THE REPUBLIC OF UGANDA

MINISTRY OF WATER AND ENVIRONMENT

PUBLIC POLICY AND FINANCING FRAMEWORK FOR THE ECOSYSTEM BASED ADAPTATION IN THE MOUNTAIN ELGON ECOSYSTEM

February 2015

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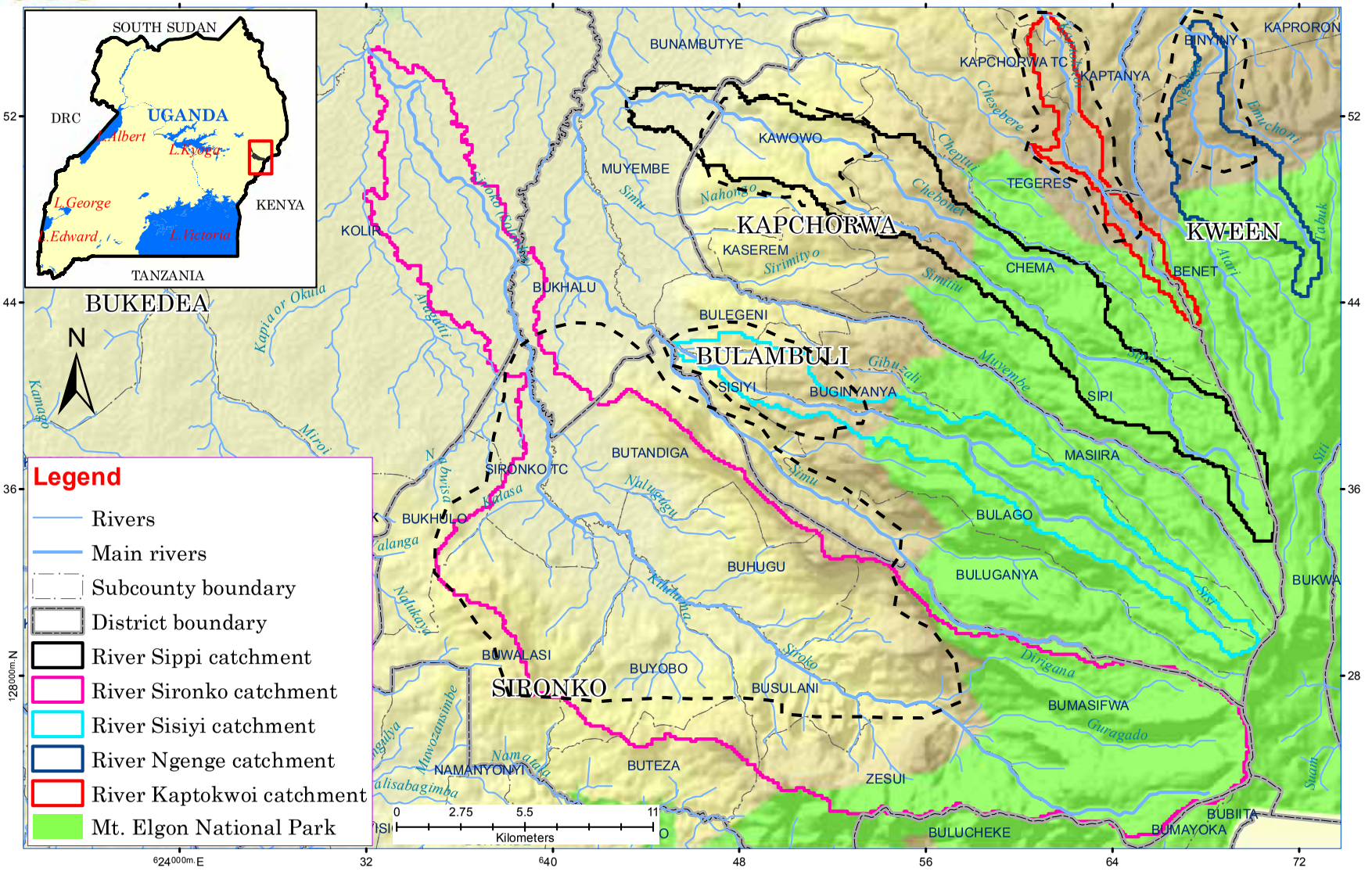
Mountain Elgon Ecosystem EbA Micro-Catchments



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ABBREVIATIONS

BFP	Budget Framework Paper
CBO	Community-Based Organisation
Co_2	Carbon dioxide
DDP	District Development Plan
EbA	Ecosystem-based Adaptation
ENR	Environment and Natural Resources
LGDP	Local Government Development Programme
MFPED	Ministry of Finance, Planning, an Economic Development
MAAIF	Ministry of Agriculture, Animal Industry and Fisheries
MTEF	Mid-Term Expenditure Review
MWE	Ministry of Water and Environment
NDP	National Development Plan
NEMP	National Environment Management Policy
NGO	Non Government Organisation
USAID	United States Agency for International Development
SIP	Sector Investment Plan
VAT	Value Added Tax
WFP	World Food Progamme

ACKNOWLEDGEMENT

This report on public finance and policy analysis (PFPA) is a result of the consultancy work involving a wide range of stakeholders who participated in identification of opportunities, gaps and entry points for the integration of ecosystem-based adaptation (EbA) into budget and policy processes in Uganda.

