1994	**Total number of pages:** 55	**Ministry responsible:** Ministry of Energy and Water Development	**Nature of document:** National Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please provide:	"To ensure energy contributes to the improvement of the quality of life."				
Is the mission of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide					
Are the objectives of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please state/list:	The Zambia energy policy is aimed at promoting optimum supply and utilization of energy, especially indigenous forms, to facilitate the socio-economic development of the country and maintenance of a safe and healthy environment. This entails establishing a viable institutional structure that will ensure the attainment of these objectives. It is important that the implementation of this policy is properly coordinated and managed.				

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following specific energy strategies may give an indication of the national priority areas. These are based on an updated version of the energy policy.

Zambia has recently developed a 10-year energy policy framework, which is now under review. This energy policy sets up eight goals for energy poverty reduction over the next ten years:

- Increase rural electrification rate from 2-15%
- Increase urban electrification rate from 45-78%
- Reduce charcoal consumption by 400,000 tons
- Introduction of alternative fuels to woodfuel (LPG)
- Maximize benefits from the electricity sub-sector
- Develop potential biofuels
- Increase off-grid renewable energy
- Make energy service delivery a driver for poverty reduction/wealth creation

- This energy policy will be consulted with a wide range of stakeholders, and then submitted to the cabinet

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The advent of the third republic on November 2, 1991 brought in a re-organisation of government administration. One of the important changes made was the creation of the ministry of energy and water development, in line with the movement for multiparty democracy manifesto. The government of zambia recognizes the need for the evolution of an energy policy that would guide developments in the supply and demand of the various energy resources in the country. This has become especially important in view of the changed macro-economic environment in which liberalization and private enterprise have become the norm. Furthermore, the energy sector has for a long time been functioning without explicit policy guidelines. In an effort to develop such a policy the ministry of energy decided to hold a series of workshops at which all stakeholders were invited to discuss each energy source in detail and make relevant policy proposals for government consideration. Altogethor six workshops dealing with coal, electricity, woodfuel, petroleum, renewable energy and energy conservation were synthesized into a consolidation document that was extensively discussed at the final workshop. This document is organized into three main sections. Chapter one provides the background to the energy policy and highlights the role of energy in national development, the current energy resource base and the use patterns in the country. Chapter two contains the main policy measures for each subsector and outlines strategies for implementation. The last chapter presents the institutional and legal reforms required to implement this policy.

Source: *Ministry of Energy and Water Development (MEWD), 1994. National Energy Policy, MEWD, Lusaka*

j) Swaziland

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: National Energy Policy 2002</td></tr>
<tr><td>Country:

Swaziland</td><td>Commencement Year (Formulated):

1999</td><td>Year Published (Finalized):

2002</td><td>Total number of pages:

70</td><td>Ministry responsible:

Ministry of Natural Resources and Energy</td><td>Nature of document:

Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4">The vision of the energy policy is to ensure that the development goals of the country are met through the sustainable supply and use of energy for the benefit of all the citizens of the country.</td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">The key objectives of the Policy are:

• Ensuring access to energy for all

• Enhancing employment creation

• Ensuring security of energy supply

• Stimulating economic growth and development

• Ensuring environmental and health sustainability</td></tr>
</table>

ii) National Energy Priorities

a) Short-term priorities

In the short term the Government will concentrate on the priorities listed below. The activities are those actions and initiatives that the Government will take up in the implementation programme.

1. Ensuring access to energy for all

- Developing a Rural Electrification Master Plan;
- Providing electricity to all schools, clinics and essential public institutions in rural areas and facilitate the reticulation of domestic dwellings;
- Developing a mechanism that will make prices affordable to rural areas;
- Developing effective means of ensuring adequate access to energy services throughout the country, including financing systems;
- Supporting dialogue and co-ordination among agencies and communities involved in rural development;
- Establishing new electricity and regulatory legislation for liberalising the electricity supply industry;
- Consolidating all relevant petroleum legislation into a Petroleum Act;
- Establishing a detailed inventory for mini and micro hydro power sites and the ranking of the sites with the highest potential;
- Developing wood fuel demonstration programmes and information dissemination for sustainable energy use; and
- Developing a conceptual framework on how to use sustainable energy to tackle poverty.

2. Enhancing employment creation

- Facilitating the energisation of rural areas and create SME's to assist locals to gain entry to the energy industry;
- Facilitating the development and implementation of a human and institutional capacity building programme;
- Establishing energy research and development in line with the vision of the National Research Council; and
- Improving the participation of women in energy programmes and activities and greater enrolment in energy related disciplines.

3. Ensuring security of supply

- Investigating the establishment of a coal fired thermal power station for the country;
- Promulgating a regulation from the Fuel Oil Levy Act 1980, that will require the petroleum companies to store a minimum quantity of stocks;
- Developing mechanisms for ensuring diversification of the sources of petroleum products imported into the country;
- Establishing national strategic depots for petroleum products sufficient to sustain the economy for a maximum of 90 days;
- Actively participating in the Southern African Power Pool (SAPP) to benefit from the increased electricity trade in the SADC region; and
- Maintaining co-operation with regional and international bodies dealing with energy.

4. Stimulating economic growth and development

- Improving energy governance and institutional capacity framework to implement the policy;
- Restructuring the Energy Office into an Energy Department;
- Facilitating the removal of barriers to energy trade and investment;
- Establishing an Energy Regulatory Authority (ERA);
- Establishing fully transparent and cost reflective electricity tariffs;
- Liberalising the Electricity Supply Industry and investigate the various commercialisation opportunities for the utility;
- Investigating means of achieving least cost retail prices of LPG and paraffin;
- Conducting a cost-benefit analysis regarding increased use of indigenous coal;
- Establishing infrastructure in the country to encourage developments under the Clean Developments Mechanism (CDM) and other similar arrangements;
- Developing and adopting appropriate quality standards for energy related equipment and activities; and
- Developing an annual energy policy statement targeted at stakeholders, politicians, investors and the general public, to be published by the Minister.

5. Ensuring environmental and health sustainability

- Developing programmes promoting the utilisation of renewable energy resources;
- Establishing a centre for demonstration and education on renewable energy and sustainable energy;
- Encouraging and enhancing where applicable, topics on renewable energy and energy in general in educational and training curricula;
- Encouraging a wider use of solar water heaters in residential and commercial buildings;
- Formulating and implementing programmes on awareness raising and information dissemination on energy savings;
- Developing and implementing quality control measures that will ensure that marketers of oil products adhere to agreed product specifications – including environmental considerations – and that these conform to regional and/or international standards;
- Developing legislation to ensure that all stakeholders in the oil and transport industry manage their waste oil in an environmentally friendly manner; and
- Introducing safety standards for LPG and paraffin equipment.

b) Medium/long term priorities

These priorities are those activities and initiatives that will be implemented in the medium to long term.

1. Ensuring access to energy for all

- Ensuring that there is adequate access to all appropriate forms of energy;
- Developing sustainable financing mechanisms for the extension of the electricity grid throughout the country;
- Maintaining programmes on the manufacturing and utilisation of briquettes to satisfy energy needs;
- Facilitating and promoting the adoption of sustainable energy options in an effort to assist low-income households; and
- Ensuring that energy prices for low-income groups take into consideration affordability to ensure access to energy for all

2. Enhancing employment creation

- Continuing and maintaining the development of energy R&D strategies and programmes;
- Supporting the development and implementation of capacity building in the energy sector; and
- Encouraging the promotion of entrepreneurship in the sector in co-operation with players in the energy sector.

3. Ensuring security of supply

- Investigating the resource potential for coal-bed methane and its use for energy purposes;
- Conducting further research on the coal resources of the country;
- Developing and implementing the blending of ethanol with petrol, with a focus on reducing petroleum imports and improving the environment;
- Establishing a comprehensive study to evaluate the future energy supply options;
- Developing and implementing demand side management; and
- Promoting and taking full advantage of regional co-operation and ensure the development of legal, regulatory and institutional frameworks that are in harmony with regional agreements.

4. Stimulating economic growth and development

- Introducing and encouraging competition within energy markets;
- Encouraging the integration, harmonisation and implementation of the various national policies;
- Facilitating the establishment and accreditation of quality-testing units within the country;
- Establishing regulations for energy management programmes for Government institutions;
- Participating in international energy bodies; and
- Establishing mechanisms to increase investment and to cover political risk insurance;

5. Ensuring environmental and health sustainability

- Reviewing and updating the Renewable Energy Action Plan every five years;
- Encouraging the use of clean coal technologies;
- Encouraging development of an energy appliance labelling programme;
- Promoting programmes supporting sustainable wood fuel use;
- Promoting efficient and environmentally sound technologies for utilisation of indigenous resources for electricity production;
- Encouraging the production of charcoal for the household cooking market where it can be clearly shown that it will be environmentally sustainable;
- Establishing efficiency standards for charcoal kilns;
- Conducting a study to identify harmful emissions from all sub- sectors in the energy sector;
- Monitoring and assessing the appropriateness of present legislation to ensure the health and safety of the population; and
- Phasing out leaded petrol and high sulphur diesel.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The energy sector has been undergoing rapid transformation in recent years at a global, regional and national level. These changes have included market reforms and the introduction of appropriate regulation. Governments have been withdrawing from directly managing markets and their role has progressively moved towards setting up sound rules which are administered by impartial regulators. There has also been a progressive movement towards pricing energy to reflect the true costs of supply. Consequently, in many cases this has resulted in higher energy prices, which have in turn stimulated greater efficiency of energy supply and use. However, there is also strong emphasis towards ensuring access and affordability of energy services to all of the population. The major task for the Government of Swaziland therefore is to achieve a balance between its economic and social responsibilities. Within the Southern African Development Community (SADC) region, the energy sector reform process has been moving at a fast pace during the last five years. The prime objectives have been to increase efficiency and attract and facilitate participation by private investors and financiers. In 1996, the SADC Heads of States approved the SADC Energy Protocol. The main objective of the Energy Protocol is

	to promote the harmonious development of the regions' national energy policies and matters of common interest for the balanced and equitable development of the regional energy resources. During recent years the Kingdom of Swaziland has made major efforts to formulate and reach consensus regarding overall national development policies and action plans. These have culminated in the National Development Strategy (NDS), which embodies the long-term vision for the development of Swaziland. The overall vision set out in the NDS is that "By the year 2022, the Kingdom of Swaziland will be in the top 10% of the medium human development group of countries founded on sustainable economic development, social justice and political stability". Underlying the vision in the NDS is the focus on the quality of life in the country. The critical dimensions of the quality of life are poverty eradication, employment creation, gender equity, social integration and environmental protection. These are, in turn, crucially linked to education, health and other aspects of human resource development. When translated to energy policy development, the vision infers that the energy policy should therefore also strive to promote sustainable economic development, social justice and political stability, by supporting poverty eradication, employment creation, gender equity, social integration and environmental protection. An energy policy needs to be based on the overall development policies and in particular policies with relevance to the energy sector, such as public-private partnerships, environment, business promotion, privatisation, etc.

Source: *Ministry of Energy (MoE), 2002. The National Energy Policy 2002.* *http://www.ecs.co.sz/energy/.htm*

k) Eritrea

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: Energy Policies and Strategies					
Country: Eritrea	**Commencement Year (Formulated):** N/A	**Year Published (Finalized):** 1997	**Total number of pages:** 10	**Ministry responsible:** Ministry of Energy and Mines	**Nature of document:** Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide:					
Is the mission of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide					
Are the objectives of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please state/list:	The key objectives of the energy policy are: • To facilitate economic growth through the provision of adequate, reliable and sustainable refined energy at an economic price, and at appropriate location • To improve the living standards of the population through the provision of affordable energy				

N/A – Information not Available

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following summary may give an indication of the National Energy priorities:

- To provide an efficient, economic, reliable and sustainable supply of affordable energy throughout Eritrea, with due regard to the preservation and improvement of the environment.
- The energy supply industry should, in total, be financially self sufficient with each consumer paying the economic price for the energy products. Cross subsidies should be transparent and kept to a minimum, only being considered when known to complement Eritrea's social policy
- Private investment in the development of indigenous fossil fuel sources and in the energy supply market should be promoted, with developers, producers and operators being encouraged to run efficiently, whils being regulated so as not to make excessive profits. However, the electricity transmission and distribution networks will remain in public ownership for the foreseeable future.

- To exploit the potential of renewable energy sources when the development is economic or when it complements the Government's social policy
- Major capital investments in the energy supply industry should be sensitive to the current and future economic development of any indigenous source of fuel and energy
- To develop human resources by the appropriate education and training of staff to the level necessary to sustain an efficient energy industry

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The efficient, reliable and sustainable production and supply of affordable energy throughout Eritrea is the primary objective of the Government's policy in the energy sector o both grounds of economics and social development. This policy incorporates the management of energy utilization and promotional and regulatory activities of energy conservation. To achieve this goal, the Ministry of Energy and Mines is enthrusted with the task of designing and refining policies, strategies and regulatory issues in the energy sector, approving the corresponding plans and programmes formulated in the sector and supervising their implementation. This document aims at refining and updating the policies and strategies that were in operation for the last three years.

Source: *Ministry of Energy and Mines (MEM), 1997. Energy Policies and Strategies. MEM, Eritrea.*

l) Zimbabwe

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: Draft National Energy Policy					
Country: Zimbabwe	**Commencement Year (Formulated):** N/A	**Year Published (Finalized):** N/A	**Total number of pages:** 17	**Ministry responsible:** Ministry of Energy and Power Development	**Nature of document:** Draft Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide:					
Is the mission of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide					
Are the objectives of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please state/list:	The key objectives of the Policy are: • To ensure accelerated economic development • To facilitate rural development • To promote small-medium scale enterprises • To ensure environmentally friendly energy development • To ensure efficient utilization of energy resources				

N/A – Information not Available

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following energy strategies may give an indication of the National Energy priorities:

- Limiting energy demand to the extent consistent with maintaining growth through pricing based on economic costs and more efficient use of energy
- Choosing an appropriate level of reliability of supply
- Exploiting regional co-operation opportunities to reduce supply cost, subject to political consideration
- Enhancing rural development through provision of adequate forms of energy
- Intergrated energy planning
- Balanced energy management

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* The energy sector in Zimbabwe accounts for 8-9% of GDP and public revenue, mainly from excise duties on liquid fuels, but it contributes only 1% to formal employment. More significant is its share in aggregate investment, foreign borrowing, and debt. Investment in the electricity and fuels sectors during 1996 – 1998 totalled around Z$700 million. The energy sector is capital and foreign exchange intensive and its requirements, petroleum products need to be imported in their entirety at a cost of about US $ 3.5 billion in 1997, and US $4 billion in 1998. Most of the investments have been financed through debt rather than retained earnings as net financial savings in the public sector are generally negative. The basic issue is that the Government's energy policy, and subsequent strategies, are consistent with the overall objective of enhancing the efficiency and resilience of the economy through supplying energy reliably and at least cost. Since security of supply is not synonymous with self sufficiency, it becomes important to assess energy projects in terms of their impact on supply reliability rather than their physical location.

Source: *Ministry of Energy and Power Development (MEPD). Draft National Energy Policy. MEPD, Harare*

m) Namibia

The table below lists general information on the white paper on energy policy

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: White Paper on the Energy Policy for Namibia</td></tr>
<tr><td>Country:

Namibia</td><td>Commencement Year (Formulated):

Not indicated</td><td>Year Published (Finalized):

1988</td><td>Total number of pages:

73</td><td>Ministry responsible:

Ministry of Mines and Energy</td><td>Nature of document:

White Paper on Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide:</td><td colspan="5"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide</td><td colspan="5"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td>If yes, please state/list:</td><td colspan="5">The following goals, presented in no particular order, serve as a framework for the energy policies in this white paper:

• Effective energy sector governance
Effective governance systems will be in place to provide stable policy, legislative and regulatory frameworks for the energy sector

• Security of supply
Namibia will achieve security of energy supply through an appropriate diversity of economically competitive and reliable sources, with emphasis on the development of Namibian resources.

• Social upliftment
Households and communities will have access to appropriate, affordable energy supplies

• Investment and growth
The Namibian energy sector will expand through local and foreign fixed investment, resulting in economic benefits for the country. Particular attention will be given to black economic empowerment</td></tr>
</table>

	• **Economic competitiveness and efficiency** The energy sector will be economically efficient and will contribute to Namibia's economic competiveness • **Sustainability** The Namibian energy sector will move towards the sustainable use of natural resources for energy production and consumption. Government recognizes that in certain contexts some of these goals may be contradictory, and that certain trade offs therefore may therefore have to be agreed to in terms of policy implementation. The detailed policies following for the various supply, demand and cross cutting sectors represent govrnment's current thinking on the best means to achieve these goals and overcome any contradictions.

N/A – Information not Available

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following energy policy goals may give an indication of the National Energy priorities:

- Effective energy sector governance
- Security of supply
- Social upliftment
- Investment and growth
- Economic competitiveness and efficiency
- Sustainability

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	This White Paper embodies a new, comprehensive energy policy aimed at achieving security of supply, social upliftment, effective governance, investment and growth, economic competitiveness, economic efficiency and sustainability. Policies will affect energy demand (mainly households), supply (electricity, upstream oil and gas, downstream liquid fuels, downstream gas, and renewable energy) and a number of cross-cutting issues (economic empowerment, environment, energy efficiency and regional energy trade and co-operation). Government is committed to ensuring that energy demand by the productive sectors of the economy continues to be met through reliable competitively-priced energy. Special attention is given in the White Paper to those demand sectors which have been neglected historically, namely, poor urban and rural households. Policies proposed for these households include those for widening access to electricity as well as other commercial fuels. Generally, not enough is known about the problems and needs in this sector so national studies will be initiated as a basis for future policy development, including the pressing issue of sustainable biomass usage in rural areas and the role of women. Rural energy policies will also be integrated with development initiatives in other ministries. Government has embarked on the reform of the electricity sector and a study has been commissioned to look at possible rationalization and restructuring, as well as competition and ownership changes. At the same time, an Electricity Act is being drafted which will put in place an electricity regulator to govern the industry. Tariffs and electrification targets will be governed through a licensing system. The creation of a rural electrification fund is also proposed. New investment in the sector will be encouraged through appropriate regulatory, fiscal and environmental frameworks, harmonized with those in SADC countries. The legislative framework governing upstream oil and gas is well developed, and the White Paper merely clarifies an accepted policy framework which seeks to optimize possible national benefits while achieving the necessary balance of interests to attract investment. The policy identifies the different roles and functions of industry participants, and lays out the basic legal and fiscal criteria. Namibia does not yet, but soon will, have a downstream gas sector.