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Contributions to this report were also received from the district councillors, elected officials – who influence policies –, directors and commissioners from government ministries, managers of NGOs and officers linked to EbA work from the Mt Elgon districts (Kween, Kapchorwa, Sironko and Bulambuli).

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EXECUTIVE SUMMARY

Ecosystem services provide adaptation strategies to help people adapt to the negative effects of climate change at local, national, regional and global levels. Mountain ecosystems, particularly in Uganda's Mt Elgon region, are particularly vulnerable to climate change impacts. The increase in the use of ecosystem-based adaption (EbA) as a viable form of climate adaptation partly reduces climatic impacts. One way to minimise climatic hazards is to secure more funding for ecosystem-based programmes and to integrate EbA into the national and district-level sector policies and finance frameworks.

The report on policy analysis contributes to identifying existing gaps and opportunities and opening up priorities to feed into existing public sector finance and policy process. By doing this, it aims at getting ecosystem-based approaches considered routinely as part of the adaptation options.

The rationale for the analysis was threefold: to build a case for EbA at national level; to inform the stakeholders (at national and local government levels) about the available opportunities, gaps and entry points to integrate EbA approaches into existing public sector finance and policy processes (ongoing and emerging), in order to foster measures geared towards developing an EbA policy and financing framework for future use in the country; and to cover the policy needs and revenue options for EbA scale-up within Uganda's Mt Elgon ecosystem region and beyond.

The Financing Framework for EbA – Opportunities and Gaps

Budgetary process

The report presents an analysis of the budgetary process, characterised by relative transparency, openness and broad participation. It highlights the gaps, opportunities and entry points at local and national levels, in government framework processes, such as the writing and drafting of financing documents, including the Budget Framework Papers (BFP), mid-term reviews, the Sector Investment Plan (SIP) and ministerial policy statements.

Decentralisation governance

The decentralisation system of governance enhances the efficiency of resource allocation in line with local priorities. The system provides for the transfer of functions and services from the central government to local governments and enables district authorities to make decisions regarding the utilisation of funds – decisions that were hitherto made by the central government. Local governments in Uganda enjoy about 10 per cent flexibility in non-salary conditional grant allocations to recurrent sector budgets and sector budget lines.

They also have discretionary planning and budgeting powers. However, local government plans and budgets need to fit into national priorities and policies. The EbA project could utilise the opportunities inherent in the decentralisation process by suggesting emphasis of expenditure on EbA strategies.

Local government development programme

To access funds from the local government development programme (LGDP), district local authority members usually have a three-year rolling District Development Plan (DDP) in place and expenditures are in line with the approved annual work plans and budgets. An assessment of local government performance verifies local government compliance with the overall legal and policy framework and sector policies and guidelines. The assessments determine local government access to development grants under LDGP and are crucial for obtaining financing, such as for EbA implementation.

Unconditional grants

The allocation of unconditional grants presents possibilities for financing EbA activities because grant transfers are formula-based and rarely cover more than operational expenditures. To work with the discretionary powers of local governments in the allocation of resources, it is important that EbA priorities are accurately identified as part of the local government budgetary process and are fed into the budgetary process at national level.

Gaps, opportunities and revenue generation

Economic instruments shape and manage people's behaviour into a desired norm and generate revenues in economies. Examples of revenue-generating instruments include tradable permits, deposit refunds, performance bonds, taxes, earmarked taxes and funds, user fees, subsidies, tax breaks and administrative prices, or specific instruments such as emission permits linked to gases like carbon dioxide (CO_2) and development quotas for tourism construction.

The climate change policy, Land Act and the National Environment Management Policy (NEMP) do not offer adequate advice on the use of such instruments to facilitate community behaviour towards EbA. In this regard, the EbA project could carry out research and offer advice on ways to inform the stakeholders about policies for the effective use of economic instruments for sustainable land management and of district environment committees for improved EbA.

Direct expenditure

With regard to direct expenditure, the Government of Uganda can influence producer and consumer behaviour by channelling expenditures directly into the behaviour they want to encourage. This can be achieved through directly supporting programme/project operations. With regard to the climate change policy, environmental policy and Land Act, the Uganda government could direct the budget towards programmes and projects directly concerned with carrying out ecosystem protection and restoration in the Mt Elgon areas. The EbA project could persistently utilise any opportunities which open up for contributing to and supporting new projects aimed at improving EbA activities.

Green procurement

Green procurement is another opportunity available for EbA work. Government can opt to spend its routine procurement expenses on goods and services that support EbA improvement goals. As government resources are inadequate, the EbA project could capitalise on the opportunity by continuing to support efforts aimed at improving adaptation, such as promoting the establishment of commercial tree nursery beds and river bank plantations.

Research and development

Research and development presents another area where the Ugandan government can allocate budgetary expenditure to specific environmental goals, such as sustainable land management for EbA related work.

The EbA project can also take advantage of the opportunity to provide funds for research and development contributing to government programmes.

Moral suasion

Moral suasion and education programmes are based on the premise that people behave in environmentally harmful ways because they lack information and knowledge and that if they have good information they will do the 'right' thing. Governments can encourage behavioural change that is consistent with ecological goals by funding programmes designed to provide information and education to raise awareness. Evidence from the analysis indicates that some individuals mistake degrading the environment for utilising it, and thus require sensitisation. However, the support provided by the government for moral suasion in the Mt Elgon is inadequate and limited. The EbA project could utilise this gap by supporting EbA activities through moral suasion.

Regulatory instrument

Regulatory instruments are Acts and regulations passed to authorise the carrying out of legal mandates for change. Acts and regulations however are inadequate enforced. The evidence collected indicates the degradation of the environment resulting from lack of adequate enforcement and of people's continued cross-cutting of hills for settlement. This degradation has partly exacerbated fatalities from landslides in the community. According to one respondent, communities inhabiting risky areas believe that they are utilising natural land, and would prefer being advised on proper utilisation of such land to being evicted. The EbA project could explore ways to fill the gap in the relevant regulatory instrument since it is inadequately emphasised and even continue to emphasised awareness of best practises as promoted in EbA.

Institutional capacity

The institutional capacity to support the whole country is limited and inadequate, which hampers government efforts to promote change. In some instances, internal efforts to improve technical officers' skills and also increase their number are insufficient for coordinating the policies. Regarding the implementation of the climate change policy, the challenge is partly in attaining the required number of staff and improving the knowledge capacity in climate adaptation among stakeholders, particularly in the countryside.

Gender

Gender is another aspect where opportunities and gaps occur with respect to EbA integration into the policy and financing framework. In Uganda, despite the legal and policy rhetoric about the emphasis on gender concerns in ecosystem and environmental management, women continue to be marginalised partly owing to social norms, the gendered division of labour, gendered behavioural cultures, and gendered spaces. The recommendations for reducing gender inequality are presented in Table 1.

Table 1: Analysis of gender issues in EbA activities and what can be done to improve women's participation in Mt Elgon districts

Key gender concerns in EbA activities	Effects	Strategies
Inadequate knowledge of and skills in EbA concerning the gender dimension	Resource allocations do not address male and female concerns equitably at district level	Improving training of all sector heads, heads of departments and political leaders in EbA concerning gender issues, including equity budgeting
Low budgeting and allocation of funds to integrating EbA regarding the gender dimension	Inadequate EbA activities which also lack adequate integration of gender	Increase in budgetary allocation for EbA emphasising gender programmes
Inadequate capacity to conduct EbA activities related to integrating gender at sub-county level	Limited number of technical persons to spearhead EbA activities emphasising the gender mainstreaming process at sub-county level	Ensuring participation of district and sub-county staff in the generation and use of gender-disaggregated data • Engendering the data-collection tools • Improving training of community development officers in EbA concerning gender analysis
Inadequate number of EbA and gender focal persons as required at district and sub-county levels	Ineffective implementation of EbA activities concerning gender policy and strategies in districts	Creating a new position for EbA work at sub-county and district levels
Recruitment of few women in political and technical leadership positions	Marginalisation of women's issues in policies and administrative structures	Increasing opportunities for women to occupy political and administrative positions through affirmative action

Other gaps and opportunities

The climate change policy is likely to cause positive change because several activities are already taking place and the implementation process of the policy seems to be proceeding as planned. However, as the formation and implementation of any policy considers the role and participation of the individual in implementation, individuals and communities in the Mt Elgon region require substantial capacity-building. The EbA project could utilise the opportunity to provide support, including human capacity training and accessing credit facilities. The role of the private sector can thus be improved in EbA.

In Uganda, the spending plans published in the annual budget may not always result in the stated level of funding being released to the relevant government spending agencies. For example, the four consecutive years (that is from 2011 and 2013) analysed, expenditure on climate-related work significantly deviated from the actual budget. The EbA project could take advantage of the gap in expenditure deviations and provide unwavering support to the EbA regions.

Last but not least, the evidence collected indicates lack of adequate funds and logistical resources (motorcycles, motor vehicles and human resources capacity). However, the feasibility of the land policy depends on the availability of the required resources, including personnel, material resources and technology. The EbA project could search funds and utilise the available resources in the remaining period of the project supporting communities, thus ensuring EbA integration into the financing framework.

1. INTRODUCTION

Ecosystem integrity can foster food security and prevent malnutrition in the agricultural sector.

1.1 Ecosystem-based Adaptation - Fostering Public Sector Policy and Budgetary Processes

Ecosystem–based adaption (EbA) is about a healthy, well-functioning, enhancing natural resilience to the adverse impacts of climate change and reducing the vulnerability of people. Management of the ecosystem offers a valuable yet under-utilised approach to climate change adaptation, complementing traditional actions such as infrastructure development. EbA uses biodiversity and ecosystem services as part of an overall adaptation strategy to help people and communities adapt to the negative effects of climate change at local, national, regional and global levels. Mountain ecosystem communities, particularly in Uganda's Mt Elgon region, are vulnerable to climate change hazards. The increase in the use of EbA as a viable form of climate adaptation partly reduces climatic impacts. One way to minimise climatic hazards is to secure more funding for ecosystem-based project work in the area and to integrate EbA into the national and district-level sector policies.

The report provides information on gaps and entry points to integrate EbA into the policy planning processes and budget financing framework. Government development sectors were identified as possible venues for possible opportunities and entry points. The development sectors include water and environment; agriculture; education; health; gender, labour and social development; lands, housing and urban development; and finance, planning and economic development. The report explains the linkages between the two sectors (health and agriculture) and the ecosystem but does not explain the rest as information can be found in many publications (Alberti, 2005; Hannon *et al.*, 2011). Regarding the health and the agriculture sectors, considerable evidence exists that point to the two sectors influencing human livelihoods.