	The key challenge is to create a policy and legislative framework which attracts initial investment into the sector, while maintaining options for competition in the future and the fair distribution of economic rents. A new Gas Act is proposed, but it is thought premature to install a Gas Regulator. Licensing requirements will include the need for separate accounting for the different operations of gas production, transmission, distribution and marketing, allowance for third party access, and the application of fair and reasonable tariffs. The downstream liquid fuels sector will be subject to controlled and phased deregulation with regard to price setting, subject to competitive behaviour being evident. Government will, however, require obligations in terms of diversified imports, international product specifications, strategic stocks, third party lease access to uncommitted infrastructure, security of forecourt jobs, health and safety, and adequate rural service in terms of access and pricing. Government will promote the use of renewable energy through the establishment of an adequate institutional and planning framework, the development of human resources and public awareness and suitable financing systems. It also seeks to meet development challenges through improved access to renewable energy sources, particularly in rural electrification, rural water supply and solar housing and water heating. The energy policy goal of sustainability will further be promoted through a requirement for environmental impact assessments and project evaluation methodologies which incorporate environmental externalities. Energy efficiency will be promoted through policies on better information collection and dissemination, and particularly with respect to energy efficiency and conservation practices in households, buildings, transport and industry. The White Paper reaffirms Namibia's commitment to constructive engagement in SADC and SAPP in order to maximize economic benefits. Security of supply will be achieved through an appropriate diversification of economically competitive and reliable sources, but with particular emphasis on Namibian resources. Finally, the Ministry of Mines and Energy is mindful that the effective implementation of these policies is dependent on the creation of adequate institutional and human resource capacity. Policies have been proposed in each sector to address this issue.

Source: *Ministry of Mines and Energy (MME), 1998. White Paper on Energy Policy. MME, Windhoek.*

n) Malawi

The table below lists general information provided in the white paper on energy policy

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: White Paper on Energy Policy for Malawi</td></tr>
<tr><td>Country:

Malawi</td><td>Commencement Year (Formulated):

Not indicated</td><td>Year Published (Finalized):

2001</td><td>Total number of pages:

50</td><td>Ministry responsible:

Ministry of Natural Resources and Environmental Affairs</td><td>Nature of document:

White Paper on Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide:</td><td colspan="5"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide</td><td colspan="5"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td>If yes, please state/list:</td><td colspan="5">The overall policy goal of the energy policy is “To promote Malawi’s socio-economic development and contribute to poverty reduction through sustainable provision of equitable, efficient and affordable energy services.” Specific policy objectives are:

• Create an enabling environment for investment, private enterprise competition and operational efficiency with minimum adverse effects on health and environment

• Promote and support training and research development

• Increase access to and efficient use of affordable modern fuels to all Malawians in rural, peri urban and urban areas

• Expand and revitalize the power sector to make it effective and efficient so that it becomes financially viable, and able to provide affordable and reliable power supply

• Promote efficient use of biomass energy and sustainable utilization of the biomass resources.</td></tr>
</table>

	• Promote widespread efficient use of suitable and affordable new and renewable energy among rural, peri-urban and urban population • Expand utilization of coal as an alternative fuel to biomass at different levels of economic activity including the household level, taking into account environmental concerns • Promote coordination on energy issues among relevant stakeholders including other departments/ministries, NGOs, the private sector and local communities in the provision of efficient and affordable energy services • Promote cooperation with other governments and related international and regional organizations on energy matters

ii) National Energy Priorities

Since there are no explicit national priorities provided in the energy policy document, the following summary may give an indication of the National Energy priorities:

1. Social Upliftment

- Households and communities will have access to appropriate affordable energy supplies that will contribute to the improvement of their standards of living and quality of life.

2. Poverty Reduction

- The energy sector will contribute to poverty reduction through increased economic activities, increased employment opportunities and improved social services

3. Efficiency and Economic Competiveness

- The energy sector will expand through local and foreign investment, resulting in economic benefits for the country

4. Investment and Growth

- The energy sector will expand through local and foreign investment, resulting in economic benefits for the country

5. Security of Supply

- Malawi will achieve security of energy supply through diversification into economically competitive and reliable sources and trading with neighbouring and other countries

6. Capacity Building and Research and Development

- Stakeholders in the energy sector will be strengthened through promotion and support of training and research and development

7. Regulation

- Legislative and regulatory frameworks for the energy sector will be in place and an effective and independent sector wide regulator will be established

8. Coordination

- Mechanisms will be in place to ensure internal coordination on energy issues among relevant stakeholders including government, private sector, NGOs and local communities

9. Regional and International Cooperation

- Malawi will take cognizance of obligations in regional and international agreements she is a signatory to.

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the document's introduction that serves as a suitable summary:* Developments in the energy sector have an important bearing on the success of development initiatives in any economy. Energy is a crucial input into any industrial processing and services as the life blood for modern transport systems, be it road, water, rail or air services. Countries that have made greatest strides in their development efforts are also the ones that use the greatest quantity of energy resources per capita. The structure of the energy sector also dictates the development path of a country can possibly take. Countries that depend on modern energy sources are associated with energy intensive manufacturing industries, whereas those that depend on traditional fuels are linked to low energy intensive primary commodity based economies, specializing in the export of a few unprocessed agricultural products and minerals. These positive attributes notwithstanding, the full potential of the

	energy sector in Malawi remains far from being realized owing to a number of structural, operational and institutional challenges. Malawi never had an intergrated energy policy since independence. Energy policy statements do exist, but these are scattered in various government memoranda and reports. Moreover, although linkages exist among the various energy subsectors of biomass, electricity, coal, petroleum and other renewables, existing policies and strategies focus on addressing specific sub sector issues. Secondly, although some structural problems affecting the energy sector still prevail, some of the strategies promulgated from the existing policies are largely redundant. The absence of an intergrated policy has contributed to inefficiencies, resource wastage through duplication and unplanned investment, institutional fragmentation and conflicts. The Ministry of Natural Resources and Environmental Affairs through the Department of Energy Affairs formulated an integrated Malawi Energy Policy in an attempt to minimize these constraints. The energy policy is intended to provide an operational framework for the energy sector as well as guidelines on issues related to energy development, supply, consumption, distribution and pricing. The government expects the policy to reform the energy sector into a robust and efficient sector that adequately supports the national socio economic agenda of the country. The government also expects that the energy policy will result into a more liberalized, private sector driven energy sector where pricing will reflect the competition and efficiency that will be developed.

Source: *Ministry of Natural Resources and Environmental Affairs (MNREA), 2001. White Paper on Energy Policy for Malawi. MNREA, Lilongwe*

o) Lesotho

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: A Speech on the Energy Policy of the Government of Lesotho by the Honourable Minister M. Moleleki</td></tr>
<tr><td>Country:

Lesotho</td><td>Commencement Year (Formulated):

N/A</td><td>Year Published (Finalized):

2001</td><td>Total number of pages:

N/A</td><td>Ministry responsible:

Ministry of Natural Resources</td><td>Nature of document:

Ministerial Speech</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4">To supply energy to all sectors of the economy throughout the country with minimum economic cost.</td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">This is not an energy policy document. The assessement is derived from a speech on the Lesotho Energy Policy that was presented by the Minister for Natural Resources, Honourable Minister M. Moleleki, durng the launch of the Lesotho Utilities Project.

The key policy objectives that can be derived from the minister’s speech are:

• To contribute towards the improvement of livelihoods.

• To contribute towards the protection of the environment.

• To contribute towards economic growth and investment.

• To ensure access to basic energy technologies and services.</td></tr>
</table>

N/A – Information not Available

ii) National Energy Priorities

The following summary of the energy policy extracted from the ministerial speech gives an indication of the national priority areas of Lesotho:

- Government will ensure that the power sector is operated by commercially viable entities and that the performance of these entities conforms to the codes of practice stipulated in the prevailing regulatory framework.

- Government will ensure that more urban and rural households have access to affordable and reliable electricity services without putting a financial burden on the utilities

- Government will ensure that consumers pay a service connection charge based on the expected average costs of connecting new customers to the network. The expected average cost will be based on the expected future density of customers in the area. The standard charges should depend on the voltage level, the size of the demand sector, and should be affordable.

- Government will ensure that electricity tariffs structures and prices are based on sound economic principles and will make these affordable for basic household energy needs.

- Government will initiate appropriate institutional reforms and create an enabling environment for private sector participation in order to increase efficiency in the sector

- Government commits itself to ensuring full participation of local communities in the design, planning and implementation of electrification programmes.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the speech's introduction that serves as a suitable summary:* Energy is an essential input to economic development of any society. In order to alleviate poverty, energy in one form or another has to be expended for income generating activities. However, this resource, like all others, is not always in abudance. In general, not all kinds of energy sources are available to any given country. Lesotho does not have reserves for petroleum fuels, and coal. Therefore, it relies entirely on imports, especially from South Africa. Electricity has also been imported from South Africa until 1998 when the hydropower station at Muela started operating.

	Given that energy is a critical input to poverty reduction and economic development, and at the same time a scarce resource, its supply and utilization has to be managed effectively and efficiently in a sustainable manner. For this condition to be satisfied, a conducive environment has to be created through policy instruments.

Source *Kingdom of Lesotho, Undated. Launch of the Lesotho Utilities Project: Remarks by Minister of Natural Resources. www.lesotho.gov.Is/articles/Speech*

p) Botswana

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: Botswana Energy Masterplan – Energy Policy for Botswana</td></tr>
<tr><td>Country:

Botswana</td><td>Commencement Year (Formulated):

1985</td><td>Year Published (Finalized):

1996</td><td>Total number of pages:
131</td><td>Ministry responsible:

Ministry of Mineral Resources and Water Affairs Energy Affairs Division</td><td>Nature of document:

Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">The key objectives outlined under each of the national objectives include:

Economic Efficiency:
• Supply of energy services at least cost to the economy
• Provide energy users (and potential users) with access to appropriate energy services
• Efficient use of energy
• Financial stability of the energy supply industry

Social Equity:
• Access to adequate and affordable energy services for all households and community services

Environmental Quality and Sustainability:
• Energy extraction, production, transport and use without damage the environment of people’s health and safety</td></tr>
</table>

	• In the long term, sustainable energy use *Security:* • Security of access to energy for all users

ii) National Energy Priorities

1. Electricity:

- Achieve an explicit balance between the following factors:
  a. Cost-benefit of imported power
  b. Price implications on the Botswana economy of the high electricity prices caused by costs of local generation
  c. Risks of exposure to imported electricity
  d. Other risks of exposure to imported power

- Systematically connect all households and government institutions that can afford a supply or for whom adequate government funding to connect is available

- Optimise Botswana Power Cooperation rate of return on re-valued assets

- Monitor Botswana Power Cooperation efficiencies and maintain interactions between government and the Electricity Supply Industry to ensure that these are optimized

2. Environment and Health:

- Promote the sustainable use of renewable energy resources, particularly photo-voltaic applications

- Promote sustainable use of coal and fuelwood

- Ensure that negative health and safety impacts of wood, coal, paraffin and candles are investigated and dealt with if necessary

3. Biomass:

- Ensure sustainable supply of fuelwood

- Establish an effective institutional framework for managing fuelwood harvesting

4. Petroleum:

- Ensure adequate availability of petroleum products country-wide and improve distribution
- Improve safety aspects of fuel use, particularly LPG and paraffin use in households
- Monitor economic efficiency of the petroleum industry and take steps to improve efficiencies if necessary
- Re-structure government petroleum policy and monitoring capacity
- Maintain adequate strategic stocks based on the risk of supply disruptions
- Ensure that petroleum products are procured at cost effective and fair prices

5. Efficiency and Conservation:

- Improve energy efficiency in Botswana
- Improve transport efficiency

6. Governance and Institutional:

- Coordinate environmental issues related to energy with national environmental management
- Re-position and structure the energy policy and governance structure in government and clarify its mandate so that it has sufficient weight to achieve its objectives.

7. Renewables:

- Botswana should be in a position to take advantage of regional and international developments in renewable energy
- Introduce PV into Botswana in an orderly way with adequate coordination with related initiatives, institutional support, financing and technical standards
- Promote the use of Solar Water Heaters where appropriate

8. Coal

- Promote the approximate exploitation of Botswana's coal resources

9. Research and Development

- Coordinate energy related R&D activities and make the R&D accesible

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	This document is the major written output of the final phase of the Botswana Energy Master plan (BEMP). The BEMP process started in 1985 and has gone through three phases. The first phase sought to collect and collate data on energy resources, energy technologies and energy supply and demand and to set up a database for energy planning. The second phase sought to develop and refine the data and database from phase 1, to appraise energy projects and to make recommendations on energy policy. The first two phases were a success in terms of developing good information on the Botswana energy sector. However, the official appraisal of the first two phases identified a shortcoming in the process in that adequate local institutional structures had not been developed including the development of personnel. The report consists of two sections: Section A provides information on the energy policy development methodology used. This includes: Chapter 1: A description of the participatory approach used Chapter 2: A definition of energy policy development terms and a structure for energy policy development Chapter 3: An identification of national, social and economic policies and the linkages between these and the overall energy policy objectives.

Source: *Ministry of Mineral Resources and Water Affairs (MMRWA), 1996. Botswana Energy Masterplan – Final Phase. MMRWA, Gaborone*

q) Sudan

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: Sudan's Renewable Energy Masterplan Study					
Country: Sudan	**Commencement Year (Formulated):** NA	**Year Published (Finalized):** 2005	**Total number of pages:** 73	**Ministry responsible:** NA	**Nature of document:** Renewable Energy Masterplan
Is the vision of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide:					
Is the mission of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide					
Are the objectives of the energy explicitly policy provided? (yes or no)					**Yes**
If yes, please state/list:	The broad policy objectives are: • Review the current status of renewable energy development in Sudan, assess the prospects and propose a masterplan for policy development and systematic implementation of programs for promoting and commercialization of renewable energy applications including appropriate institutional structure and linkages • Facilitate through a master plan, a progressively increasing contribution from renewable sources of energy as part of the national energy balance and therebyt helping to improve energy services especially in rural areas, reduce dependence on conventional energy, and lead to environmentally sound and sustainable development.				

N/A – Information not Available

ii) National Energy Priorities

a) Priority Projects

This masterplan study suggests a number of renewables that should be fast-tracked for development in Sudan (quick winners), to generate rapid results and impact in the near future. It contains a set of proposals for the implementation of these quick winners. The quick winner options are renewables that can be implemented in the near term before the window of opportunity for RETs passes, to demonstrate success in RE and avoid technological lock-in to an oil-based energy sector.

Each of the proposals is expected to have a substantial awareness creation component aimed at senior policy makers who are now coming on board as a result of the comprehensive peace agreement (CPA).

1. Solar PV for institutions and water pumping

The key near-term potential market of PV systems in rural institutions can be sub-divided into the following segments:
- Solar PV lighting systems for Khalwas (Koranic schools) and schools.
- Solar PV lighting systems for hospitals and health centres.
- Solar PV lighting systems and solar powered TV for Villages' Clubs.
- Solar water pumping systems for domestic use.
- Solar PV systems for telecommunications which is normally taken care of by telecom companies, so it will not be considered in this plan.

2. Solar Water Heaters for industrial applications:

With an estimated annual budget of about US$170,000, the Masterplan proposes a pilot project on solar water heaters project primarily targeted at industrial applications where demand is likely to be high.

3. Biomass cogeneration for agro-industries

There is already a vibrant co-generation industry in Sudan with an estimated installed capacity of close to 60MW, most of which is accounted by the Kenana sugar company which had 40MW co-generation facility back in the 1980s. There are five other sugar companies with installed co-generation facilities of less than 10MW each. Two other major sugar factory investments with a significant cogeneration component are also planned. To further develop this important option, it is suggested that a project of about US$ 250,000 per year, (primarily for financing of pre-feasibility studies) would be adequate to engineer a major increase in co-generation contribution to Sudan’s power sector.

4. Wind pumping for water lifting

This project will install 40 pilot units of wind pumps in ten locations around the country. The wind pumps are to include imported horizontal-axis units and locally fabricated low-cost units of the Savonius type. The pilot project is expected to last 1-2 years followed by the preparation of a more comprehensive long term program for wide scale dissemination of wind pumps. The pilot program is estimated to cost US$210, 000 per year and involve five senior experts personnel and about 10 junior project personnel.

5. Cross-cutting Studies

In addition, the Masterplan proposes two cross-cutting studies. The first cross-cutting study proposed by the Masterplan is designed to address the serious absence of reliable data on existing and potential market for various renewable energy technologies. Without

this baseline data, it is virtually impossible to undertake comprehensive planning as well as raise finance from potential donors and investors.

This study is expected to collect data on the following:

- *Solar PV*: number of PV units disseminated, installed capacity, market potential, credit mechanisms, key barriers to expansion (most of this data is available in the PV project documents)

- *Solar Thermal*: number of units, installed capacity, market potential (commercial and industrial enterprises that need hot water), contribution of water heating in commercial/institutional entities to peak electricity demand, key barriers to expansion

- *Biomass cogeneration*: no. of existing co-generation facilities, installed capacity, whether connected to the grid, key barriers to expansion

- *Wind pumping*: estimated number in use, market potential, number of potential manufactures, key barriers to development of wind pumping industry

- *Small hydro*: Estimated number of small hydro plants, Number of engineering facilities with capacity to manufacture small hydro components, estimated number of small hydro sites, estimated capacity of small hydro sites, key barriers to development.

- *Geothermal*: Thermal as well as electricity generation potential of existing geothermal resources. Although geothermal is not considered a short-term winner (its investment horizon is more than 2 years) it is included in this baseline study because it could be a major contributor to the power sector – a well financed energy sub-sector. In addition, this study project will include the commissioning of regular surveys to collect data on renewables, as well as institutionalization of the data collection in order to ensure continuity. About US$250,000 would be needed every year to effectively implement this initiative. The second cross-sectoral study will investigate the potential of other renewables that have not been identified as quick winners, which in the medium to long-term could deliver significant benefits to Sudan. The study will prioritize the options that are best suited for development in the context of a rapidly evolving energy sector (growing availability of fossil fuels such as LPG, fuel oil, natural gas and construction of 1250MW Merowe hydro power plant due to come on stream in 2008). Medium and long term options to be assessed include:
    - Energy from urban waste
    - Modern and improved bioenergy options (improved cookstoves, biofuels, improved brickmaking kilns, energy plantations)
    - Wind Generation
    - Small hydro for rural mini-grids
    - Solar Thermal Electric
    - Wave power

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	Before delving into discussion of Sudan's energy resources, it is first important to review key general characteristics of Sudan that have important implications for the country's energy sector and renewables industry, in particular. With an area of 2,376,000km^2 (World Bank, 2004 & AFREPREN, 2005;), Sudan is Africa's largest country which increases the cost of ensuring adequate energy services to all its communities found in different parts of the country. Sudan's population is estimated at over 35million, growing at an average annual rate of 2.18% (World Bank, 2004) with a significantly large proportion of young people who require employment. The energy sector could be an important contributor to job generation that would employ the growing number of young people entering to the job market every year. The urban population is estimated at 38%, and is expected to grow rapidly in the near future. Consequently, urban energy demand is expected to grow rapidly. While traditionally, it was believed that the bulk of the poor were found in rural areas, the picture is changing with rapid urbanization. A growing number of the poor are now found in urban areas and their need for adequate energy services will need to be addressed by Sudan's policy makers. Sudan's GDP increased from US$5billion in the early nineties to almost $15billion in 2002. The GDP growth rate in 2002 was estimated at 5.5% (World Bank, 2002; Sudanese source?) close to double the population growth rate. A large proportion of the growth is attributed to the energy sector – primarily revenues flows from a rapidly growing oil industry that is able to meet the bulk of local petroleum demand as well as generate a very substantial growth in oil exports. The per capita income was estimated at US$340 in 2002. A significant proportion of the population lives in poverty, with limited access to resources and incomes. The southern region of the country has registered the highest poverty levels over the years primarily due to political instability and simmering conflict that has now been brought under control with the recent signing of major peace agreements. The current political process in Sudan is likely to lead to a significant change in the development of the country. A peace agreement signed in December 2004 is currently being implemented, and is expected to result in better integration of the Southern Sudan in the national development process. Of particular interest has been the agreement to share oil revenues in an equitable fashion. Several processes have been initiated to build on the peace dividend with one of the most important being the Joint Assessment Missions, that have highlighted key development projects that should be given priority in the South; and the preparation of an interim poverty reduction strategy for Southern Sudan, which is ongoing and which will be merged with the existing draft poverty reduction paper and which is expected to provide the basis for more equitable development of the country as well as drastic reduction in poverty levels. A national initiative on Sudan's strategies for achieving the MDGs has also been launched by the Ministry of Finance. These initiatives are likely to result in a significant reduction in poverty levels, and accelerated as well as more equitable development of Sudan.

Source: *Government of Sudan, 2005. Sudan Renewable Energy Masterplan Study, Government of Sudan, Khartoum*

r) Mali

The table below lists general information on the national energy policy.

i) General information

Title of Document Assessed: Action Plan for Renewable Energy Promotion in Mali					
Country: Mali	**Commencement Year (Formulated):** N/A	**Year Published (Finalized):** 2004	**Total number of pages:** N/A	**Ministry responsible:** Ministry of Mineral Resources and Energy	**Nature of document:** Summary of Energy Policy
Is the vision of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide:					
Is the mission of the energy policy explicitly provided? (yes or no)					**No**
If yes, please provide					
Are the objectives of the energy policy explicitly provided? (yes or no)					**Yes**
If yes, please state/list:	The key objectives of the Policy are: • improving access to energy especially from renewables • the rational use of existing energy sources • the efficient use of existing natural resources to produce energy • sustainable use of biomass resources through the conservation and protection of forests • strengthening government capacity and streamlining administrative procedures within the energy sector				

N/A – Information not Available

The table below gives a summary of ADB's priority issues and other key issues covered in the energy policy/strategy document

ii) National Energy Priorities

The following energy policy principles extracted from the document assessed gives an indication of the national priority areas of Mali:

To achieve the set goals, the implementation of the strategy will use the following guiding principles:

- Redefinition of the role of various actors in the energy sector so that each actor must work conform to the role which is defined to him
- Financing: It will be essential that the state with all its partners sets up a financing mechanism
- Increased awareness on renewables
- Information, education and communication

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	*No explicit executive summary has been provided. However, the following is an excerpt from the introduction that serves as a suitable summary:* The placement of the framework of poverty reduction strategy by the government has been intensified. For this purpose it proposes to give a clear vision of the actions it has to undertake by Mali for the promotion of the energy sector, to contribute to an action plan on renewable energies in Mali. it will be a question of carrying the share of renewable energy in the energy balance of the country of less than 1% in 2002 to 15% in 2020 The ministry of mines, energy and water through the national directorate of energy, has the major aim of ensuring access to clean and affordable energy to majority of the population.

Source: *International Energy Agency (IEA), 2006. Action Plan for Renewable Energy Promotion in Mali. www.iea.org/textbase/pamsdb/detailaspx?mode*

s) Ghana

The table below lists general information on the national energy policy

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: A Summary of Energy for Poverty Alleviation and Economic Growth: Policy Framework, Programmes and Projects</td></tr>
<tr><td>Country:

Ghana</td><td>Commencement Year (Formulated):

N/A</td><td>Year Published (Finalized):

1999</td><td>Total number of pages:</td><td>Ministry responsible:

Ministry of Energy</td><td>Nature of document:

Summary of Energy Policy</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide:</td><td colspan="5"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td>If yes, please provide</td><td colspan="5"></td></tr>
<tr><td colspan="5">Are the objectives of the energy policy explicitly provided? (yes or no)</td><td>Yes</td></tr>
<tr><td>If yes, please state/list:</td><td colspan="5">The key objectives of the policy are:

• Consolidate and improve existing energy supply system

• Increase access to high quality energy services

• Secure future energy supplies

• Stimulate economic development

• Minimize environmental impacts of energy supply and consumption

• Strengthen institutional and human resource capacity and R & D in energy development

• Special Concerns - Renewable Energy Technologies.</td></tr>
</table>

N/A – Information not Available

The table below gives a summary of ADB's priority issues and other key issues covered in the energy policy/strategy document

ii) National Energy Priorities

The following energy policy objectives extracted from the document assessed gives an indication of the national priority areas of Ghana:

- The Government shall consolidate and improve existing energy supply system
- The Government shall increase access to high quality energy services
- The Government shall secure future energy supplies
- The Government shall stimulate economic development
- The Government shall minimize environmental impacts of energy supply and consumption
- The Government shall strengthen institutional and human resource capacity and R & D in energy development
- Special Concerns - Renewable Energy Technologies.
- The Ministry of Energy will pursue the following policies to accelerate the development and utilisation of renewable energy sources:
- The Government shall create a level playing field for renewable energy by removing all fiscal and market barriers.
- The Government shall encourage utility companies to adopt renewable energy in their supply mix.
- The Government shall institute a "RET-Friendly" pricing framework in competitive applications such as in electricity supply.
- The Government shall provide funding support for non-grid connected renewable energy technologies for economic activities (such as agriculture) and social services (such as schools, health centres, provision of potable drinking water).
- The Government shall support technological development and cost reduction through pilot demonstration projects and local manufacture of RETs.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**No**
If yes, please provide :	

Source: *International Energy Agency (IEA) 2006. Energy for Poverty Alleviation and Economic Growth: Policy Framework, Programmes and Projects.*
http://www.iea.org/textbase/pamsdb/grcountry.aspx?country=Ghana

t) Mozambique

The table below lists general information on the national energy policy.

i) General information

<table>
<tr><td colspan="6">Title of Document Assessed: Alignment, Harmonisation and Coordination in the Energy Sector, Mozambique – by Scanteam Analysts and Advisers</td></tr>
<tr><td>Country:

Mozambique</td><td>Commencement Year (Formulated):

NA</td><td>Year Published (Finalized):

2005</td><td>Total number of pages:

68</td><td>Ministry responsible:

Ministry of Mineral Resources and Energy</td><td>Nature of document:

Consultancy Report</td></tr>
<tr><td colspan="5">Is the vision of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide:</td><td colspan="4"></td></tr>
<tr><td colspan="5">Is the mission of the energy policy explicitly provided? (yes or no)</td><td>No</td></tr>
<tr><td colspan="2">If yes, please provide</td><td colspan="4"></td></tr>
<tr><td colspan="5">Are the objectives of the energy explicitly policy provided? (yes or no)</td><td>Yes</td></tr>
<tr><td colspan="2">If yes, please state/list:</td><td colspan="4">This is not an energy policy document. The assessement is derived from a consultancy report that was carried out by Scanteam Analysts and Advisers who examined the feasibility of and options for improved donor harmonistion and alignment in the Mozambique energy sector and provide recommendations for reform and capacity building in the existing national structures and procedures in order to facilitate increased harmonization and alignment.

The key objectives of the Energy Policy (1997) as mentioned in the report are:

• To ensure reliable energy supply, at the lowest possible cost, so as to satisfy the current levels ofconsumption, and the needs of economic development

• To increase the availability of energy for the domestic sector, particularly coal, kerosene, gas and electricity

• To promote reforestation in order to increase the availability of firewood and charcoal</td></tr>
</table>

	• To strengthen the institutional capacity of the main agencies that supply energy, in order to improve their performance • To promote economically viable investment programmes, with a view to the development of energy resources • To increase the exports of energy products • To increase efficiency in the use of energy • To promote the development of conversion technologies and environmentally benign energy uses • To promote a more efficient, dynamic and competitive business sector

N/A – Information not Available

ii) National Energy Priorities

Since there is no explicit set of priorities outlined, the recommendations of the Energy Strategy (2000) have been used to give an indication of the National Energy priorities:

- The adoption of a single buyer model with competition, as the model for reform.
- The restructuring of EDM through vertical separation into hydro generation, transmission (including power procurement) and distribution business, complemented by horizontal separation of distribution through concessions (to EDM municipalities and private participants) for well-defined geographical areas;
- The strengthening of private sector participation by:
  - Introducing independent power producers (IPPs) in new generation projects, and possibly selling the existing hydro business;
  - Letting management contracts for distribution business followed by leases/ concessions contracts; and
  - Outsourcing non-core transmission and distribution functions.
- Establishment of a mechanism and institutional arrangement for tariff regulation;
- Independent regulatory agency established by primary legislation; and
- Consideration of a multi-sectoral regulatory agency (at least for electricity and gas) as a longer term goal.

The table below provides the executive summary

iii) Executive Summary

Has the executive summary been provided? (yes or no)	**Yes**
If yes, please provide :	Mozambique has vast energy resources that have considerable potential for national energy-intensive industry and for export: hydropower, gas, coal, perhaps petroleum. In addition come large bio-mass and solar energy for more local energy needs. The country is thus well endowed with resources, but lacks national skills and financing, as well as own market demand, for rapid internal development of this potential. The role of external funding and technical assistance will thus remain important for many years to come for the successful development and modernization of the energy sector. Mozambique has undertaken a restructuring of the energy sector to create more modern management of its energy resources. The national power utility has been transformed into a state company; a regulator has in principle been created; a national fund to promote rural energy through innovative activities, private sector engagement and an enhanced role for local authorities is in place; a national petroleum institute has recently been created to address the role of the private sector in gas and petroleum exploitation; links to the Southern Africa Power Pool have been established; and the Ministry is trying to strengthen its policy development and oversight functions. The one concern one may raise is if Mozambique is moving too fast to establish new public institutions in the energy field. While the changes are in line with New Public Management theories and what is considered "good practice" structures for mature energy markets, it may be that the relatively large number of new entities may fragment the very limited skills base the country has. The functional analysis of MIREME that is supposed to take place in 2005 as part of the Public Sector Reform process should look into this issue. **Sector Policies and Developments** Mozambique has put in place a fairly modern legislative framework for the energy sector in general and the power sector in particular. But some aspects are still unclear, and in particular the contribution the energy sector is to make to poverty reduction. While the legislative framework is considered largely in place, implementation and enforcement appear to lag behind considerably. While electrification is clearly an important contributor to long-term and more equitable economic growth, and hence critical to Mozambique working its way out of general poverty, in the short to

	medium term this will have little impact on either the energy consumption nor income generation of poor households. A more carefully designed policy needs to take into account poor households' actual energy needs and ability and willingness to pay for access and consumption. While the discussion around PARPA performance has taken this discussion forward, and better indicators can enhance performance tracking, the conceptual basis for more relevant pro-poor energy interventions need improvement. There is for the time being not a good venue for systematically developing this between interested donors and the authorities. Proposals considered for the development of the energy sector have consequences for both long-term and short-term poverty reduction. The restructuring being initially proposed for EDM was built on recent "good practice" models from mature energy markets and not from relevant emerging market experiences, nor does it take into account the spectacular regulatory failures that have occurred even in highly developed markets. It is also not in line with the historical experience of developed economies, where electrification has been accelerated through internal subsidization rather than driven by market forces, nor did it take into account the most recent findings from the World Bank Group's own evaluations. The proposal gave rise to considerable debate within the GOM and the donor community. The result is a more cautious approach to EDM restructuring, characterised by a longer time frameand intensified study of potential impacts. The concession approach and incentives for local energy distribution systems run byprivate entrepreneurs or local authorities build on sophisticated and complex institutional arrangements. In the current skills context of Mozambique, this seems costly. The study finds the approach in general, and the Inhambane pilot project in particular worthy of scrutiny and debate for various reasons, and a broader dialogue is recommended to ascertain full transparency.

Source: *Scanteam Analysts and Advisers (SAA), 2005. Alignment, Harmonisation and Coordination in the Energy Sector., SAA, Oslo*

Appendices

Appendix 1: National Communications Sections Pertaining to Energy

a) Morocco

The choices of the sectors with mitigation potential was made on the basis of the reference scenario and the sectorial analysis by category of the emission sources taking into account the technology potential and development objectives.

The identification of about twenty mitigation projects of, avoidance of emissions or carbon sequestration is a result of a thorough examination of every sector and branch and the potential of technological options with the main users. The results of this .rst investigation are summed up below.

The Energy sector, the main source of GHG and the driving force of development, has been particularly targeted. The review of the technological options with the main actors in this sector has resulted in the identification of some fiffteen mitigation projects in energy management, natural gas use in the industry and the development of renewable energy (hydraulic, wind and solar energy, decentralized rural electrication).

The other projects cover the modules of Forests (afforestation and fruit-tree plantations), Waste (bio-gas recovery from solid and liquid wastes) and Industrial Processes (cement production, phosphate treatment). For every identi.ed mitigation project, the assessment of avoided GHG emissions and additional absorption of carbon has been calculated, taking into consideration the projected time for the realization of the project and its implementation program, as well as the lifetime of the equipment.

The implementation of all 23 projects would enable the avoidance of the emission of 5.9 million tons E-CO2 in 2010 and 9.4 million tons in 2020. The cumulative amount of avoided emissions would approximately reach 102 million tons E-CO2 over the whole period of 2001-2020. The sectorial distribution of avoided emissions, projected in 2010 and 2020, show that the projects having to do with the module Electrical Power would contribute to an average of 75% in GHG emission reduction. This contribution appears to be more important than the module's share in the generated emissions (approximately 63%). This results from the fact that the action plan has given more weight to this module, under the assumption that it is the sector most responsible for the emissions and one witnessing among the highest growth rates.

The module Forestscomes in second position, with a contribution of "avoided emissions" (carbon sequestration) of 10% in 2010 and close to 12% in 2020, as a result of the increase in the absorption of CO2.
The identification of the projects with the biggest potential for GHG emission reduction by 2020 (more than 50% of all reductions in 2020 and approximately 56% of the

cumulative amount of avoided emission for the period 2001 – 2020) is a result of the analysis of avoided emissions. These projects are:

- Development of Renewable Energy
- Development of Natural Gas Use in Industry
- Energy Management in Industry
- Development of Wind Energy for Power Production
- Support to the Afforestation Programme

Mitigation Scenario

The mitigation scenario is a result of the reference scenario and the avoided emissions. This scenario foresees a 7.9% reduction in the emissions for 2010 and 8.5% in 2020, in comparison to the reference scenario.

b) Mauritius

Various mitigation and adaptation options have been identified within the Mauritian environment to reduce GHG emissions and to cope with climate changes. Some of these have already been implemented partially or totally according to the existing natural, social and economic context while others might be more difficult to address because of constraints. The non-exhaustive list of options and the contraints foreseen are given on a sectoral basis.

ENERGY AND INDUSTRY

Option	Constraints or Challenges
Keep better statistics to allow easier and better data-gathering for periodic GHG inventories	Before doing initial survey, the statistics division and government was not aware that some information might be crucial and much of the information was grouped and needed to be split. As experience increases, knowledge will improve about what data may be useful to make energy projections and mitigation analyses. Statistics should be kept on import of vehicles, small motors, engines, household generators, industrial equipment, increase in use of certain appliances such as air conditioners and fans, etc.
Rodrigues and Outer atolls-assessment of energy requirements and best renewable energy options	For any systems that do get installed, on-site training of personnel to repair and maintain the systems will be crucial. Also, if wind energy is chosen on Rodrigues, the towers must be able to come down if a cyclone is predicted. Systems installed should be viable for commercial income-producing activities on a small-scale, as well as for household needs.
Electric company user fees should reflect the real cost of producing and distributing power	Customers will complain about price increases; the poor will be disadvantaged by higher bills.
Decrease dependency on fossil fuels while increasing use of renewable energy alternatives	Mauritius has significant potential to utilize many alternatives for generation of electricity; and with capital investment could provide almost all of the islands' energy needs from a combination of biofuels (from sugar cane), photovoltaics (solar), wind power, ocean wave power, and ocean thermal energy conversion. Most of these would require tremendous initial capital investment, with benefits accruing in the long-

	term, both environmentally and economically. Decisions must be made at a high-level about what technologies to pursue.
Lower energy consumption through demand-side management energy efficiency and conservation programs and incentives	This would entail a variety of policies and measures including voluntary programs, tax refunds, consumer education, energy audits of businesses and industry, and perhaps initiation of a "green labelling" program for household appliances and office equipment. It has been successfully done in other countries and would probably work in Mauritius; if loopholes are closed (i.e. duty free shops must also comply).
Ban imports of high power consuming appliances; or give favoured import status to low-energy appliances	The economic costs and impacts of these types of policies for local businesses must be evaluated first.
The economic costs and impacts of these types of policies for local businesses must be evaluated first	Loss in revenue to government
Conduct a "turn off the lights" energy-awareness campaign for the holiday and tourism sector.	Materials would need to be printed in a multitude of foreign languages to be effective, or at the very minimum two or three.
A strategy is being devised to sensitize stakeholders on the need to adopt more efficient and cleaner production systems.	Stakeholders have reacted positively to the strategy. An energy awareness campaign is being worked out at the level of the Ministry of Industry.

c) Benin

Based on the results of greenhouse gas emissions inventories developed in 1995 and the development objectives of the country, strategies formulated have covered the Energy sector for which mitigation studies have been carried out.

Two sub-sectors have been mainly targeted in order to reduce emissions in this sector. The subsector of residence and transport are included for the simple reason that they are respectively the largest consumers of traditional energy and conventional energy.

In the sub-sector of transport, options for reduction in greenhouse gas are based on the strict monitoring of imported vehicle fleet, the promotion and development of public transport.

In the sub-sector of residence, measures conducted are related to the extension of fuelwood and gas-powered stoves through the introduction of a program of assistance for the acquisition of improved hotbed and stoves by the populations.

Apart from implemental or on-going programs and projects in the field of Environment, Benin recommends for funding a number of projects and programs in various sectors of the economic and social life, as shown in the table below.

Title	**Global Objective**	**Expected Results**
Mitigation Projects		
Projects of Greenhouse Gas Mitigation	Reduce Green house Gas emissions through the promotion of improved hot beds using fuelwood, kerosene or gas powered stoves; Improve the living conditions of the populations	Emissions of Greenhouse Gases attributable to households are reduced at a lower cost
Mitigation of Greenhouse Gases through the fostering of public transport	Reduce greenhouse gas emissions through the promotion of public transport	Reduction of greenhouse gas emissions due to the sub sector of transportation

d) Comoros

The analysis of carbon dioxide emissions sources and sinks suggests that mitigation actions in the *Energy Sector* would contribute to reduce Comoros' GHG emissions. Alternatives to the use of fossil fuel resources are the hydroelectricity, solar energy, wind energy and geothermal energy.

A study of Anjouan et Moheli3 main rivers conducted in 1989 showed that in Anjouan, a Hydroelectricity development on river Tatinga, that has a potential hydropower of 3000 kW, could cover the demand for electricity of the island for the coming years. In Moheli two hydroelectricity developments could be made, a first one on river Ouamlémbéni and a second one on river Deoua. The Comoros are an ideal site for the use of solar energy. It is mostly sunny all year long. The greatest constraint to the development of solar energy is its initial cost. The use of wind energy requires minimum wind power that constitutes an absolute threshold for feasibility. Data on annual mean wind power on the islands are currently not available.