The health sector is important for EbA strategies. This is because the ecosystem degradation and biodiversity loss may play a role in escalating the transmission of diseases such as malaria and certain emerging and neglected tropical diseases (Pongsiri *et al.*, 2009). Furthermore, in mountain ecosystems, households are dependent on the intactness of such ecosystems to provide the goods and services that are critical to ensuring a substantial portion of income (Gretchen, 2012), food availability (Yang *et al.*, 2013) and the related nutrition status (Uganda Nutrition Action Plan, 2011). Climate variability and rainfall patterns are also widely linked to waterborne diseases (Baguma *et al.*, 2014). Human activities such as land conversion for agriculture, clear-cutting of forests, the building of infrastructure such as roads and dams, and stone quarrying cause widespread ecological disruptions linked to certain communicable diseases (Pongsiri *et al.*, 2009; Molyneux *et al.*, 2008). In some EbA project areas, such as Kapchorwa district, there is a big stone quarry area, and the

impact it has had on the ecosystem and livelihoods since the commencement of quarrying is inadequately analysed for adaptation planning purposes.

Additionally, ecosystem degradation and biodiversity loss is linked to the rising incidence of emerging infectious diseases (Keesing *et al.*, 2010). The outbreaks of *Schistosomiasis*, a neglected tropical disease, are associated with ecosystem degradation, including deforestation, dam construction and overfishing (Molyneux *et al.*, 2008). The intact ecosystems, however, partly guarantee adequate water quality and supply for human communities, which can decrease the risk of diseases (Pattanayak & Wendland, 2009). The prevalence of such diseases can be investigated by using medical records for the EbA project areas to build up a case for integrating EbA strategies into the public sector policy and budgetary processes.

Ecosystem integrity is a vital prerequisite for food security and can reduce malnutrition in the agricultural sector. However, ecosystem degradation may threaten food availability and access and its adequate utilisation, which could exacerbate protein-energy malnutrition and micronutrient deficiencies. The United Nations World Food Programme (WFP) estimates that approximately 900 million people lack access to amounts of food adequate to meet their basic nutritional requirements and that almost all of them live in low- or middle-income countries (WFP, 2013; Ahmed *et al.*, 2012; Richardson, 2010). In Uganda, 19 per cent of the population were malnourished in 2006, and 38 per cent of children under five were stunted (Uganda Household Survey, 2006). This prevalence implies that about 2.3 million young children today are chronically malnourished. In addition, 16 per cent of children under five are underweight while 6 per cent are wasted, and 12 per cent of women are malnourished (Uganda Nutrition Action Plan, 2011).

1.2 Objective of the Report

The principal purpose of the report is to provide information on policy gaps and the entry points EbA can take advantage of in the public sector policy and budgetary processes. It is also to probe the conditions in which the identified gaps and entry points can be considered for planning and budgetary processes. Along with innovative policy analytical strategies, this could require a melding of social, ecological and economic approaches and tools. Determining policy gaps and the entry points of which EbA can take advantage is an exciting new field that is largely unexplored, with the possibility to open up a considerable number of opportunities, such as new funding for new and more EbA. It is an interdisciplinary area that has enormous potential applicability to public health, agriculture, nutrition and conservation. By incorporating social equity, resilience and cost-benefit implications, EbA activities provide information that is useful to policy-makers – particularly those in the ministries of finance, agriculture, health and environment.

This is an exciting new field that is largely unexplored, with the possibility to open up a considerable number of opportunities for the EbA project.

2. METHODOLOGY

The methodology focused on identifying existing policy opportunities to integrate EbA into the existing public sector finance and policy processes, including the use of information to secure future funding for EbA measures. Doing this could also lead to the ecosystem-based approaches routinely being considered as part of the adaptation options available at both national and local government levels. The rationale for the analysis was threefold:

a) To build a case for EbA at national level;

b) To inform stakeholders (such as local district officials, national-level policy-makers and persons concerned with the international ecosystem) about how to mainstream EbA approaches into existing public sector finance and policy processes (ongoing and emerging), in order to foster an EbA policy and financing framework for future use in the country; and

c) To identify the policy needs and revenue options for EbA scale-up in the Mt Elgon ecosystem and beyond, i.e. both nationally and internationally.

2.1 Scope of the Policy Analysis

The scope of the work included:

- Producing a detailed analysis of the current gaps in the natural resources sectoral policy by conducting an analysis of the policy, institutional and expenditure environment in Uganda;
- Identifying opportunities for EbA to feed into public sector policy and finance processes;
- Developing targeted products (e.g. methodologies) for use in the public sector policy and finance processes so as to make a case for EbA at national level (such as the documentary and the policy brief); and
- Developing guidelines and training materials on how to mainstream EbA into the policy and financing frameworks.

To deliver the key output, the consultant conducted the activities as follows:

- Reviewed the following key documents:
  - EbA project reports;
  - Progress reports – monthly, quarterly, annual and any other regular reports;
  - Project baseline survey documents; and
  - Other project documents as recommended by the Programme Management Unit (such as the Uganda Rainfall Forecast Reports, ACODE Climate Finance Reports and USAID Climate Change and Health Reports).
- Literature review of the existing policy and financing processes to identify gaps and entry point opportunities for EbA, including visiting libraries and internet sources.
- Interviewed key and purposively selected stakeholders to validate the gaps identified. The validation workshop was held in Jinja. The purpose was to identify possible ways to address the gaps and/or to explore identified opportunities to include EbA in the policy framework, as well as new ways to fund these activities.