In Grande Comore, advanced studies must be conducted before any geothermal energy development can be considered. In the case where studies are positive about the geothermal potential of the island, exploitation could be envisaged to begin in 2020 4. One geothermal deposit would provide enough energy to supply half of the Grande Comore demand of 2020.

Scenarios in which GHG emissions are reduced or mitigated relative to a baseline case (1999) were analysed for the *Energy Sector* for the year 2050. Analysis of the results demonstrates that the development of photovoltaic energy and wind energy would contribute to reduce emissions in Grande Comore by 12%, in Moheli by 86% and 33% in Anjouan, for a total national reduction in GHG emissions of 17%.

Decision- makers must assess mitigation options against each island's unique potential and specificities. The island of Moheli known for its windy shores seems to offers the best prospect for the development of wind energy. In Grande Comore, solar energy combined with the longterm development of geothermal energy could be envisaged, while hydroelectricity appears highly feasible in Anjouan.

e) Djibouti

Reducing greenhouse gas emissions by identifying and implementing mitigation measures is one of the goals of the Convention on Climate Change to which the Republic of Djibouti is committed. The 1994 greenhouse gas inventory showed that Djibouti's biomass, although limited, was sufficient to enable the country to act as a greenhouse gas sink. In any case, given the country's arid climatic conditions, population pressures and the effects of overgrazing, it cannot maintain this status indefinitely.

The mitigation measures advocated for the energy, transport and waste management sectors, and reforms in the areas of land-use and forestry, form part of the general government strategy for sustainable economic and social development. The development of the country's geothermic resources, efforts to regulate the transport sector, reforestation and biomass conservation projects, together with techniques for the composting and recycling of wastes as energy sources, are key elements in Djibouti's proposed programme of action.

Where renewable energy is concerned, the geothermic project has already been launched, with support from the Global Environment Facility (GEF). To succeed, these measures must be implemented as part of a comprehensive undertaking, involving capacity-building, the drafting of regulations, awareness-raising and information activities, and institutional strengthening. As a whole, all these measures are incorporated in the various sectorbased proposals. In addition, the implementation of mitigation measures is heavily dependant on the availability of funds, which can cause serious delays to some projects.

f) The Gambia

The first step in the assessment of mitigation was to gather data and information through stakeholder consultation and desk review of literature on mitigation of greenhouse gases. The consultations were conducted at both the community and technical levels and was largely based on the 1993 Inventory of Greenhouse Gases (NCC, 2002). This culminated in the identification of a long list of potential mitigation options that could be stand-alone projects or could be collapsed into a single project.

Based on desk review and scoping meeting involving various stakeholders, the following list of categories of mitigation options were developed and screened for further analysis.

1: Residential Sector

(a) Switching to Energy Sources/Equipment with Lower GHG Emissions.

2: Energy

(b) Switching and promotion of renewable (Solar Home Systems and LPG).

3: Transport Sector

(c) Revitalisation of River Transport for movement of passengers and bulk cargo.

In screening this long list of mitigation measures, national and project screening criteria and indicators were used to reduce the long list of potential mitigation measures to a manageablelist of potential projects. The criteria included the availability and ease of collecting the data needed for project development and implementation, the benefits and costs of the projects, the economic and social importance of the project in the country, and, most importantly whether the project meets the dual objectives of sustainable development and reduction of the concentrations of GHGs in the atmosphere. The additional national indicators used include:

- national development benefits and policy priority;
- how well the projects span the range of GHG mitigation opportunities in the country;
- how representative these projects are of GHG mitigation opportunities in the country or sub-region as a whole; and
- the availability of information to assess these projects.

The outcome of the screening was the reduction of the 11 options to the following 8 options that were then subjected to in-depth analysis using benefit-cost and cost effectiveness.

(i) Rural electrification using Solar Home Systems to displace a planned diesel plant.

(ii) Greenhouse gas reduction through the use of Improved Cooking Stoves.

(iii) Carbon sequestration through reforestation and protection of existing forests.

(iv) Large scale introduction of Liquefied Petroleum Gas to displace fuel wood.

(v) Utilizing waste for two city authorities to generate landfill gas for bottling.

(vi) Integrated crop and livestock farming- utilizing rice straw (treated with urea) as cattle feed.

(vii) Managing a multi-product forest for cashew nuts, honey-bee-keeping, etc.

(viii) Waste management using composting

g) Ghana

This section examines the abatement of greenhouse gases (GHGs) in the energy sector. The energy sector is currently the largest emitter of GHGs. The abatement in the sector was considered a time frame within 1994 to 2020.

In estimating the baseline emissions, Vision 2020 which is the government's main development plan and other estimates of energy demand were used. The energy supply situation was also considered. The emissions of CO_2 equivalent of GHGs to 2020 were estimated with these as inputs. This is called the baseline emission in the sense that Ghana's development path was considered with no aim of reducing GHGs. The result showed that the CO_2 equivalent of emissions for the baseline would increase from 7,278 Gg,. in 1994 to 118,405 Gg in 2020.

Four abatement scenarios were looked at:

(i) replacing some biomass with LPG.
(ii) use of biogas and LPG to some biomass from 2010 to 2015 when only LPG and biogas will be used with the largest proportion of cooking being of biogas.
(iii) gradual penetration of solar PVs to the existing mix
(iv) gradual penetration of biogas instead of a huge penetration as in second and third scenarios.

The CO_2 equivalent reductions from the from the abatement measures of scenarios I, II, III, IV are 495,506 Gg, 700,044 Gg, 712,515 Gg and 543,778 Gg respectively. The cost implications of the reductions are important.

The cost of reduction of a Gg. of CO_2 equivalent of emissions for scenarios I, II, III, IV are $32.22, $2,701.56, $6,932.22 and $9,448.86, respectively.

This abatement assessment has shown that significant amounts of GHG emissions can be reduced in the energy sector through certain abatement options.

Abatement Assessment

In carrying out the abatement assessment, 1994 was used as the base year. The total GHG emissions in CO_2 equivalent for the five sectors are presented in Table 4.2 with the energy sector being the leading emitter in 1994.

Abatement assessment includes the estimation of a baseline emission.

Energy Demand Structure

Available energy data show that transportation is the largest user of petroleum products (60%), followed by residential and commercial (24%), then agriculture (8%) and industry and mines (8%). About 50% of urban households have access to electricity while only 10% of rural households have electricity.

Biomass is the main source of energy for cooking for urban households (82%) while about 15% of households use LPG. In rural areas about 97% of households use biomass for cooking, 2% use kerosene and 1% use electricity and LPG.

The energy demand is derived from the energy growth rates based on the projected growth rate of the economy. This is presented in Table 4.3.

Business-as-usual Scenario

The business-as-usual scenario is the emissions that would be forthcoming based on our development plan without any consideration for GHG emissions.

With the derived growth rates as inputs the business-as-usual emissions of CO_2 equivalent of GHGs to 2020 were estimated. The results showed that the CO_2 equivalent of emissions for the business-as-usual would increase from 7,278 Gg. in 1994 to 118,405 Gg in 2020 as shown in Table 4.3.

Table 4.3 Energy Consumption (1991-2000)

Fuel Type	Percent Per Year
Crude oil	9.2
Gasoline	1.6
Jet kerosine	3.6
Kerosine	0.2
Diesel	3.0
LPG	14.0
RFO	0.6
Electricity	3.0

Source: Ghana's Energy Sector GHG Inventory, 1998

Abatement Options

Four abatement options were considered.

Option I

Replacement of fuelwood and charcoal with LPG at the rate of 10% a year from 1995 to 2020.

Option II

a) 10% increase in use of LPG from 1995 to 2020.
b) a penetration rate for biogas use of 10% a year from 2010 to 2015 and 100% from after 2015 for cooking purposes.

Option III

In addition to measures in option II penetration rates of households in the use of solar PVs for lighting purposes to reduce the use of petroleum products and electricity were considered.

a) 5% from 2000 to 2004
b) 10% from 2005 to 2010
c) 20% from 2011 to 2014
d) 50% from 2015 to 2020

Option IV

In this option, option III was modified by considering a gradual penetration rate for biogas for cooking by 10% of households per year from 2010 to 2020.

h) Nigeria

The emissions of GHG in Nigeria is generally low based on available data. This is expected to rise in the future as a result of the high population growth rate, which is expected to lead to increase in energy consumption. Nigeria is not a member of the Annex I countries and therefore is not committed to any GHG emission reduction under the Kyoto Protocol. In order to assist non-Annex 1 parties to achieve sustainable development and at the same time assist Annex 1 parties to achieve compliance with their emission reduction commitments.

Article 12 of the Kyoto Protocol established the Clean Development Mechanism (CDM). In this first national communication, mitigation analyses were carried out in two major source sector categories: energy and land-use change/ forestry sectors. The analyses were done with a view to identifying mitigation measures that could also contribute to sustainable development of the country. The analyses for the two sectors are described in this chapter.

The Energy Sector

Energy plays a dominant role in the Nigerian economy. It supports virtually every other sector of the country and its dominance will increase as the population increases and as the industrial sector expands.

The primary modelling tool employed in studying the future of Nigeria's energy system is the MARKet ALlocation (MARKAL) model. MARKAL is a large-scale linear optimization model based on the concept of the reference energy system (RES). It is capable of capturing the complex interrelationships of an energy system from primary energy resources to energy service demands. Being a dynamic model, MARKAL can be used to explore mid- to longterm responses to different technological futures, emission constraints and policy scenarios.

Given a set of energy demand projections, technologies and emission constraints, MARKAL is able to identify the least-cost path within the RES that best satisfies the overall objectives of the energy-environmental system. MARKAL is demand-driven, and useful energy demand must be estimated exogenously for input into the model. Useful energy demand projections have been computed using the Model for Analysis of Demand for Energy (MADE), a simulation model. Basically, MADE employs a combination of statistical, econometric and engineering process techniques in calculating useful energy demand projections.

Useful energy demand projections are made for four economic sectors of the energy system – industrial (including agriculture), transportation, residential, and commercial sectors. In all, the sectors are broken down into 30 demand categories with a total of 102 demand technologies.

Table 3.1: Useful Energy Projections

Sector	1995	2010	2030
Residential	**112.58**	**177.02**	**326.06**
• *Cooking*	78.80	119.87	209.76
• *Lighting*	17.27	28.44	55.85
• *Non-substitutable electricity*	16.50	28.72	60.44
Commercial	**6.29**	**13.08**	**34.72**
• *Cooking*	0.47	0.97	2.57
• *Lighting*	4.58	9.51	25.25
• *Non-substitutable electricity*	1.00	2.08	5.52
• *Street Lighting*	0.25	0.52	1.38
Industrial	**81.00**	**114.57**	**134.14**
• *Feed-stock*	14.78	30.38	30.38
• *Process heat*	53.97	70.13	86.88
• *Motive power*	5.61	6.44	7.73
• *Lighting*	1.13	1.30	1.56
• *Non-substitutable electricity*	5.51	6.32	7.59
Transport			
• *Passenger Transport (Billion pass-km/a)*	514.27	1090.73	2960.85
• *Freight Transport ion (Billion-Ton-km/a)*	38.86	80.78	214.34
• *Air Transport*	23.48	48.81	129.51
• *Water Transport*	2.31	4.09	9.76

N.B. Unless otherwise indicated, all units are in petajoules

i) Seychelles

The mitigation options presented below contain a number of projects, which if implemented in the short and medium term, will reduce and limit emission of GHG in the Seychelles. Capacity building in those areas is also very important to ensure sustainability of options implemented.

Use of low-wattage and renewable energy technologies, such as, Compact Fluorescent Lamp (CFL) and Solar Water Heater (SWH): The use of compact fluorescent lamp instead of incandescent bulb, and solar water heater instead of electric water heater has great potential for significant reduction of emission of GHG in Seychelles. Wide scale use of CFL and SWH would reduce the demand for electricity significantly, thereby putting less pressure on the supply authority to meet the ever-increasing demand capacity. The government is adopting measures to promote the use of CFL and SWH, and to make these appliances affordable. Adoption of these technologies in the main government and private sector building will also be beneficial.

Use of LPG for domestic cooking: Over the last few years, government has taken steps to encourage the use of LPG in domestic cooking rather than the use of electricity and kerosene. Consequently there has been substantial investment to ensure constant and reliable supply of LPG, as well as subsidies on LPG cooking stoves. The government is committed to continue to promote LPG for domestic cooking, because there is potential for reduction of emission of GHGs and it reduces demand during peak periods. The price of kerosene has gone up as an economic disincentive. The majority of people are using LPG for cooking is therefore expected to increase.

Use of energy efficient refrigerators and freezers: Refrigerators and freezers are appliances that operate round the clock, and this contributes significantly to the electrical energy consumption in the domestic sector. It is therefore very important that these appliances are energy efficient. New cooling and refrigeration technologies adopted as a result of controls put in place as a result of the Montreal Protocol will also need to be considered for energy efficiency.

Setting up of an energy efficient use and conservation extension service within the Energy Affairs Bureau: The Energy Affairs Bureau is putting in place an extension service for advising users on energy efficient use and conservation. This extension service would help to reduce the energy consumption and emission of GHG.

The incorporation of energy efficient measures and standards in building design:
Building design and orientation sometimes does not take into consideration how various energy end-use activities will be implemented. Inefficient use of lighting and air-conditioning systems is sometimes a direct result of bad design and orientation of the building. It is quite common to find air-conditioning system which does not match the space to be cooled, windows that are not properly sealed, direct sunlight entering the rooms, inadequate temperature control, etc.

Proper design and orientation of the building would contribute toward the reduction of energy consumption and emission of GHG. The Government, through the Planning Authority has introduced energy efficient measures and standards in building design, and architects are being asked to put these measures into practice.

Energy audits for commercial and institutional buildings: Energy audits could be an effective method for the introduction of energy efficient use and conservation measures, which would contribute to reduction in emissions of GHG. The energy audits could identify areas where there is the energy wastage and actions could then be undertaken to limit wastage and reduce consumption of energy. The Energy Affairs Bureau is taking steps to put in place measures for energy audits in commercial and institutional buildings to be undertaken on a yearly basis.

j) Tunisia

Tunisia has submitted its first National Communication under United Nations Framework Convention on Climate Change at the 7th Session of the Conference of Parties held in Marrakech, Morocco in October 2001. The Communication includes a chapter describing a prioritized set of GHG mitigation opportunities. A total of 47 project opportunities have been identified, encompassing measures in energy, agriculture, land use change & forestry, and wastes.

In this project Portfolio, eight strategic investment areas are addressed, as outlined below:

- Cogeneration of heat and electricity in industrial and commercial facilities,
- Creation of a Revolving Fund for ESCOs to promote energy efficiency
- and renewables,
- Wind power development for electricity generation,
- Electricity generation using methane captured from landfills, agro-industries, and large farms,
- Solar hot water heating in the residential and commercial sectors,
- On-road freight transport system efficiency improvements,
- High efficiency street lighting, and
- High efficiency lighting in the residential sector.

This project portfolio represents important and concrete investment opportunities that, if implemented, will form a basis for promoting sustainable development in Tunisia, and for securing long-term carbon emission reductions for the investing entities.

Three important points underline this project portfolio:

- All options are closely tied to national development objectives,
- an institutional and legal framework exists for promoting sustainable development,
- the climate for Energy Efficiency and Renewable process has recently been incentivised by Presidential Decisions.

Hence, a supportive climate currently exists in Tunisia that will facilitate the investments proposed in this project portfolio.

Table 1 summarizes the costs, benefits, and other characteristics of the project portfolio. Over the accumulated project lifetimes, about 16.3 million tonnes of carbon dioxide equivalent would be avoided. The total investment cost to achieve these reductions is US$ 247.6 million, of which an investment of US$ 48.8 million is being sought from CDM partners relative to the value of the carbon savings generated. This assumes a value of carbon emission reductions of $3/tCO2. For a higher value of carbon emission reductions, i.e. $5/tCO2, the investment to be is sought from CDM partners would be US$ 81.2 million.

TABLE 1: SUMMARY OF PROJECT PORTFOLIO COSTS AND BENEFITS (TUNISIA)

Project	Initial Investment Level (million US$)	Carbon dioxide Equivalent Avoided (million tonnes CO2-eq)	Value of Saved (million US$) Carbon $3/tCO2	Carbon $5/tCO2
Cogeneration	34.5	1.4	4.1	6.8
Revolving Fund for ESCOs	24.0	3.7	11.1	18.5
Wind power development for electricity generation	155.0	8.2	24.6	41.0
Capture and use of methane for electricity generation	4.8	0.3	1.0	1.6
Solar water heating in the residential and commercial sectors	11.7	0.5	1.5	2.5
High efficiency freight transport	6.0	1.2	3.6	6.0
High efficiency street lights	10.4	0.8	2.4	4.0
Higher efficiency lighting in the residential sector	1.2	0.18	0.54	0.9
Total	**247.6**	**16.3**	**48.7**	**81.2**

Appendix 2: Executive Summaries of Country Strategy Papers (CSPs)

a) Angola

The main challenges facing Angola in the coming years are threefold: i) consolidation of the 2002 peace process, promotion of national reconciliation and reconstruction of the country; ii) consolidation of democracy, rule of law and respect of human rights; iii) good governance, which will make for macro-economic stability and proper mobilization of the country's substantial natural resources and ensure a marked reduction in the levels of poverty among the Angolan people. The armed conflict, one of the longest in the world, has caused a humanitarian crisis to which international organizations could respond only in part. Angola has the highest percentage of war-displaced people in the world – almost 30% of the total population, or 4.1 million people.

A very high proportion of the population is extremely vulnerable and dependent in one form or another on external aid. The food insecurity is associated with the absence of opportunities for any regular productive activity, namely in agriculture. Moreover, it has been extremely difficult to mobilize external emergency aid, particularly in terms of access to critical areas. These humanitarian concerns will, however, remain a top priority, at least in the short term. The war has also prevented the more rapid development of democratic practices in Angola, as well as being one of the main causes of human rights abuses. Angolan institutions have been making a certain amount of progress in this area, which needs to be consolidated. As regards the level of poverty in Angola, existing studies and analyses and empirical observation of the situation point to extremely high levels, as much amongst the urban population as amongst those displaced by the war.

The Government is drawing up a Poverty Reduction Strategy (PRSP) and is carrying out consultations at local level as well as with civil society and the international community. The lack of capacity of the public sector, particularly outside the capital, compromises the management of public finances and has a negative effect on services to the population. Health and education services are very critical, and are even nonexistent in some areas. Conscious of all these difficulties, the EC has analyzed, together with the Government of Angola, the Member States of the EU and other donors, and with civil society, the areas in which its co-operation could have the most comparative advantage. It has emerged from the debates that efforts need to be stepped up to gradually bring stability to the political and economic situation. The EC proposes to support a strategy encompassing aspects of relief, rehabilitation and development. In view of the rapidly evolving situation, this strategy must remain flexible. Thus, the EC will, in the short to medium term, give priority to funding the measures necessary to support the peace process and national reconciliation, including creating the conditions for free and fair general presidential and legislative elections. In the medium to long term, the Commission will gradually increase the focus of its support, concentrating aid on the social sectors and food security in particular.

At the same time, in order to support the viability of national reconciliation and the plans for economic recovery, as well as improving the conditions for poverty-reducing economic growth, the EC plans to help reinforce specific areas of good governance, namely the judicial sector, reform of the administration and public finances. Finally, to deal with the risks inherent in implementing an initially broad selection of planned interventions, the strategy recommends that the EC's efforts be fully complementary with those of other donors and development partners, including Angolan civil society.

Excerpt on Energy

In 2000, income per capita was only US$ 607. The oil sector grew by an annual average of 4.6%, whilst the energy, water and commercial sectors also had a favourable growth rate.

b) Cameroon

Cameroon is resource rich but has many poor people. After a dismal decade until 1997, the country is at a turning point; with four years of good economic performance behind it and prospects for steady growth in the immediate future. The international community has supported Cameroon's interim poverty reduction strategy with the first phase of debt relief under the Heavily Indebted Poor Countries (HIPC) Initiative and a new Poverty Reduction and Growth Facility from the International Monetary Fund (IMF). The next challenge will be to develop and implement a poverty reduction strategy, which responds fully to the concerns of ordinary Cameroonians, while tackling the high level of corruption which has bedevilled the country's development for years.

Cameroon's forests are of vital importance to the country's economy, and perform ecosystem functions of immense regional and global importance. They have long suffered from mismanagement, and are being degraded at unprecedented rates. However, there are real prospects that the decline in its forests can be reversed so that Cameroon can provide a sustainable wide range of benefits to its people and report favourably on its performance at Rio+10. Achieving this requires urgent action to bring management up to the standards expressed in the forest law, government policy statements and international commitments.

Britain is a full partner with the international community in support of Cameroon's interim poverty reduction strategy. We are also ready to continue direct support to Cameroon with a specific focus on forestry. The scale and nature of our support will depend on continued progress on the poverty reduction strategy and forest sector reform. Indicators used to measure progress will be consistent with existing international agreements (HIPC, Environment and Forest Sector Programme, Poverty Reduction and Growth Facility). The approach is twintracked. Provided that good progress continues, we will contribute jointly with other members of the international community to the Cameroon Government's planned Forest Environment Sector Programme. If adequate progress is not made, we will wind down our support through government and concentrate on our ongoing programme with civil society organisations so that they play a stronger role in forest management. We expect to reach a decision in 2002 on which option will apply for the following three years.

c) Cape Verde

The geographical situation of the Cap Verde worked, since XVème century, the history of the country quise confuses with migratory flows and trade between Africa, Europe and Americas. With the accession with independence in 1975 is posed the challenge of the autonomous development of the country, conditioned by strong constraints and thin potentialities. Vis-a-vis the scarcity of the natural resources, in particular of water, with its exposure to the cycle of the drynesses sahéliennes, the barriers to the development of the trade and communications resulting from its insular insulation and its archipelagic configuration, with the narrowness of its domestic market, the country its survival must and before all its food safety with the transfers coming from the important community capverdienne of Outside and with the international assistance. In spite of this structural vulnerability, the Cape Verde knew to mobilize its least assets, mainly its human resources.

The good performances which the rate of Index of Human Development translates which places it at the 2nd rank of the sub-Saharan countries, the amount of the GDP per capita (1330 US$) or the indicators social such as a rate of schooling of 98,5% in the primary education and which a life expectancy to the 68,9 years birth, owe much with the efforts of the people capverdien and the transparent and rigorous management of the received financings but also, and undoubtedly more, with the remarkable process implemented in the setting-up of the democracy and the respect of the human rights which makes Cap Verde a single example in Africa.

The structural reforms in which has been committed the country for 10 years and the efforts developed to accompany the process of universalization in progress carry however in them the risk of an aggravation of the poverty which could be éradiquée only once the structural obstacles with the economic development will not be any more one restrictive factor with integration and rise of the country in the regional and world context. The principal factor at the origin of poverty and the barriers to the development is without any doubt the water deficiency which affects hard the living conditions and the capacity of the economic activities to develop. In addition to the harmful incidence of the scarcity of water on the agricultural production and the environment in term of vegetable cover, the difficulties of access to drinking water influencing directly pubic health, by supporting the development of the diseases of hydrous origin, and harm in general the human development - in particular from the conditions of insalubrity of the habitat which the lack of water generates - concerning more particularly the women and the children who have in load the provisioning of water starting from public fountains, well or sources.

For the minority of Capverdiens which has access to a distribution network, consumption however is rationed, as in the capital where water is served only one hour every two days. The control of water, necessary to agriculture, the creation of units of transformation, the development of the services and the improvement of the living conditions of the populations implies the heavy ones and expensive investments in basic infrastructures since the pumping out of subsoil waters or the desalination of sea water until its distribution, while passing by its storage. The actions carried out in this field with the participation of the partners in the development and particularly of the European

Community determine the choice of the Community strategy which intends to consolidate the assets and to pursue the following goals: to improve the access to drinking water and the medical situation of the most underprivileged populations particularly and to create the basic conditions favourable with the economic development. For this purpose, the resources allocated with the title of envelope A, is 32 M€, will be concentrated to a total value of 25 M€ in the field of the distribution of water and the cleansing and will mobilize an amount of 7 M€, except concentration, for actions of accompaniment.

Excerpt on Energy

The electrical grid whose source of energy comes primarily from imported oil covered 60% of the country in the year 2000 (against 25% in 1990). The objective with the horizon 2005 is to ensure a cover in electricity between 65% and 98% according to municipalities and to arrive at the electrification of any locality of more than 200 inhabitants. If the introduction of the wind power remained on a limited level (10% of provided energy are of wind type), the Government intends to develop this renewable energy in resorting to the financing deprived to arrive toa rate of penetration of 20%. Energy

Photovoltaic limits itself as for it to some positive experiments in the field of pumping of water. The scarcity of water in the Cap Verde, even the absence on certain subsoil water islands, imposed the recourse to the desalination of sea water where this one returns for 50% in the production of drinking water in Praia and constitutes for the islands of S.Vicente, Sal and Boa Vista the only source of drinking water. Approximately half of the population is supplied starting from terminals fountains and of tankers. The objectives of the Government at horizon 2005 are to arrive toa rate of cover of the distribution network of water between 60 and 90% in the principal urban centres whereas it is only 25 to 65% currently. The policy of the Authorities in the field of energy and water was to open the sector of production to the private operators. Thus the Company of State Electra was privatisée in January 2001 and was seen entrusted the production of water freed of salt and electricity, as well as the management of the distribution networks of drinking water and cleansing in the islands where it intervient1, on the basis of contract of concession over 50 years which remains to be concluded.

The Government intends to promote the investment deprived in the field of desalination, to create municipal companies in load of the distribution of water and electricity in the zones where Electra does not intervene (centers supplied with subsoil waters) and to install a legislative and lawful framework to which will take part the ARM (Agency of Multisector Regulation) in responsibility of regulate tariffing, to lay down the methods of creation of electric units, to define the rights and obligations of the dealers and the users.

d) Central Africa Republic

Registered on the list of the least Advanced Countries and wedged, the Central African Republic has PIB/h of 300 dollars and one of the ten indices of human development low of the world. The civil disorders with repetition which the country knows since 1996 affect the confidence of the economic agents and handicap the efforts of reform and revival of the government.

A Strategic Framework of Fight against Poverty is under development, which could make it possible the RCA to quickly profit on the initiative PPTE. In addition to the control of the economic and financial evolutions in the short run, the medium-term challenges of the RCA touch with the development of the physical and human capital, in particular through the reinforcement of the infrastructures of transport and production, and the improvement of the conditions of health, education and training of the populations. Political stability is essential to the continuity of the efforts of development, especially in a disturbed regional context.

Progress as regards good governorship is necessary to guarantee implementation an effective of the resources available for the development. Lastly, these challenges could not durably be taken up without progressing regional integration, so much in the field of economic integration than on that of the political dialogue. On the basis of joint analysis of the economic situation, social and poilitic of the country, and lessons of the efforts of co-operation last and in progress, the government of the Central African Republic and the European Commission chose to build the National Indicative Program on three axes of intervention (the allocation of resources of the PINE is indicative): _ Single Sector of concentration: transport (71% of the PINE) _ Macro-economic Support and reinforcement of the good governorship (25% of the PINE) _ Interventions except concentration: microphone-realizations (4% of the PINE). These interventions will be conceived to be in coherence and complementarity with those of the other backers, in particular the Member States of the European Union. Their design, implemented and evaluation will be done, as far as possible and according to methods' to be defined, in partnership with the civil company and the private sector.

e) Comoros

Located in the Mozambique Channel, between Eastern Africa and Madagascar, the archipelago of the Comoro Islands includes the four islands of Grande-Comore (Ngazidja), Mohéli (Mwali), Anjouan (Ndzuani) and Mayotte (Maoré). The Comorian population is estimated at 560 442 inhabitants on a surface area of 1 861 km2. The average density of 301 inhabitants per km2 is one of the highest in Africa. With a per capita GDP of CF 176 000 (EUR 358), the Comoro Islands are classified among the least developed countries (ranked 139th in the world with an HDI of 0.506 in 1999).

The political instability that has characterised the Comoro Islands since independence, public finance difficulties and an economy in recession have prevented any improvement in the population's social conditions, especially in rural areas. In view of the high demographic growth effective social expenditure is unable to cope with needs and implementation of the Sectoral strategies drawn up for health and education development has been hampered by a lack of political continuity and the separatist crisis that has torn the archipelago apart since 1997. In this context, although the Government's efforts are directed at the general objective of poverty reduction by means of greater rigour in the management of public finance, it is clear that the state's limited financial resources and the structural constraints of the economy make this objective difficult to attain. A 50% reduction in household poverty in 2015 implies an annual rate of per capita wealth creation of between 2.1% and 2.5% until that date. This pace will be difficult to maintain because of external constraints (lack of competitiveness of the Comorian economy and its incapacity to satisfy domestic demand) but also because of the current context of national reconciliation. The process under way will imply major investment in the new decentralised institutional system. The Government will then have to cope with the dual challenge of meeting the requirements of good governance and its financial obligations towards the social sectors.

The intervention strategy proposed in this paper works on the assumption that the widest possible access by people to education is one of the means of making the necessary adjustments that will improve people's living standards. In this respect, priority has been given to strengthening human capital in order to allow the active and productive involvement of the population in the national and regional development process. But the current state of the education system (dilapidated infrastructure, lack of means, high drop-out rates, critical failure rates in secondary school, institutional weaknesses) does not allow the Comorian Government to take up the challenge of ensuring the social, democratic and economic integration of Comorian youth in the national associative, professional and political fabric.

This strategy paper, the result of a dialogue with the administration, civil society, the private sector and the grassroots communities, proposes that the European Community's cooperation with the Union of the Comoro Islands, under the 9th EDF, should contribute to the Government's efforts in the fight against poverty, making education a focal sector. 80% of the National Indicative Programme A-allocation (EUR 16 million) will be earmarked for implementing the national education policy according to a sectoral

approach covering the primary, secondary, university sectors, as well as the technical and vocational training sector and informal education. The remaining 20% of the A-allocation (EUR 4 million) will be used, as part of the process of the islands' autonomy, to support local development initiatives and trends. This support will include an important component of capacity building for decentralised stakeholders.

f) Congo – Brazeville

The Republic of Congo leaves three violent civil wars (1993/94, 1997 and 1998/99) which made many victims, caused important displacements of population and destroyed the infrastructures. The signature of the agreements of cease-fire and suspension of the hostilities, on November 16, 1999 to Point-Black and on December 29, 1999 with Brazzaville, allowed the re-establishment of peace in the country.

These agreements envisaged a national dialogue which took place of March 17 to April 14, 2001. Following this dialogue, the national indicative program for the 8th EDF, rising to 41,3 € million, was signed on May 17, 2001. (Sector of concentration: support with the sectoral transport policy; sectors except concentration: democratization, human right and State of right and sectors social). The effects of the bad management during years and the wars are dramatic: approximately 50% of the agricultural tools were destroyed, 75% of the cattle was lost, the circulation of the train between Brazzaville and Point-Black was stopped until recently, the majority of the roads are not operational. The women suffered from sexual abuse on broad scale, the young people face unemployment, the services of education and of health hardly function.

With this is added a foreign debt equivalent to 246% of the GDP and 309% of exports in 1999. In spite of the fact that Congo is an exporting country of oil, the country does not profit fully from the current high prices of oil. The various governments guaranteed the oil resources and the management of the oil funds is still marked by a lack of transparency denounced by the IMF. From the economic point of view, the country is confronted with a double challenge of economic rebuilding as well as passage of a state-controlled economy with a liberal economy. A post-conflict agreement for 2000-2001 was signed between the IMF and Congo on November 17, 2000. A Document of Strategy of reduction of poverty (DSRP) is under development. If Congo improves its economic performances, the next stage will be the granting of a Facility of reduction of poverty and growth (FRPC), which could allow a treatment of the heavy debt of the country (5,1 billion dollars). The objective of the Strategy of national co-operation is to contribute to the fight against poverty by the definition of a coherent framework of co-operation in a context post-conflict between the Republic of Congo and the European Community for the implementation of the 9th EDF. This strategy is based on the objectives of the CE/Congo co-operation, the diary of development of the country and the complementarity between the interventions of the backers. According to these data, a strategy of answer was elaborate as well as an indicative program. The indicative amounts allocated in Congo are 43 € million to the title of envelope A and 7,4 € million to the title of the envelope B.

The identified sectors of concentration are (1) the support with the institutional development in the context of the democratization and the State of right and (2) the support to the sectoral policy of transport. The choice of these sectors of intervention is justified by a preoccupation with a continuity compared to the actions of the preceding EDF, the cumulated experiment of the Commission and coordination between the backers. The sectors except concentration will be (1) the transverse sectors and (2) the support with the social sectors. This document was jointly elaborate by the services of the

national director and the European Commission. It was concerted with the embassies of the Member States and was the subject of consultations with the other backers, the representatives of the economic operators and the representatives of the civil company.

Excerpt on Energy

With a production of approximately 13.5 million tons per annum, oil accounts for 58% of the GDP, 93% of exports and 72% of the budgetary resources. But Congo does not profit fully from the high level of the current courses. The successive governments guaranteed the future incomes on the basis of low price which in particular made it possible to finance the effort of war. Because of its quality, Congolese oil is sold with a rebate compared to the world prices of reference. A mission of evaluation of the IMF in March 2001 denounced the absence of transparency in the management of the oil receipts, in particular those managed by the SNPC. To allow a control of the activities of this company, the Government was committed to ensure this transparency and maximizing the revenues from taxes coming from the oil sector. A convention was signed to this end with the SNPC. The World Bank has a program of support to the establishment of the transparency of the operations of the sector of hydrocarbons.

g) Burundi

By examining the Note of dialogue country 2003-2004 for Burundi, in October 2003, the Councils had recommended to the Bank to reinforce the dialogue with the country to find a solution with the problem of the arrears. The Councils, also, had recommended preparing a temporary DSP, following the payment of the arrears, which will constitute a complete framework of reference of its interventions in the form of the loans and sectoral gifts. The country paid part of stock of late and continuous to ensure the payment of the current expiries.

Engagements close were given by the backers and the Bank to audit the remainder of late within the framework of initiative of the countries post conflict. Accordingly, this document constitutes a response to the Council Directives. With the favour of the Agreements of Arusha signed in August 2000, the Government carried out with the assistance of the partners to the development a temporary program post conflict (PIPC) over the period 2002-2003 in order to answer the stakes which challenge the country, of which in particular: consolidation of peace, the promotion of the national capacities for the reinforcement of the good governorship and the rehabilitation of the productive base of the economy.

The PIPC was relayed by the program urgently presented by the Government at the partners at the development at the time of the forum of Brussels in January 2004, whose ultimate objective is to promote a project of company which ensures peace, the reconciliation, the blooming of the population through a strategy of allowance and equitable management of the resources. The emergency program is in conformity with the orientations of the temporary strategic Framework of economic growth and fight against the poverty (CSLP-I) which was finalized, in March 2003. This strategy is supported by the triennial program of reforms economic and structural (2004-2006) supported by a Facility of reduction of poverty and for growth (FRPC), approved by the Council of the IMF in January 2004.

The Bank plans to support the actions of national rebuilding and the efforts of consolidation of the economic reforms of the Government. In the short run, in comparison with the strategic vision of the Bank good governorship fight against poverty, two sectors of concentration were retained for the temporary strategy of the Bank: the social sector and the sector of the infrastructures. The choice of these two sectors is justified by the need for rehabilitating the basic social infrastructures so as to attenuate the poverty and the precariousness of the living conditions of the populations. Thus the Bank will finance a multisector project of creation of employment and rebuilding. Moreover, the Bank will support the reinforcement of the institutional capacities and the programme of economic reforms of the Government. The temporary strategy was defined of coordination with the other backers by privileging cofinancing of the priority actions defined by the Government. Medium-term, the strategy of the Bank will consist in, also, continuing the dialogue with the authorities and the other partners to identify the fields of the assistance of the Bank within the framework of the FAD X, (2005-2007), which will be the subject of a Document of strategy complete country so as to support the

reinforcement of the institutional capacities, economic and structural reforms, the development of the productive sectors and the fight against poverty.

h) Djibouti

A new agreement of partnership between the ACP EU and countries was signed at Cotonou, Bénin, on June 23, 2000. This agreement envisages the preparation of a Document of Strategy of Co-operation (DSC) which will provide the framework for the assistance of the EC in favour of Djibouti under the 9th EDF. On the basis of principle and spirit contained in the agreement of Cotonou, the Government of Djibouti jointly with the EC prepared this DSC in consultation with official and not-official actors and principal givers, in particular the Member States of the EU. An external expertise was mobilized to contribute to the analysis in certain key sectors. Result of this process is a DSC based firmly on the objectives of the Djibouti policy and the clean objectives of the development co-operation of the EC. The DSC clarifies the difficult situation this country, handicapped by a series of structural constraints; natural resources and human limited, an arid climate, constraints specific to a country of reduced size. A slow growth characterizes the country, where at the same time the budget and the balance of payments are structurally overdrawn and where the private sector accounts for only approximately 20% of the added value. The population remained poor as a whole and the social indicators worsened during last years. Neither the private sector nor the public sector was able to impel a sufficient growth to reduce poverty in the country. The political situation interns was marked by ethnic competitions which started a civil war in 1991-94 and one vulnerability with the regional conflicts. The tensions however calmed down gradually since 94.