2.2 Policies in the Report

Although several policies were identified (such as the National Forestry Act, National diversity plan, water Act and water catchment) in Uganda (see also EbA Project Report, 2014), three policies were considered because of time and financial constraints, and owing to having the same implementation structure. The following three key policy articles and sections were identified and analysed, as shown in Table 2.

Table 2: The EbA-selected relevant policies and laws in Uganda

Description	Relevant Natural Resource Policies /Laws	Relevant Articles/ Sections
Policy 1	Climate change policy	Chapter 4, Article 4.2.1 section on biodiversity and ecosystems
Policy 2	National Environment Management Policy (Mountainous and Hilly Areas Management) and regulations (part 2)	Section 3 to 17
Policy 3	Land Act (Cap 227)	Chapters 16, 43, 44, 45, 46

2.3 Policy Analysis Strategy

In Table 2, the information collected was considered under two aspects (effects and implementation of policy). The methodology was adopted to enable organising the information from key stakeholders. Approval of the methods was obtained after the the inception report was presented at a meeting. During the meeting, comments were received from stakeholders (national and districts members) and used to improve the approach. Similar methods are widely used in policy analysis studies (Salamon, 2002). The information gathered was sub-distributed into six analytical dimensions (effectiveness, unintended effects, equity, costs, feasibility and acceptability) (Swinburn *et al.*, 2005). The durability of the policy – i.e. the capacity of a policy to be sustained over time – was assumed to cut across all the six dimensions. To guide the policy analysis, specific survey questions were used (for more information, see Annex 1).

Effectiveness

The first element was used to analyse the success of the selected policy and its effectiveness at achieving its objective in the case of relevance to EbA. It was necessary to report a possible absence of effects, or negative effects of the policy, which could aggravate the impact on the ecosystem.

Unintended effects

The analysis considers the effects that are produced by implementing the public policy, but are unrelated to the objective pursued. This is because, given the diversity and complexity of human societies, it is impossible to control a policy to ensure that it produces only the desired effect and no other. Unintended effects could be positive or negative and could be produced in all kinds of areas. Effects on ecosystems that are unrelated could influence economic, political and environmental effects, or produce effects on social relations. These enable the identification of gaps and opportunities as entry points for EbA into the policy and finance framework.

Table 3: Dimensions of analysing natural resources sectoral policies/laws

Aspects	Analytical Dimensions	Survey Questions	
Effects	Effectiveness	What effect does the policy have on the targeted ecosystem problem?	
	Unintended effects	What are the unintended effects of this policy?	
	Equity	What are the effects of this policy on different groups?	
Implementation	Cost	What is the financial cost of this policy?	Durability
	Feasibility	Is this policy technically feasible?	
	Acceptability	Do the relevant stakeholders view the policy as acceptable?	

Equity

The aim of the equity dimension was to determine the different effects on various groups (categorised by age, gender, socioeconomic status, ethnicity, religion, residential location and disabilities) or whether policy could create, increase or correct inequalities in the distribution of the targeted problem (Milton *et al.*, 2011; Swinburn *et al.*, 2005; Tugwell *et al.*, 2010; Oxman *et al.*, 2009). The effects could create the basic information EbA can use as entry points into policy and budget framework. The analysis considered equity and not only general effectiveness because, often, public policies improve ecosystems in terms of the overall average, but at the same time could deepen social inequalities.

Cost

In pursuit of policy analysis considering financial costs, the cost incurred by government was investigated in implementing the selected policy. As policy can generate gains, it was also necessary to consider the costs for actors (Salamon, 2002). This is because these could influence the way in which stakeholders react to a given policy.

Feasibility

The feasibility dimension was used to analyse the technical feasibility of the policy, and was tied to a series of elements of varying character. Feasibility could depend on the availability of the required resources, such as the personnel, material resources and 'technology' providing entry points for EbA. It was also necessary to verify whether the selected policy was in conformity with existing legislation, considering the distribution of responsibilities between levels of government (municipal, towns, sub-counties).

Acceptability

Acceptability refers to how the policy is judged by stakeholders. Thus, acceptability was focused on subjective elements.

Also, as acceptability partly depends on factors external to the policy under analysis, the position of each stakeholder was determined by knowledge, beliefs, values and interests.

The analytical framework allowed obtaining an overview of the implications of the selected policy. However, only certain analytical dimensions were documented, depending on the context of the decision-making strategy, time and resources available. What mattered was considering each analytical dimension and the limitation the policy imposes, as these could provide information on the gaps, opportunities and entry points for EbA into policy and financing framework. All the elements associated with each analytical dimension were listed. The list of questionnaire items is presented in Annex 1. The analysis explored the climate change policy, the National Environmental Management Policy (on Mountains and Hilly Areas) and the Land Act.