The signature of an agreement of peace in May 2001 with the fraction armed with the opposition marks the end of the hostilities, the will definitively to found peace in the country and to reinforce the national unit. The current mode, although still very centralized, posts a political will of opening at the same time at the national and international level and prepares a law on the decentralization which will grant autonomy increased to the areas. Since 1995, Djibouti engaged in a process of structural adjustment and recorded important progress in the rebalancing of its macro-economic situation. Djibouti also engaged the development process of a Document of Strategy of Reduction of the Poverty (DSRP) which will provide the principal framework for the mobilization of external assistance in the future. The strategy of the Community co-operation is pressed on the framework general provided by the process of the DSRP. It aims at supporting the country in the implementation of its reforms economic, structural and sectoral related to the reduction of poverty. It will also take part on the initiative of implementation of the agreement of peace. Broadly the strategy answers the general objectives of co-operation of the EC. It rises from the analysis of the situation of the country, its prospects and challenges and reflects the lessons drawn from the experiment of the EC in Djibouti. The supports to be brought are based on an indicative allowance of 29 M€ (envelope A) more one amount of 5,8 M€ (envelope B) for additional supports to mobilize in the event of exogenic shocks. The DSC identifies two areas of concentration “water and the cleansing” and “the macro-economic support” and a field except concentration “the support with the implementation of the agreement of peace and decentralization”. These resources could be supplemented by the mobilization of the assistances on the budgetary headings

i) Egypt

As provided for in the MEDA regulation (EC No 2698/2000 and EC No 1488/96), the Country Strategy Paper (CSP) provides a strategic framework for EC assistance in the period 2000-2006. It sets out EU co-operation objectives, policy responses and priority fields of co-operation based on a thorough assessment of the partner country's policy agenda and political and socio-economic situation. The national indicative programme (NIP) attached to the Country Strategy Paper sets out the EU response in more detail, highlighting programme objectives, expected results and conditionalities in the priority fields of co-operation for the period 2002-2004.

Egypt is an active participant in the Barcelona process and has signed an Association Agreement with the EU. It is a relatively stable multiparty democracy although a strong presidency and well-entrenched government party dominate politics. Human and civil rights are guaranteed by the constitution and the rule of law is upheld by an increasingly independent judiciary but very arbitrary 'emergency powers' are still in force and have been used to restrain the activities of democracy and human rights activists.

Egypt's ambitious economic agenda has had to adjust to a serious deterioration in foreign earnings in the late 90's, and to very low growth and a weak currency in the last two years. The main challenges facing Egypt in the medium term are:

- Maintaining social and political stability and increasing employment;
- Completing the process of economic transition;
- Consolidating its external relationships with Europe and its regional neighbours.

Within that context and taking into account the objectives of the Barcelona process, the EC can most effectively assist the partner country in meeting those challenges by:

- Promoting the implementation of the EU-Egypt Association Agreement;
- Supporting the consolidation and completion of the economic reform process;
- Supporting stable, balanced and sustainable socio-economic development.

The elaboration of the Country Strategy has drawn heavily on discussions with representatives of the Egyptian government, and from contacts with EU Member States and other donors. The proposed co-operation strategy retains the key characteristic of the existing National Indicative Programme, notably support to economic transition and balanced socio-economic development, but prioritises measures that directly assist the implementation of the Association Agreement on the one hand, and promote key aspects of social development on the other.

Excerpt on Energy

The government has committed itself to a major programming of infrastructure development including the building of schools and health centres, the extension of energy networks (notably natural gas) the construction of power stations, roads and airports (through private sector BOOT and BOT schemes), the modernisation of ports and the upgrading of water and sanitation systems.

The present government has taken important steps to promote export led growth and to reduce the current account deficit. This reached 2.5 % of GDP in the period 1998-1999 due to low energy prices, a collapse in tourism and remittances, and an import boom fuelled by an overvalued currency.

j) The Gambia

This Country Support Strategy (CSS) presents the framework for EC assistance to The Gambia for the period 2002-07. The CSS is incorporated within The Gambia's Draft Poverty Reduction Strategy Paper (PRSP) and is consistent with the objectives of EC development policies. The Gambia's PRSP has been formulated over the past two years and is expected to be approved in the second half of 2002.

The CSS was prepared in parallel with the PRSP and is the result of extensive consultations between the Government, Non-state Actors and the Commission. During these consultations an analysis and assessment was carried out on the political, economic and social situation in The Gambia, including a review of the past 25 years of EC cooperation. Consultations were made with EU Member States and other donors in order to ensure complementarity. The EC's response strategy was developed on this basis. The strategy proposes aid measures in two focal sectors, namely, rural development and transport, capacity building being a non-focal theme. The document provides a comprehensive and coherent framework for EC-Gambia cooperation and combines, as far as is possible, all relevant EC resources and instruments. The indicative allocation in terms of programmable resources (A-envelope) amounts to €37 million, while the B-envelope, meant to cover any unforeseen needs that may arise, for instance, because of a fall in export earnings, budget deficits or emergency situations, is €14 million.

Approximately 40.5% of the A-envelope will be allocated to the Rural Development sector and some 40.5% to the Transport sector. The remaining 19% will be allocated to capacity building within Government institutions and to Non-State Actors. Gender, environment, human and institutional development and ICT will be common themes in the implementation of the IP.

Excerpt on Energy

Water and electricity is provided by the National Water and Electricity Corporation (NAWEC) in the Greater Banjul Area and in provincial towns. Electricity production increased from 66.26 million kWh in 1991/92 to 126 kWh in 1998. That said, demandincreased with the growth in production, and as the effect of inadequate reserve generating capacity, weak distribution systems and the high cost of fuel, resulting in continuous load shedding. Water production increased over the period from 5.3 million cubic metres to 13.5 million. Installation of water systems (wells and boreholes) at village level is the responsibility of the Department of Water Resources and the Area Councils. However, capacities are weak, leaving rural water supply dependent on donor and NGOfundedprojects.

The government's strategy in the utility sector is to establish a long-term partnership with a reputable private company to improve efficiency, availability and reliability of electricity, water and sewerage systems. The EC has been heavily involved in rural water supply through micro-projects at village level under the Divisional Development Programme and though Regional Solar Programme I. Over the past ten years some sixty of the bigger villages have benefited from improved solar-powered water pumping and reticulation systems. About 37% of the rural population currently has access to pipeborne water supply.

The EC-funded Support to Decentralised Rural Development Programme and RSP II is currently expanding water supply through hand-dug wells (micro-projects) and is upgrading solar systems and extending piped water supply to thirty more settlements.

k) Ghana

Ghana is a unitary Republic with a multiparty democratic system. The New Patriotic Party (NPP) won the presidential and parliamentary elections of 2000 bringing to an end the administration of President Rawlings who had ruled the country as a military ruler from 1981-1992 and for the subsequent eight years as a constitutionally elected president. These elections marked the first time Ghana had undergone a change of government through the ballot box.

Ghana was the first sub-saharan country to become independent in 1957. Since then Ghana's political and economic history has been chequered, experiencing a political and economic shocks. Despite this, Ghana has long been considered a pole of stability within a traditionally troubled region. Since the elections of 2000, however, the prospects of political stability and steady economic growth appear good.

Ghana's has a population of over 18m inhabitants, is a low-income country with an annual GDP per capita of € 300 and relies heavily on agriculture for employment and domestic income and on gold, timber and cocoa for its exports. The Country Support Strategy for Ghana for the period 2002-2007 reflects the general principles of the Cotonou Agreement. It takes into account the country's Interim Poverty Reduction Strategy Paper (PRSP) for 2002-2004 which will be developed into a full strategy paper. The CSS will be adapted as necessary as the PRSP process moves forward. The CSS has been drafted with the active participation of a wide range of state and non-state actors and the donor community.

The document provides a comprehensive and coherent framework for the EC-Ghanaian cooperation in the medium term and combines, to the extent possible, all relevant resources and instruments. The indicative allocation in terms of programmable resources (A envelope) amounts to € 231 million, while the B envelope, destined for unforeseen needs which may arise for instance because of a fall in export earnings, budget deficits or emergency situations, is € 80 million. The definition of the EC's support to Ghana's development and poverty reduction priorities takes into consideration (I) the development priorities of the government as reflected in the (i) PRSP and EU development policies and priorities; (ii) the financial requirements and implementation capacities in a particular sector; (iii) the existence of a sector development policy; (iv) the historic development relationship between the EC and Ghana and its strengths and weaknesses; (v) complementarity with other donors and (vi) the comparative advantages of the EU as a donor.

Based on these criteria, rural development, road transport and macro-economic support have been identified as focal sectors for EC support to Ghana. These focal sectors will be complemented by other activities in the fields of governance and the environment. In all sectors, co- or parallel financing with other donors, specifically EU Member States and the Bretton Woods Institutions, will be considered.

Excerpt on Energy

Over the last ten years, 85% of EIB loan financing in Ghana has focused on the energy supply sector where supply struggles to meet demand. Three loans worth € 98 m were made to the Volta River Authority (VRA) for the rehabilitation of the Akosombo hydro power plant and for the construction of the Takoradi combustion power plant. The upgrading of the Ghanaian power generation and transmission capacity is still considered a prerequisite for long-term sustainable development of the economy.

l) Madagascar

After one period marked by an animated political life and the economic decline, Madagascar, one of the poorest countries of the world, with a GDP per capita of 260 $, know, since 1996, a political stability which supported the resumption of the growth of its economy. Indeed, the Third Republic is set up in the duration, according to a semi-presidential mode, while supporting a policy of decentralization by the installation of the six autonomous provinces.
The consolidation of the State of right continues, in particular by the preparation of measures transparency budgetary control, like in the field of the reform of the judicial, essential power ensuring the separation of the capacities and the fight against the corruption. In addition, the Government was committed concluding the program in the course of macro-economic stabilization and of structural reforms, whose objective is, in particular, to found an inciting framework with the development of the sector private and thus favorable to the growth. But the appreciable results already obtained are still too recent and too fragile to be immediately perceptible on the level of the living conditions of a great majority of the population struck by poverty, mainly in the rural zones.

However, they made it possible the country to profit, in December 2000, of Initiative PPTE, following the adoption of an interim statement of strategy of reduction of poverty prepared with the participation of the civil company and the community of the backers, as well as commitment entered into by the Government to devote the resources coming from the reduction of its debt to the fight against poverty according to three following axes': to improve the economic performances for the benefit of the poor, ˜ to develop the basic essential social services and to widen the nets of safety in favour of the most vulnerable layers of the population, ˜ to install an institutional framework favorable to the economic growth, the reduction of poverty and with the improvement of the governorship.

To take up the challenge to succeed in reducing poverty starting from these three strategic orientations, the Government will be brought to give a detailed attention, on the one hand, with the increase constant in the economic growth rate, while attacking the causes structural and endogenous of the poverty in rural medium, which are of a food and monetary nature; in addition, with the enclavement of the areas which represents an important barrier to the rural development and finally, with the reinforcement of the macro-economic framework, by taking care that the rural population collects of them the benefit obtained within the framework of a transparent management of the public affairs. The European Commission, which has in Madagascar of a thorough knowledge of the situation and evolution the sectors concerned with these orientations, is able to accompany the Government in their implementation. This is why, and by seeking the complementarity and synergy with the Member States and the other important backers, the Government of Madagascar and the European Commission were appropriate to retain the double principle of the sectoral and geographical concentration, while retaining as transverse approach the continuation of the support to the improvement of the macro-economic framework while basing itself on indicators of results. The geographical concentration in two of the poorest provinces, located in the south of the country, those of Fianarantsoa and Tuléar, will facilitate the research of the intersector complementarity

between on the one hand the rural development and food safety and, on the other hand, transport by the rehabilitation and maintenance lorry drivers. A particular and constant attention will be granted to the environmental impact, like the full participation of the women as actresses and recipients of any taken action. Apart from the geographical areas of intervention which could be widened at the time of the review with semi-course to conclude the same intersector approach, of the financial supports in order to consolidate programs in progress in these two sectors will be provided within the framework of the use of Stabex funds and budget allocation assigned to food safety like also in order to completing the repairing of the principal national network.

Moreover, like the consolidation of the State of right and the reform of justice constitute a central point of the reforms taken into account within the framework of the strategy of the reduction of poverty, the reform of the judicial power could also be constant as a field except concentration. Lastly, the supports of the European Commission, which will aim, initially, to improve the living conditions of the rural populations, will be supplemented by the interventions financed by the European Investment Bank in order to contribute to the promotion of the growth of the private sector.

m) Mauritius

Mauritius has experienced rapid economic growth over the past two decades, transforming itself from a low-income country with a mono-sector economy at independence in 1968 to a middle-income country with a four-pillar economic base (manufacturing, sugar, tourism and financial services). At present, however, some sectors of the economy (notably textile manufacturing and sugar) are facing a number of challenges, due to both internal and external factors.

Post-independence Government policy has focused very substantially on stimulating economic growth and to broadening the economic base. In the drive for economic development, however, social provision in certain sectors has fallen behind or policy has failed to keep abreast of changes in society. Hence poverty alleviation – assistance to those who have not benefited from the country's overall economic growth – is now a government priority, as is greater emphasis on skills development, and on social/environmental infrastructure. In particular, steps are being taken to address environmental problems which affect social wellbeing and which could otherwise become a serious constraint to economic growth.

Such environmental problems include waste water disposal, a sector which had been badly neglected until the mid-1990s, such that only a very small percentage of the population had access to adequate waste water/sewerage disposal systems. After discussions between the Government of Mauritius (GoM), European Union (EU) representatives, other donors and representatives of the private sector and civil society, it was agreed that the Country Support Strategy (CSS) should propose that up to 85% of Mauritius' 9th EDF allocation be channeled to the environment sector, for the purpose of funding components of the 1994 National Sewerage Plan. Amongst the reasons for the choice of the EU response strategy were the obvious merits of the specific investments in terms of promoting social equity and public health, the preservation of the natural environment and the safeguarding of areas of economic development (tourism in particular) which have already contributed greatly to raising overall standards of living. Additional reasons include the experience acquired in the environment sector through its role in the 8th EDF programme, in particular the high level of donor co-ordination that that has involved, and the clear and firm policy framework for the waste water sector.

The financing mechanism envisaged for support to the focal sector environment is, in principle, targeted budgetary support. In addition, it is proposed that some 15% of the 9th EDF allocation be allocated to a demand led programme of decentralized co-operation aimed directly at poverty alleviation.

Excerpt on Energy

Emphasis will be placed on renewable energies and environmental concerns will be taken into consideration.

n) Niger

Niger is a vast country (1.267.000 km ²) and wedged, surrounded by seven countries between l Africa of North and l Afric sub-Saharan. Old zone of transit and trade between North and the South, Niger is very dependent on the economic and political context regional, initially of Nigeria and the countries of l´UEMOA, but also of Libya and l Algeria.

Without infrastructure of communication efficient and located at more than 1.000 km of the ports them closer, the cost of the exchanges, as well inside as with l exterior, is very high. In 2000, the population is considered at 10 million inhabitants, primarily Moslem, is composed of 8 ethnos groups of different languages. All the ethnos groups of Niger are "transborder", which results in a weak national coherence. Of another with dimensions, this situation supports the transborder exchanges, especially with Nigeria, which is, like Niger, in its haoussaphone majority. The population is to 85% rural. The GDP per capita, estimated at 197 US$, dropped of more than 40% during 20 last years. Approximately 63% of the population lives in lower part of the poverty line. The rate of illiteracy is one of highest world (84%), and the majority of the population does not control French, language official of the country.

According to the index of human development of the UNDP, Niger is classified 173ème on 174 countries. The country is largely desert and the great drynesses of 1973 and 1984 weakened the environment and the way of life of the populations. Because of the climatic changes, extreme poverty and strong regional demographic pressure, Niger is a country structural food d insecurity. In its Interim statement of Strategy of Reduction of Poverty (DiSRP), the government proposes to reduce poverty and to start again the economy within a framework of financial stability by also stressing the good governorship and regional integration within the UEMOA and of CEDEAO

o) Sao Tome and Principe

The economy santoméenne is slightly diversified and primarily rests on the production and the export of cocoa, which accounts for 90% of the export earnings. In more it is true that, except its small size, its insulation geographical and its very broken relief, the country knows many structural deficiencies. The roads, the canalizations of water and many other infrastructures are decayed. The capacity for absorption of the country remains very low. In addition the economic growth remains blocked by an exiguous and parcelled out domestic market.

The social indicators are indeed better than in many of other countries of comparable socio-economic level (index of human development: 110ème vs. 125ème PIB/par head), but these figures is likely to occult an impoverishment of the population which grows louder and louder. Indeed São Tomé E Príncipe survives thanks to the external assistance (70% of the GDP), but this one appears not very effective because of institutional deficiencies and of the diversity of the backers. Economy of the company santoméenne sorrow to be left these contradictions. The foreign debt accentuates its dependence with respect to the backers (national debt: 270 million dollars: that is to say 7 times GDP!). Industry is quasi non-existent, and agriculture remains insufficiently developed, both for the food products the products of export. Moreover, with the fall of the world levels of the cocoa and the fall of the production, the balance of the payment was degraded. Oil could bring the growth; surveys revealed the presence of oil to strong depth in territorial waters of the Republic of São Tomé E Príncipe.

A political agreement was signed with Nigeria to settle the question of the maritime borders. A joint authority charged to exploit a common zone was created. The installation of a real capacity of decision and implementation of the public policies is an essential element so that the oil basket (not before 2008) can cause growth. Sao Tome E Príncipe is rather advanced and recorded much success from the point of view of the democratic process. However, it should be recognized that the institutional and administrative framework must be reformed, even if important progress were already accomplished. (see chapter 3: analyze). This will lead to a better effectiveness in the application of the ressouces. Financial stabilization is the other fundamental pillar and the results reached by semi-annual program of follow-up, established in 2002 with the IMF, will determine the eligibility of the country on the initiative reinforced reduction of the debt of the heavily in debt poor countries. This stabilization necessarily passes by a discipline and a strict control of the expenditure of State, by the balance of the finance public, inflation (7,4% in 2001) and of the money circulation, without forgetting the stabilization of the rate of exchange. In this field some progress were accomplished out of tax matter and of collection of taxes, but it is necessary to continue the efforts to allow the consolidation of the results of the fight for the reduction of the debt In this context the concentration of the intervention of the EU in the road sector, with a detailed attention with maintenance and to the rehabilitation of the rural tracks contributes significantly and specific to the reduction of poverty, supporting the use and the development of small private companies, which work in the under-sector of road maintenance

The under-sector of intervention identified is of extreme importance even for a support at the agricultural zones and the populations dispersed in the rural territory, to avoid involving them towards the urban zone By knowing that 80% of the budget of the country are devoted to the infrastructures, which are a priority necessary to the development of tourism and the movement of the goods, the support of the EC becomes a crucial financial support for São Tomé E Príncipe. Moreover the support of the EU will make it possible to increase the clean resource allocation of the State with the social policies. The interventions of PINE 9th EDF on the basis of an envelope A of 9,4 million euros, will be distributed to 72,3% for the maintenance and the rehabilitation of the rural tracks. This support will be reinforced by a programme (1,5 MEUR) of technical aid with the SENAE (Servico Nacional de Estradas) for the training of professionals for the supervision of work and support to ONE (Directing National: 0,80 MEUR) in order to increase the capacities by them. Training schemes to support the development of small building firms, active in the under-sector of road maintenance, are envisaged to the amount of 0,3 MEUR. On the other hand the Government of São Tomé must be committed to allocate in the next years an annual amount like contribution to the maintenance of the roads and making carry out periodic audits of the program.

Excerpt on Energy

The recent conclusion with Nigeria of an agreement of joint exploitation of the zone oil offshore (40% of the incomes vs. 60% for Nigeria) can bring to São Tomé E Príncipe of the additional resources which, managed so well, could be of determining importance in the fight against poverty. The solution considered rests on the creation of a joint authority charged to exploit a common zone. At present, because of the lack of a reliable geological investigation, no concrete estimate is possible with regard to the quantity and the quality of the products which could be exploited. For the moment one bases oneself on projections of the Guinean situation. If necessary and under the most favorable conditions, the beginning of the exploitation will be able to give its positive effects only in 2008. The effective and transparent use of the resources generated by oil to avoid an impact destabilizing on the population santoméenne should also be one of the priorities of the government. The government reinforced its monetary policy and of the finance public and accelerated many structural measurements, in particular in the fields of reform public office and development of the oil legislation. The customs tariff was revised and the government eliminated all the tax exemptions and customs. From now on, the customs santoméennes profit from a new version of the Sydonia system worked out by the French customs.

p) Seychelles

Seychelles, an Indian Ocean island state with a total land mass of some 455km2 has developed considerably since the 1970s, in particular since the opening of the international airport in 1971 and the subsequent growth of the tourism industry. Tourism became a vital pillar of the economy in the decades that followed, replacing agriculture as a major employer and generator of foreign exchange. By the end of the 1990s, however, while tourism remained important, efforts to diversify the economy had resulted in the development of a manufacturing sector, in particular in the form of tuna canning for export. More recently still, a financial services sector has developed.

The 80,000-strong population has been governed since shortly after independence in 1976 by a single party, the Seychelles People's Progressive Front (SPPF), under a single President. Socialist in nature, SPPF ideals permeate both the Seychelles economy and society in general. Social welfare, which includes free access to education and health care, has always been a major Government priority, and has resulted in a high literacy rate, an impressively low infant mortality rate and in good housing provision. Seychelles is among the top ten countries in the world in terms of gender equality. While there are more - and less - advantaged Seychellois, there is no abject poverty. GDP per capita stood at some $ 6,500 (1999) – the highest level in Africa.

Such generous welfare provision has not come cheap, however, and maintaining this *acquis* together with implementing ambitious development projects, often on borrowed money, has proved to be more than the economy could really afford. The result has been a growing budget deficit, difficulties in attracting foreign investment and, by the end of the decade, an acute shortage of foreign exchange having a negative impact on business and individuals alike. Government spending has been significantly reduced, but without radical macroeconomic reform – of a nature which the government considers unwise to implement – the target deficit of 3% of GDP by 2003 may be difficult to meet.

Given the very satisfactory coverage of the main social sectors – education, health care and housing – and the lack of preparedness for the kind of macroeconomic reform generally prescribed by institutions such as the IMF, discussions between the Government of Seychelles (GoS), EC representatives, other donors and representatives of civil society resulted in agreement that the environment should be the focal sector of Seychelles' 9th EDF programme. The particular area designated for support was solid waste disposal, a vitally important area if Seychelles is to preserve the beauty of its environment – on which its tourism industry is based – and the purity of its lagoon waters, vital for both the tourism and fishing industries. The specific activity envisaged for support is a Waste Management Programme, using some 85% of total funds (€ 3.3m). The remaining 15% of 9th EDF funds (€ 0.6m) will be allocated to a national capacitybuilding programme for state and non-state actors.

Excerpt on Energy
T*he production of landfill gas, as an energy source, may be considered.*

q) Somalia

Somalia has suffered from the absence of a functioning national government and administration for a decade, during which the country dissolved into clan-based conflicts and growing political segregation. Out of this situation, two distinct self-administered regional entities have emerged, 'Somaliland' in the northwest and 'Puntland' in the northeast, both enjoying relative stability and having local administrations providing a range of basic services; the south has remained politically and militarily fragmented. In 1999, the President of Djibouti launched a peace initiative for Somalia (the Arta conference), which resulted in the adoption of a Transitional National Charter and the establishment of a Transitional Government (TG) and Assembly, with national ambitions.

The international community, including the EU, has welcomed the outcome of the Arta conference but the claim of the TG to represent the whole of the country continues to be contested by Somaliland and Puntland as well as by many faction leaders of southern Somalia. Somalia was always among the poorest countries of the world, a situation aggravated by the civil war, and the majority of the Somali population live below the poverty line. It does not possess significant mineral resources and depends largely on the exploitation of livestock and agriculture.

Most of the country remains structurally food-insecure whilst social and productive services, formerly provided by state agencies, have completely collapsed. In the absence of an internationally recognised government, Somalia did not sign the 7th and 8th EDF and has been without a National Authorising Officer, a function that in accordance with the conclusions of the November 1992 ACP-EC Council of Ministers is since then assumed by the Chief Authorising Officer of the European Development Fund. EU Member States have reviewed the political situation since early 2001 and initiated an internal reflection on "conditions which need to be met before a legitimate authority in Somalia could sign the Cotonou Agreement", thus implying that until further notice, the afore-mentioned arrangement should be maintained. Ever since project activities restarted in 1994, the EC Co-operation has been constantly evolving from a humanitarian focus towards a rehabilitation orientation and now also includes some development elements.

The overall long-term objective of the Commission Strategy for Somalia is to contribute to the alleviation of poverty and to the promotion of a more peaceful, equitable and democratic society. The intervention objective of this strategy is to support sustainable improvement of the livelihood of the Somali people – by enhancing food security and economic growth – and their improved access to basic public and social services as well as the establishment of good governance. This can only be achieved if poverty-related aspects as well as the political dilemma are sufficiently addressed and justifies the continuation of a multi-sectoral approach with particular reference to the empowerment of civil society enabling it to become an active element in the process of national reconciliation. The future of Somalia remains difficult to predict, depending crucially on the willingness and ability of the major internal and regional actors to pursue or support the incomplete process of peaceful reconciliation. This requires high flexibility for the aid implementation scheme allowing it to respond to positive or even negative developments.

Only the Somalis themselves can achieve national reconciliation, therefore the Commission will maintain its even-handedness. Nevertheless the Commission will continue to play an advisory and supportive role to the peace process, promoting dialogue among the concerned political entities as well as encouraging regional peace initiatives.

r) Sudan

EC formal assistance could not be implemented in the Sudan since March 1990, due to concerns about lack of respect for human rights and democracy, and to the civil conflict. In November 1999, the EU and the Sudan engaged in a formal Political Dialogue, aimed at addressing those concerns. In December 2001, the two parties agreed on the need topursue and intensify the Dialogue, in the framework of Article 8 of the Cotonou Agreement, while at the same time aiming at gradual normalisation of relations, conditional upon progress with the commitments for 2002 agreed with the Government during the EU Troika to Khartoum in December 2001.

The Sudan, the biggest country in Africa, has been confronted with a civil conflict which started in the mid fifties and has profoundly divided the country. Its consequences have been extreme: it is estimated that two million people have died since 1983; more than fourmillion have been displaced; livelihood and cultural identities have been destroyed; the environment is being degraded; human rights violations have been massive; many regions of the Sudan have been marginalised. Consequently, large segments of the population have lost their capacity to cope themselves with their livelihoods, while more than two generations have lost their chance for education. Serious opportunities for peace now exist, and there is an increased international focus on the Sudan. On 20 July 2002, a framework for a peace agreement was signed by the Government of Sudan and the Sudanese People Liberation Movement/Army (SPLM/A) in Machakos, Kenya, within the IGAD-led process reinforced by international observers.

Open-ended negotiations started on 12 August 2002 to achieve a comprehensive peace agreement, which was finally signed on 9 January 2005 That is the background against which this Country Strategy has been prepared. It is centred on supporting the quest for a just peace, as well as addressing root causes of the conflict, while recognising that democracy, good governance and the improvement of human rights must be addressed if peace is to be made sustainable. For this reason, the response strategy remains appropriate, and indeed would be even more effective if and when a peace agreement is signed.

Because of the context of the Sudan, the strategy should address basic needs at local levels. The 9th EDF is based on an indicative allocation of 45 million € (envelope A) and 63 million € (envelope B)2. The EC Response Strategy will focus on two main sectors: Food Security and Education, targeting the resettlement of IDPs with a strong element of capacity-building for Governance. It could also be oriented for demobilisation, disarmament and reintegration operations, including mine clearance, training of the security forces and other actions for which provision is made under Article 11 of the Cotonou Agreement. In addition, other issues could be addressed such as human rights, good governance, and the rule of law; direct support to the peace process and to peace building initiatives, and the strengthening of civil society and health.

The strategy will be implemented throughout the Sudan, with agreed modalities for its implementation in different areas and States. The geographical concentration has been based on assessed needs combined with the effects of EC support on the quest for peace. Continuity with and complementarity to humanitarian assistance provided since 1990 has been given high importance, in particular with regard to past and present ECHO assistance. Because of the extreme complexity and volatility of the situation in the Sudan, the strategy will be implemented flexibly and gradually, with adjustments to be made upon operational and mid-term reviews. Upon signing of the CSP, detailed arrangements will be agreed for geographical concentration and, in the focal sectors, for government undertakings and intervention indicators. the main aim of the report I to provid

Excerpt on Energy

Other major development finance agencies such as the World Bank and African Development Bank are blocked from lending due to large unresolved arrears. Nevertheless, the Government has been able to attract important amounts of capital for public investment, mainly in the energy sector, from the Arab development funds, IDB, OPEC fund, China and Malaysia,

One objectiveof the European Investment Bank is the expansion and upgrading of infrastructure such as telecommunications; energy production, transmission and distribution, water production, distribution and sewerage.

Appendix 3: Executive Summaries of Poverty Reduction Strategy Papers (PRSPs)

a) Burkina Faso

The primary lesson it is important to draw from the implementation of the Poverty Reduction Strategy Paper (PRSP) in the 2000-2002 period is that the strategy must be approached from a structural perspective. That is, combating poverty must be regarded as a long-term strategic objective. It is from this same perspective that one should read the findings of the recent surveys and studies on poverty in Burkina Faso.

Of course, the major quantitative objectives for the period under review could not be attained in full for various reasons relating to natural conditions, the subregional environment, and cumbersome administrative and procedural requirements that continue to pose obstacles to the judicious use of financial resources. However, the fact that the public administration and the private sector, as well as civil society and bilateral and multilateral cooperation authorities, wholeheartedly support the Poverty Reduction Strategy Paper (PRSP) as a unique reference point for guiding development raises highly promising prospects.

The Government of Burkina Faso is well aware of this important attribute of the PRSP and intends to create conditions to ensure that, at each successive stage of PRSP implementation, tangible results are achieved that genuinely benefit the poorest population groups. This desire should be reflected in the following:

• ***First,*** the completion of the economic and structural reform measures aimed at creating an environment favorable to business, competition, and private investment. To this end, the Government will implement the "performance contract" initiative with private sector stakeholders;

• ***Second,*** more intensive mobilization and more efficient and effective use of financialresources. As regards resource mobilization, dialogue with the Technical and Financial Partners (TFPs) in keeping with the spirit of Rome on the harmonization of procedures will be strengthened in order to achieve broad participation in budgetary support, on the one hand, and internally in efforts to continue improving tax collections, on the other hand. As regards the effectiveness of resource utilization, budgetary management will be strengthened and a focused review will be initiated of the constraints on and limits to economic growth with a view to making it more intensive;

• ***Third,*** increasing the focus of and speeding up reforms in the social sectors. The most recent survey on household living conditions continued to highlight the decisive role played by the social sectors in poverty trends. Indeed, it is duly noted that these sectors, in particular education and health, are benefiting from substantial resources. However, it is also in these sectors where progress is slow. The fact of the matter is that the persistence and intensification of the social deficit partly explain the current poverty situation. Redefining the concept of basic education, and making this level of education mandatory and free, as well as improving health services and strengthening the fight against HIV/AIDS, continue to be the Government's primary and constant concerns;

• ***Fourth,*** a more clearly delineated partnership with civil society organizations. These organizations have played an effective role in the process of revising the Poverty Reduction Strategy Paper (PRSP) and have comparative advantages in various domains (literacy training, community development, health, etc.). The Government will introduce performance contracts with these organizations in order to ensure greater cohesiveness between their activities and the PRSP priorities.

In 2004-2006, the resources we devote to combating poverty will have to be intensified in order to achieve greater results. We wish to take this opportunity to congratulate all those who made valuable contributions to the process of revising the Poverty Reduction Strategy Paper (PRSP) and to reiterate our profound gratitude to all the development partners for their steadfast support.

Excerpt on Energy

The quality of the residence, which brings together a number of components that make the dwelling comfortable or uncomfortable, is analyzed from a number of different perspectives: the kind of walls, floor, and roofs, the method of wastewater disposal, the type of toilet, the presence of electricity, and the type of energy used for cooking. For this human development indicator, the divide between cities and villages is enormous.

b) Cape Verde

This document describes the growth and poverty reduction strategy (GPRS) the Government of Cape Verde intends to implement during the period 2004-2007. The approach used to design the strategy considers that the GPRS should be at the center of public policies designed to fight poverty by promoting economic growth, with strong involvement of the private sector. Three levels are thus emphasized: (i) global level (governance, macroeconomic policy); (ii) sectoral level, by means of specific programs targeting the social sectors with greatest impact on poverty; and (iii) regional and local level, by taking advantage of participation and of the greater effectiveness of decentralizing policies in fighting poverty.

The GPRS is part of a broader strategic planning exercise that has been under way in Cape Verde and has as main pillars the Grand Options of the Plan 2002-2005 (GOP) and the National Development Plan (NDP). The link between the NDP and the GPRS ensures global coherence of the planning instruments, thus facilitating management and monitoring of the various programs, and avoids duplication of efforts and procedures. On the other hand, both the NDP and the GPRS include the same sectoral programs, thus guaranteeing coherence between the global growth and poverty reduction goals on one hand, and the sectoral policies, on the other.

Further, through the GPRS, growth and poverty reduction policies become more visible on the national budget, thus lending more transparency to the allocation of public resources on a sectoral and regional basis, according to established policy objectives. A budget model is currently being developed, following a program approach. The model embodies a multi-year perspective by means of a Medium Term Expenditure Framework (MTEF) at the global and sectoral levels. The MTEF will be the appropriate tool for allocating public financial resources according to priorities set forth in the GPRS.

Growth, employment, and poverty. Over the past 15 years, the Government has implemented a strategy based on strong and sustained economic growth, anchored on the private sector and integration of Cape Verde in the world economy. Private investment – especially external private investment – played a key role in the process by replacing public investment, which dominated until then. The tertiary sector became dominant in the productive structure, supported by strong growth in tourism, as well as transports, banking and trade. The primary sector moved slowly. With the growing rural population, and considering that agricultural incomes play a key role in the survival of one quarter of the labor force, the weak performance of the primary sector had a crucial negative impact on the income and poverty risks facing rural workers.

The economic acceleration of the past decade led to the creation of jobs and their more balanced distribution in terms of gender. The result was a reduction in male unemployment, even though female employment also grew, especially in the informal sector. However, despite the positive impact on employment, the economic growth failed to reduce relative poverty.

Poverty profile. Relative poverty increased significantly in Cape Verde during the past decade. The poverty profile shows that: (i) extreme poverty is mostly found in rural areas, although it has also increased in urban areas; (ii) poverty is more likely to occur when the head of the household is a woman; (iii) poverty increases with family size; (iv) education significantly affects poverty; (v) the predominantly agricultural islands of Santo Antão and Fogo have the most poverty; (vi) unemployment affects the poor more than the non-poor; (vii) agriculture and fisheries workers are more likely to be poor than those in other sectors.

Income inequality increased significantly during the past decade. The economic acceleration was accompanied by deep structural change in the economy, with services coming out on top. This situation had an important impact in terms of resource allocation among the sectors and on factor output, and, thus, on income and wealth distribution, on a national level, as well as within each island. On the other hand, the strong expansion in income in sectors such as tourism and other services worsened the imbalances in income distribution. Increasing demographic pressure, combined with erosion of agricultural soils, led to a negative impact on rural per capita incomes, thus also contributing to increase inequalities in income distribution.

Introduction of the Value Added Tax (VAT) contributed to increase the progressive impact of indirect taxation. As for direct taxation, increased poverty means a heavier tax incidence as proportion of income. This trend is more evident when considering taxes on property and capital income as compared to taxes on income and pensions, due to the larger weight of the former types of income in the income structure of the more well off.

Overall, personal income taxes are progressive, despite some regressive occurrences, such as specific deductions in personal income taxes resulting from significant differences in specific deductions enjoyed by wage earners and pensioners. Causes of poverty relate essentially to living conditions in rural areas and to the low employability of the poor. The combination of the nature of Cape Verdean agriculture, the high population growth rate, and the random nature of the climate, explain the rural stagnation and low incomes. In fact, this process may aggravate soil erosion, which reduces their productivity and availability.

To overcome the lack of resources in Cape Verde, the poor turn to migration and to the informal sector. At first, migration led Cape Verdeans abroad, but later, facing increasing difficulties in the host countries, they also started moving to the urban areas within the country. A clear evidence of this is the increase in population recorded in the city of Praia, with resulting pressure on sanitation, housing, education, and health facilities. The FAIMO have become the main safety net in rural areas. Subsistence animal husbandry also plays a key role in rural areas, as it represents a security factor against the crises that follow periods of drought. In urban areas, informal activities are the main way out for many families, as indicated by the surge in the informal economy. Women play a key role in this area, leading to a reduction in female poverty during the 1990s.

Policy guidelines and the growth and poverty reduction strategy. The Government of Cape Verde envisages an all-around poverty reduction policy, covering macroeconomic policies (budget, monetary and exchange rate), public management and governance policies, as well as sectoral and microeconomic policies targeting the poor. The GPRS is built around a set of basic policies from which are derived five strategic pillars. The basic policies are: (i) growth and macroeconomic stability policy; (ii) decentralization policy; (iii) employment policy, including integration of the FAIMO; (iv) agriculture development policy; (v) policy of maximizing the impact of productive sectors with a multiplier effect on employment; (vi) income distribution and social protection policy, and (vii) environmental policy. The strategic pillars set forth the various forms of public intervention at the central and local level, using a combination of programs and policy measures. The five pillars are: (1) Promote good governance, reinforcing effectiveness and guaranteeing equity; (2) Promote competitiveness to foster economic growth and employment creation; (3) Develop and upgrade human capital; (4) Improve and develop basic infrastructure, promote land use management, and protect the environment; (5) Improve the effectiveness and sustainability of the social protection system.

The GPRS will be implemented in a context of macroeconomic stability. The reference scenario used to design macroeconomic policies for the coming three years assumes a 6.5% average growth rate per year. Projected growth will be driven essentially by private and public investment, and exports. Supply side sectors expected to be more dynamic are hotels, industry, energy, fisheries and construction.

Fiscal performance will be guided by prudence, in line with the overall policy of macroeconomic stability, sustainable growth and poverty reduction. As a result, the primary current balance will record a surplus for every year of the period, and average 3.8% of GDP for the period as a whole.

Monetary targets are in line with the goals of price stability and credibility of the exchange rate regime reflected in the upward trend in reserves relatively to imports of goods and services. It is also consistent with the principle of making internal resources available to finance the development effort. In this regard, credit to the economy as percentage of total credit is projected to expand.

The current account balance, including official transfers, is expected to evolve favourably in relative terms, leading to a significant reduction in the deficit, as a result of a relative stabilization of imports and an increase in exports during the period. The current account balance is expected to consolidate below double digits, reaching an average of –7.1% of GDP during the period. Gross international reserves are projected to reach 2.5 months of imports of goods and services.