2.4 Relationships of the Six Dimensions

In Figure 1, the relationship of the six dimensions is presented. The analytical dimensions adopted show how acceptability is influenced based on the assessment of the other dimensions. Inversely, the degree of acceptability for any policy has a bearing on its feasibility (Morestin, 2013): if stakeholders view a policy as unfavourable ('Acceptability' dimension), they take action to hinder its implementation ('Feasibility' dimension). However, depending on a policy's feasibility, the greater the risk, the greater additional costs its implementation involves. Finally, implementation conditions influence a policy's ability to achieve the intended objective collectively.

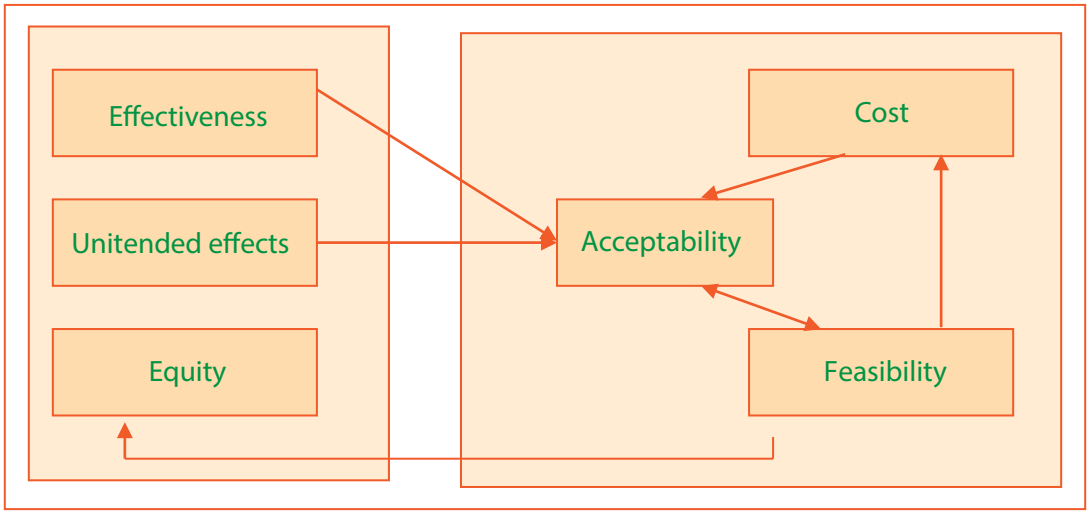

Figure 1: The relationship of the six analytical dimensions for identifying gaps and entry points for EbA. (*Source: Adopted from Morestine, 2013*)

2.5 Data Collection

The information was collected from 70 key and purposively selected respondents. This was partly due to the limited knowledge of policies, unavailability of policy information and interest in the subject in the Mt Elgon area. The questions were prepared in line with literature on ecosystem livelihoods (Yang *et al*., 2013; Bawa and Gadgil, 2012) and with other policy analysis studies (Salamon, 2002; Swinburn *et al.,* 2005). Testing of the questionnaire was done on 10 respondents, including the project team. Feedback from pre-tests was used to improve its application and efficiency. The questionnaire was administered personally to reduce the inaccuracies arising out of inconclusive responses and difficulties encountered in the course of interpreting questions (Smith and Kemp, 1998).

Greater time and effort were expended on the survey, but contributed to greater data accuracy and reliability. The respondents included the district leadership, such as the Chief Administration Officers, elected officials –who influence policies –, directors and commissioners from relevant government ministries, managers of NGOs and officers linked to environmental work from the Mt Elgon districts (Kween, Kapchorwa, Sironko and Bulambuli). The questionnaire was administered in group discussions, workshop and face-to-face interviews. Owing to complexity and the need for logical and analytical sequencing of policy information, the local community was represented by district council members.

Questionnaire items included requesting information on demographic background (age). The sample questions were as follows:

What are the effects of the policy under study (positive, neutral, negative) on the targeted climatic problem? How can the negative unintended effects be mitigated? Does the policy create, reinforce or correct social inequality (in gender or incomes)? Other details are available in Annex 1.

2.6 Prioritisation Approach of Data Collected

Techniques were used to prioritise issues for the integration of EbA into the policy and budget financing framework, including brainstorming sessions, expert consultations and surveys (Table 4). In the analysis brainstorming and expert consultations were used. It is important to note that the priority list adopted during identifying information for EbA entry into the policy and financing processes might be refined after its content has been analysed in great in-depth.

Table 4: Possible techniques that groups use for deciding priorities for integrating EbA into policy and budget framework

Prioritisation Technique	Description and References
Consensus decision-making	'A consensus represents a reasonable decision that all members of the group can accept. It is not necessarily the optimal decision for each member. When all the group members feel this way, you have reached consensus. This means that a single person can block consensus if he or she feels that it is necessary.' Reference: http://www.npd-solutions.com/consensus.html
Traditional voting	Given a list of important environmental issues, each participant is asked to vote, for example by: • show of hands. • secret ballot. • a democratic method, where each person is given a number of coloured stickers equivalent to the number of items that can be considered. With the entire issue list placed on a single board, each person places stickers beside their priority issues. People are allowed to distribute their dots as they wish (i.e. they can invest all their dots in a single issue if they feel that best represents their views). Issues are then ranked according to the number of stickers each received.
Nominal group methods	Participants are asked to choose a list of specific issues they feel are most important, and to rank them by relative importance. These rankings are collected from all participants, and aggregated. Reference: http://www.ryerson.ca/~mjoppe/ResearchProcess/841 The NominalGroupTechnique.htm

2.7 Presentation of Results

As the information from the data collection was in narrative form, the quantitative and qualitative data collected on each dimension was synthesised in a text. The rationale for this was to organise the data collected into coherent groups to enable the identification of gaps and entry points for EbA into policy and finance framework.

The exception to this principle of flexibility was the 'Acceptability' dimension, which required careful processing of the related data. Several options were compared, involving in particular choosing a policy's priority over others. A better overview consisted in summarising the information gathered on each dimension in the form of a scorecard (Table 5).

Table 5: Score board for policy analysis

Relevant Law	Effectiveness	Unintended Effects	Equity	Cost	Feasibility	Acceptability
Policy 1	++	-	+	+	++	-
Policy 2						
Policy 3						
Policy 4						
Policy 5						

The decision was made by comparing a heterogeneous array of results for six dimensions of varying nature. Each stakeholder involved in the decision-making process implicitly established the hierarchy of importance for the dimensions.

2.8 Comparing Policies

The purpose was to identify entry points and opportunities for including EbA into the policy and financing framework. The three policy options were compared, in particular through choosing the priority of policy over others for related EbA activities. In line with the consultancy purpose, the information gathered on each policy dimension was presented in the form of a scorecard (Table 6).

Table 6: Score board for comparing policies

Relevant law	Effectiveness	Unintended Effects	Equity	Cost	Feasibility	Acceptability
Policy 1	+	-	-	-	+	+++
Policy 2	+	++	+	+	?	+++
Policy 3	++	++	0	?	--	++

Note:

a) Policy 1 implies the climate change policy (Chapter 4, Article 4.2.1, section on biodiversity and ecosystems)

b) Policy 2 implies the National Environment Management Policy (Mountains and Hilly Areas Management) and Regulation (Par. 5)

c) Land Act (Cap 153), section/ Articles 16,43,44,46

d) +++ = Highly positive effect:

++ = Moderately positive:

\+ = Slightly positive

0 = Neutral

– = Slightly negative effect

– – = Moderately negative

– – – = Highly negative

? = Policy effect unclear

Determining the sign: Climate change policy

Effectiveness

The climate change policy is likely to cause a positive change because several activities are already taking place and the implementation process seems to have a favourable condition. However, as the policy formation and implementation focus on the role of the individual in the process of policy implementation individuals and communities in the Mt Elgon region (Lane & Hamann, 2003), the integration of EbA into the policy and financing framework will require substantial capacity-building. The sign attached to the effectiveness of the climate change policy is (+).

Unintended effects

The unintended effects could affect the integration of EbA into the policy and financing framework. Unintended effects occur because EbA-related policies are applied within complex systems characterised by multiple interrelated processes that interact in a non-linear manner and adapt to changes (Morell, 2005). As the evidence collected by the consultant indicates, the most prominent cases of unintended consequences of the climate change policy are likely to occur. The sign attached to unintended effects is (-).

Equity

The discourse on equity contains conceptual and ideological barriers as well as historical distortions that affect society in general, and are expressed in subtle ways, even among those most dedicated to overcoming barriers and implementing equity (Bakan & Kobayashi, 2000). As women tend to do more work (household chores or even tree planting) than men in most cases (Baguma *et al*., 2013), the integration of EbA into the policy and financing framework could require a big number of women compared to men. The sign attached is (-).

Cost

Government expenses on policies are reflected in national and local government budgets. However, the spending plans published in the annual budget may not always result in having the stated level of funding released to the relevant spending agencies (Tumushabe *et al.,* 2013). The impact would be that EbA integration into the policy and financing framework would have a small effect. The sign attached is (-).

Feasibility

The pre-existence of government institutions is an indication of the feasibility of the policy and a facilitating factor, if the policy can use the experience and structure of ministries, departments and units (Swinburn *et al*., 2005). Unfortunately, the existing institutional mechanisms have their own institutional objectives, which may not completely coincide with those of the policy. This problem does not arise when a new structure is created specifically for the implementation of a policy (Sabatier & Mazmanian, 1995). Integration of EbA into the policy and financing framework could be part of the government processes and be funded in a separate institution. The sign attached is (+).

Acceptability

Stakeholders are actors concerned with the objectives and implementation of a policy (Rychetnik *et al.,* 2002). The evidence collected by the consultant indicates that most stakeholders appreciate the ideas and issues related to climate change. Integration of EbA into the policy and financing framework would be advantageous because EbA activities relate to climate change. The sign attached is (+++).

The National Environment Management Policy Gaps in Policy: Determining the Sign

Effectiveness

The district environmental management arrangement is part of a broader decentralisation process and is intended to increase local ownership and improve the implementation of the environmental policy (Oosterveer & Van Vliet, 2010). The environmental policy involves difficult decision-making due to the need to balance competing interests. This is partly because offsets between different choices are necessary and result in winners and losers among local stakeholders, which calls for adequate ecosystem and natural resource management strategies, which, in turn, ensures value for money when EbA is integrated into the policy and financing framework . The sign attached is (+).

Unintended effects

The unintended effects of the implementation of the national management environment policy can be minimised by agreeing with the community, discussing the approach to use, sensitising the community, using the participatory approach, awareness-raising and the provision of incentives, e.g. energy, sustainable land and water management, and composting solid waste. Such are the items within EbA activities, which government could support along other policy needs and the financing framework. The sign attached to unintended effects is (++).