Financing implementation of the strategy. Having become recently a middle-income country, Cape Verde will soon be faced with a change in external financing patterns: less concessional credit, less food aid and a higher proportion of aid in the form of credit. This will happen eventually, even if a transition period is allowed. Under these conditions, Cape Verde will have to rely more on internal sources of finance. The importance of these sources of finance is conditioned by the effectiveness of the tax system.

Foreign aid has actually been dropping during the last few years, as the proportion of multilateral aid increases.

At the same time, a switch from project aid to budget aid is taking place, at both the global and sectoral levels. The new approach calls for sweeping changes in budget management, thus raising its effectiveness. While retaining their own mechanisms and procedures, relevant services will be subject to new responsibilities with regards to budget management, but at the Sectoral level as well. Achievement of these goals will be monitored using performance indicators. Regular and transparent reporting will be another key feature of the new system.

The implementation system. The GPRS will be implemented within the public planning and budget systems, which are currently undergoing reforms. Implementation will be guided by strong participation of community-based organizations, decentralized entities, and private sector representatives. To support the process, the Government has decide to establish, starting with the 2005 national budget, a Medium Term Expenditure Framework (MTEF) and a number of Medium Term Sectoral Expenditure Frameworks (MTSEF) within key line Ministries. It is expected that such a set-up will improve: i) prioritising programs and projects that directly contribute towards the GPRS objectives and the sectoral objectives; ii) budgeting of programs and projects according to resources that can be mobilized; iii) medium term (three years) budget allocation according to priorities in order to reach the established development targets.

To implement these guidelines, the Government has begun a number of reforms to make the public management system more efficient, more reliable and more transparent. In this regard, a number of measures are being designed to implement the recommendations from the PER, CFAA, and CPAR exercises. The institutional framework for implementing the GPRS will consist of the existing administrative apparatus, after the necessary functional changes in structure are introduced. The National Poverty Reduction Board is an advisory body that includes the main stakeholders, drawn from public administration, the private sector, and civil society. At the central level, the General Directorate of Planning, supported by a Technical Secretariat, will be responsible for coordination and technical support. At the sectoral level, the GEPs within each line Ministry will prepare, monitor and evaluate priority programs and projects included in the strategy. At the local level, there will be Regional Poverty Reduction Boards, advisory bodies that will secure the input from local stakeholders.

Excerpts on Energy

The GPRS will be implemented in a context of macroeconomic stability. The reference scenario used to design macroeconomic policies for the coming three years assumes a 6.5% average growth rate per year. Projected growth will be driven essentially by private and public investment, and exports. Supply side sectors expected to be more dynamic are hotels, industry, energy, fisheries and construction.

The establishment of a regulatory system has met with various difficulties, in part owing to the fact that it is a completely new area to Cape Verde. At present economic regulation is guided by a framework law9 that defines the legal environment for regulation of economic and financial activities. Three agencies have been created and installed thus far: (i) a National Agency for Food Security (ANSA), to regulate the market for essential food products; (ii) an Economic Regulatory Agency (ARE), in charge of the areas of telecommunications, water, energy, passenger maritime transportation, and urban public transportation; (iii) a Civil Aviation Institute (IAC), responsible for civil aviation activities.

c) Lesotho

1. Poverty Reduction Strategy Paper (PRSP), a successor of the Policy Framework Paper (PFP) will serve as an enhanced framework for poverty reduction in the country. It will also serve as the basis for access to the Poverty Reduction and Growth Facility (PRGF), which has replaced the Enhanced Structural Adjustment Facility (ESAF) as the concessional lending arm of the International Monetary Fund (IMF). Furthermore, it will provide the context for a Country Assistance Strategy (CAS) under the World Bank´s International Development Association (IDA). The objective of the PRSP is to promote poverty reduction strategies that are: (a) country-driven; (b) results-oriented; (c) comprehensive; (d) partnership - based, and (e) framed within a medium term macro-economic strategy. To facilitate full participation and national ownership of the process, it is envisaged that a fully-fledged PRSP would be completed within a period of twenty months (November 2000 to June 2002). The Government's medium-term economic policies and strategies eventually will be set in the context of the comprehensive poverty reduction strategy.
Following the guidelines for formulating the I-PRSP as developed by the World Bank and the IMF staff, the I-PRSP describes the government's commitment to poverty reduction (Chapter 1); gives an overview of the poverty situation in Lesotho (Chapter 2) and outlines the main elements of its previous poverty reduction efforts (Chapter 3). Moreover, the document contains a matrix (Chapter 4) describing the macro-economic and structural adjustment polices pursued by the government over the coming three years.

Finally, the IPRSP describes the consultative process under which the full PRSP will be developed and a timeline for the process is outlined (Chapter 5). As the first step towards the preparation of the I-PRSP, the Government of Lesotho established the Poverty Reduction Technical Working Group (TWG) in February 2000. The TWG comprises representatives from government, private sector, non-governmental organisations, the National University of Lesotho, and the donor community. The process entailed meeting with the Deputy Prime Minister and Minister of Finance and of Development Planning. The Committee of Principal Secretaries and the Governor of the Central Bank - who constitute the Poverty Council - was also briefed by the Principal Secretary of the latter ministry in order to solicit and enhance government's commitment to the PRSP process.

The TWG was intended to go into a comprehensive consultative process, through sensitization briefings, workshops, media, etc. Complete coverage in this regard was constrained by limited time. However, the multi-sectoral structure of the TWG was considered sufficient in terms of sample poverty views and research orientation, at least for purposes of formulating the I-PRSP. The document would be subjected to scrutiny and acceptance by all stakeholders after which it would be forwarded to the IMF and the World Bank.

Excerpt on Energy
Poor performance of the state owned utility companies, particularly the telephone and electricity corporations has hampered private sector investment, discouraged foreign investors and resulted in backlogs of un-serviced customers.

d) Mozambique

The Government of Mozambique, in order to provide continuity to its strategy to combat absolute poverty, hereby presents the Action Plan for the Reduction of Absolute Poverty (PARPA) 2001-2005. The PARPA 2001-2005 explains the strategic vision for reducing poverty, the main objectives, and the key actions to be pursued, all of which will guide the preparation of the State.s medium-term and annual budgets, programmes, and policies. The PARPA 2001-2005 is also Mozambique's first Poverty Reduction Strategy Paper (PRSP).

This document is based on prior Government plans, including the *Lines of Action for the Eradication of Absolute Poverty* (1999), the PARPA 2000-2004 (Interim PRSP), and the *Government Programme* 2000-2004, as well as the sectoral and inter-sectoral plans, policies and strategies developed by organs of the State.

Production of the poverty reduction strategy has benefited from a process of consultations with relevant groups and segments of society outside the public administration. The sectoral strategies and programmes, the provincial poverty profiles, and the previous PARPA, all benefited from a broad and extended process of participation by civil society and external financiers. This document itself has also benefited in form and content from contributions resulting from the broad participation of civil society. Deeper discussions on the document as a whole, and on various parts, will continue, since planning is an iterative process of continuous improvement.

Given its medium-term focus, the PARPA is a rolling and dynamic programming instrument. This will enable the plan to incorporate new elements arising from changes in society and the economy. The key objective is the reduction of absolute poverty .will not be altered, but the tools, policies and targets may change as our knowledge of different variables improves. Therefore, the PARPA is an instrument defining policies and actions that will be periodically reviewed and perfected, involving an ongoing process of consultations.

The central objective of the Government is a substantial reduction in the levels of absolute poverty in Mozambique through the adoption of measures to improve the capacities of, and the opportunities available to all Mozambicans, especially the poor. The specific objective is to reduce the incidence of absolute poverty from 70% in 1997 to less than 60% by 2005 and less than 50% by the end of this decade

Excerpt on Energy

The availability of electricity is essential because it widens opportunities for initiatives and activities by which the people can improve their welfare. It is also critical factor in promoting the structural changes necessary for rapid economic growth. Investment in complementary economic activities and alternatives to agriculture (agro-industries, other branches of industry and services) depend on the availability of electric energy. These activities are necessary for raising productivity and production in the agricultural sector, and for absorbing the labour surpluses that will arise in agriculture as productivity increases.

e) Rwanda

The Government of Rwanda strongly believes in the right of all its people to live a life free from poverty, hardship, oppression and insecurity. Rwanda's Government is committed to securing for all its citizens a full range of social, economic and political rights and to working with its people to reduce poverty and exclusion. Since the war and genocide of 1994, we have achieved considerable progress in economic, political and social recovery by adopting radical reforms. We now need to develop a coherent strategy for sustainable development and poverty reduction, avoiding the economic stagnation which characterised the past.

This document presents Rwanda's strategy for poverty reduction and economic growth. It has been developed through a national consultative process, in which the priorities of the poor have been addressed and technical analysis has been used to develop a set of priority actions. It will form the basis of our national planning effort over the next decade, guiding Government's expenditures and other actions. It will also provide a framework within which communities, the private sector, civil society, and external
donors can form a partnership to reduce the acute poverty and deprivation of our people. It is not a blueprint, but a living document, and will be updated every two years to take into account sector strategies, which are being developed.

Priority areas
Through extensive national consultations, six broad areas have been identified where action is to be taken on a priority basis. Ranked by importance, these are:

- Rural development and agricultural transformation
- Human development
- Economic infrastructure
- Governance
- Private sector development
- Institutional capacity-building

Excerpt on Energy
Science and Technology teaching and research are important public goods but have for a long time have not been emphasised enough due to poor teaching and under-funded research. Science teaching at all levels of education will form the heart of the education system. The Government is introducing a programme in Science and Technology, including projects on medical applications of local biodiversity, agricultural processing and energy.

f) Malawi

Poverty in Malawi is widespread, deep and severe. According to the 1998 Integrated Household Survey1, 65.3 percent of the population was poor, or roughly 6.3 million people. Within this figure, about 28.7 percent of the population were living in extreme poverty. The level of inequality is well illustrated by the fact that the richest 20 percent of the population consumed 46.3 percent while the poorest 20 percent consumed only 6.3 percent of total goods and services. Consumption was also more unequally distributed within urban areas where the Gini coefficient2 was 0.52 as opposed to 0.37 for rural areas. The key causes of poverty are limited access to land, low education, poor health status, limited off- farm employment and a lack of access to credit. Sectoral analysis of poverty shows that social, human capital and income indicators are very poor. In 1998, about 52 percent of the poor were female and females headed around 25 percent of households. The literacy rate was low at 58 percent where female literacy rate was at 44 percent. Education attainment, defined as completion of Standard 8, was only 11.2 percent for adults aged 25 years and above and only 6.2 percent for women.

The national gross enrolment ratio was estimated at 132 and the pupil to qualified teacher ratio was 114, leading to overcrowding in schools and lower quality of education. In terms of health indicators, life expectancy at birth has dropped from 43 years in 1996 to 39 years in 2000. In 2000, infant and under-five mortality rates were estimated to be 104 and 189 deaths per 1,000 live births, respectively. The maternal mortality rate in 2000 was 1,120 deaths per 100,000 live births 3, a rise from 620 in 1990.

The 1998 Integrated Household Survey demonstrated that subsistence agriculture remained the main source of income for the rural poor, accounting for 63.7 percent of income. Notably, income from agricultural sales was *not* the most important source of cash income in rural areas. The major source of *cash income* for Malawian households was wage income, which contributed about 13.0 percent of income for the rural poor. However, there was limited participation in the cash economy by the poor.

Lessons from Past Experience

Since 1981, Malawi has implemented a series of policy interventions through World Bank and IMF backed Structural Adjustment Programmes (SAPs) in order to address structural weaknesses and adjust the economy to attain sustainable growth. From 1994, these interventions have been complemented by the Poverty Alleviation Programme (PAP), which emphasises the need to raise national productivity through sustainable broad-based economic growth and socio-cultural development. Despite these interventions, poverty has remained a reality for the majority of Malawians. Inconsistent implementation of the SAPs led to only short-lived economic recovery and failed to create sustainable broad based growth. Further, many of the high costs of adjustment were borne by the poor. Despite some successes, the PAP suffered from the absence of a well-articulated action plan to ensure a holistic approach to implementation. In particular, there have been inadequate linkages to the Budget, little prioritisation and a lack of target setting.

The Malawi Poverty Reduction Strategy

To achieve meaningful poverty reduction and learn lessons from this past experience, the process to develop the Malawi Poverty Reduction Strategy Paper (MPRSP) was initiated. The Malawi Poverty Reduction Strategy (MPRS) outlined in the MPRSP is the overarching strategy that will form the basis for all future activities by all stakeholders, including Government. The MPRS is the product of a highly consultative process involving a broad range of stakeholders and represents a consensus about how Malawi can develop and achieve its core objective of poverty reduction.

The overall goal of the MPRS is to achieve "sustainable poverty reduction through empowerment of the poor". Rather than regarding the poor as helpless victims of poverty in need of hand-outs and passive recipients of trickle-down growth, the MPRS sees them as active participants in economic development. The MPRS also emphasises prioritisation and action.

The MPRS is built around four pillars. These pillars are the main strategic components grouping the various activities and policies into a coherent framework for poverty reduction. The first pillar promotes rapid sustainable pro-poor economic growth and structural transformation. The second pillar enhances human capital development. The third pillar improves the quality of life of the most vulnerable. The fourth pillar promotes good governance. The MPRS also mainstreams key cross cutting issues such as HIV/AIDS, gender, environment, and science and technology.

Sustainable Pro-Poor Growth

Pro-poor growth is economic growth that involves and benefits the poor. It is a prerequisite for broadening income distribution and generating employment. The most fundamental challenge for the pillar is to offer the poor an opportunity to generate their own incomes, whilst providing the medium and large-scale private sector an enabling environment for investment. This will be achieved through the promotion of specific sectoral sources of pro-poor growth, and the creation of an enabling environment for pro-poor growth.

The key specific sectoral source of growth is agriculture, although efforts will be made to diversify, especially through Micro, Small and Medium Scale Enterprises (MSMEs), into natural resources, manufacturing, tourism and small-scale mining. In agriculture, the focus is on the provision of necessary services and conditions to farmers for increased incomes. This involves interventions ranging from availability of inputs through improved production technologies and value addition to marketing. These interventions will, where, possible be targeted at farmers' clubs, associations and co-operatives. In natural resources, community-based management will be promoted in order to ensure conservation and sustainable utilisation of natural resources as an additional off-farm source of income. As regards MSMEs, emphasis is on creating an enabling environment for the development and operation of MSMEs.

The MPRS reorients industrial and trade strategies to ensure increased contribution of the manufacturing, tourism and small-scale mining sectors to GDP. Deliberate attempts will be made to develop sector-specific clusters and to attract foreign capital in these sectors.

The key factors that will contribute to an environment conducive for pro-poor growth are macroeconomic stability, access to credit, and improved rural infrastructure. Efforts will also be made to improve enabling infrastructure, strengthen trade and investment arrangements and review taxation policy. Macroeconomic stability is a prerequisite for private sector development and economic growth.

Access to affordable credit is one of the most important factors affecting production and therefore income of the poor. The goal in micro- finance is therefore to promote the development of a sustainable micro- finance industry. Under rural infrastructure, the key issues are to ensure rehabilitation and maintenance of existing infrastructure, and to increase investment. These issues are common to rural feeder roads, rural water supply and sanitation, rural electrification and rural telecommunications.

The MPRS refocuses resources on other enabling infrastructure development by giving priority to maintenance and rehabilitation of facilities, outlining selective investments in new facilities, promoting greater participation of the private sector, encouraging cost recovery and guaranteeing long term financial support for maintenance and rehabilitation. This applies to the core road network, power, telecommunications and broadcasting. Finally, the MPRS will further widen the tax base to facilitate the lowering of tax burden on the enterprise sector. Tax relief and incentives will be rationalised and corporate tax will also be reviewed.

Human Capital Development

The MPRS recognises that human capital is key to poverty reduction in Malawi. A healthy and educated population leads to increased productivity, better income distribution and a generally improved standard of living. The overall goal of the pillar is to ensure that human capital of the whole population is developed to fully participate in the socio-economic development of the country. This will be achieved through the provision of basic education, technical, entrepreneurial and vocational education and training (TEVET), an Essential Healthcare Package (EHP), and the promotion of good nutrition.

Macroeconomic and Expenditure Framework

Macroeconomic stability is a precondition for economic growth and poverty reduction, and requires fiscal discipline and tight monetary policies. Prudent fiscal management requires that Government spends within its means, and therefore that expenditure requirements are balanced with resources available in a stable macroeconomic environment. Economic instability in the past has been characterised by high inflation and interest rates and an unstable exchange rate. This has exacerbated poverty since inflation erodes purchasing power, particularly of the poor, and acts as a disincentive to savings and investment. High interest rates make credit inaccessible to the poor and further discourage investment. In order to rectify this, Government will adopt strong fiscal, monetary and external policies. In terms of fiscal policy, further efforts will be made to improve public expenditure management, strengthen the independence of the Reserve Bank of Malawi (RBM) and accelerate the reform of the parastatal sector.Macroeconomic projections suggest that the resource envelope consistent with a stable macro-economic environment will be K41.3 billion during 2002/3, K44.0 billion in

2003/4 and K50.3 billion in 2004/5. These projected resource envelopes are deliberately based on realistic assumptions based on past experience and technical knowledge. This resource envelope is then linked to the costs associated with the MPRS. Three types of costs are presented: statutory, statehood and MPRS. Statutory activities are by definition those that have to be funded and cannot be scaled down. Statehood activities do not directly reduce poverty, but are essential in any country as the basic activities that enable the functioning of state by promoting and protecting national integrity, security and leadership. As with any other resource allocations, these activities must have a hard budget constraint. Any extra-budgetary expenditure on statehood activities automatically necessitates a reduction in MPRS expenditure. MPRS costings are the core of the costing framework and are based on the estimated cost of each individual MPRS activity to be implemented by or through Government.

Where possible, unit cost analysis was used to link output targets with costs.

MPRS Implementation, Monitoring and Evaluation

The implementation of the MPRS will involve all stakeholders4. However, the responsibility for overall co-ordination of implementation will rest with Government, and in particular, the Ministry of Finance and Economic Planning. Crucial to the success of the MPRS is the need to implement **only** the MPRS. The strategy has been designed to be comprehensive and has been costed so that it is in line with the resources available. To be implemented, the MPRS must at all levels be translated into the Medium Term Expenditure Framework (MTEF) and the Budget, and that Budget itself must be fully implemented.

Monitoring and evaluation of the MPRS implementation is key to the achievement of the goals of the MPRS. MPRS implementation will be monitored using various indicators provided in the action plan for each component of the MPRS. Monitoring and evaluation of these various levels of indicators will take place at national, district and local levels. This system will involve all interested stakeholders at each of these levels, with overall co-ordination provided by the National Economic Council. District- level monitoring and evaluation systems are currently being designed and will be reviewed and fully integrated after the first annual review process.

The monitoring and evaluation system will assist in the annual review of MPRS. This will take the form of stakeholders' workshops and dissemination of reports on the review process and the revised MPRSP. Annual reviews will be complemented by a comprehensive review process every three years. This comprehensive review is to be more like the initial MPRS Preparation Process, involving District Workshops, Thematic Working Groups and a complete redesigning of the MPRS.