Equity

The evidence collected indicates that gender (women) is considered in recruiting members of environmental committees and that women are always at the forefront of handling environmental conservation activities, such as community tree-planting, in the Mt Elgon region. Despite the legal framework and policy rhetoric about emphasis on gender issues in ecosystem management, women in Uganda continue to be marginalised. Social norms, the gendered division of labour and gendered behavioural norms, as well as gendered spaces, all limit women's participation in decision-making that influences ecosystem management (Howard & Nabanoga, 2007). The integration of EbA-engendered activities into the policy and financing framework would benefit the community – as gender would be employed more. The sign attached is (+).

Cost

EbA involves costs to governments and individuals. The integration of EbA into the policy and financing framework would shift the burden to the government where individuals were the only ones incurring costs. The sign attached is (+). For feasibility, the sign attached is (?).

Acceptability

The stakeholders' reactions to decisions depend on the extent to which they acknowledge the legitimacy of the decision-makers and the decision-making process (Singer *et al.,* 2000). The evidence collected indicates that the stakeholders were interested in addressing adaptation concerns but thought about what they would gain from it, as the resources to facilitate their work were limited. The integration of EbA into the financing framework would ensure that the government also incurs costs. The sign attached is (+++).

Land Act: Determining the sign

Effectiveness

In Uganda 'land is a natural gift for all citizens of Uganda to hold, own, enjoy, use and develop either individually or in association with others' and the 'management of land resources must contribute to democratic governance, by nurturing institutions and procedures for the resolution of land disputes and conflicts' (Ravnborg *et al.*, 2031). The evidence indicates that as local authorities understand people and the environment in their locality better than people elsewhere, the land policy and related EbA integration into the policy and financing framework could be applicable over the long term. The sign attached to the effectiveness of the Land Act is (++).

Unintended effects

It is often difficult to undertake interventions without creating unintended effects, positive or negative (Rychetnik *et al.*, 2002). Indeed, policy implementation tends to be complex, programmatic, and context-dependent. All the group respondents reported that to minimise unintended negative effects and integrate EbA into the policy and financing framework processes, the authorities should improve their knowledge of EbA work, fully and freely guide and sensitise the communities to protect land, be transparent, conduct comprehensive meetings on measures to minimise unintended consequences, provide security for tourists, and approve land for national parks and for the resettlement of people. The sign attached to unintended effects is (++).

Equity

Despite legal and policy rhetoric about the emphasis on gender issues in ecosystem and environmental management, social norms, the gendered division of labour and gendered behavioural norms, as well as gendered spaces, all limit women's participation in decision-making that influences ecosystem adaptation (Howard & Nabanoga, 2007). The evidence indicates that to address area-specific inequality practices, whether based on gender or socioeconomic status, the government introduced affirmative action providing that three-quarters of the committee membership be constituted by women, which promotes the inclusion of women in EbA-related policy and financing framework. This provision is implemented in all the surveyed districts. The sign attached is (+). For the cost, the sign attached is (?).

Feasibility

Feasibility of the policy depends on the availability of the required resources, including personnel, material resources and technological resources (Pineault & Daveluy, 1986; Sabatier & Mazmanian, 1995; Swinburn *et al.*, 2005). The integration of EbA into the policy and financing framework would also ensure that resources are also allocated to EbA. The evidence collected indicates a lack of adequate funds and logistical resources (motorcycles, motor vehicles and human resources capacity). The sign attached is (--).

Acceptability

Any policy and financing framework of activities, such as EbA, that does not garner enough support (including from public opinion, and from those with economic and financial power) is likely to face difficulty being adopted and implemented, and thus difficulty producing the desired effects (Salamon, 2002). The affected individuals are the ones who will reject or accept the policy. The evidence collected indicates that the affected are the community, the government, those benefiting from land and immediate neighbours; and also that the motivating aspect was the sustainability and maintenance of land fertility, which required intervention. The sign attached is (++).

3. SITUATION ANALYSIS

3.1 Description of Policy-making at National Level

In Uganda, the Public Service was restructured in 1998. The context of policy-making was also reformed with the policy implementation function. Most of the work was devolved to local governments, under the decentralisation framework. The central government retained the core function of policy-making:

- The formulation of national policies and national standards;
- Monitoring the implementation of national policies and services;
- Ensuring compliance with standards and regulations; and
- Carrying out advocacy, technical supervision, advice, and mentoring of local governments in liaison with international agencies.

Policy Analysis Units (PAUs) were established through the Public Service Reform Programme to support the policy-making function at the centre of government. The focus on policy determination, formulation and implementation is a relatively new approach to managing public sector and service delivery that is constrained by inadequate skilled and knowledgeable human and financial resources, hence the imperative to strengthen policy capacity across governments.

3.2 Stages in the Policy-Making Process

The policy management process can be depicted in four stages at which a government makes, elaborates, gives legal and financial effects to, and actually delivers policy commitments (see also Figure 2). The process can be presented in stages, as follows:

- Stage 1: The executive sets broad policy commitments binding it to implement a particular set of policies.
- Stage 2: Departments/ministries prepare policy and budget proposals to deliver on the broad policy commitments.
- Stage 3: The executive provides adequate budget, removes procedural obstacles and anticipates the likely reaction of external players.
- Stage 4: Departments/ministries implement.

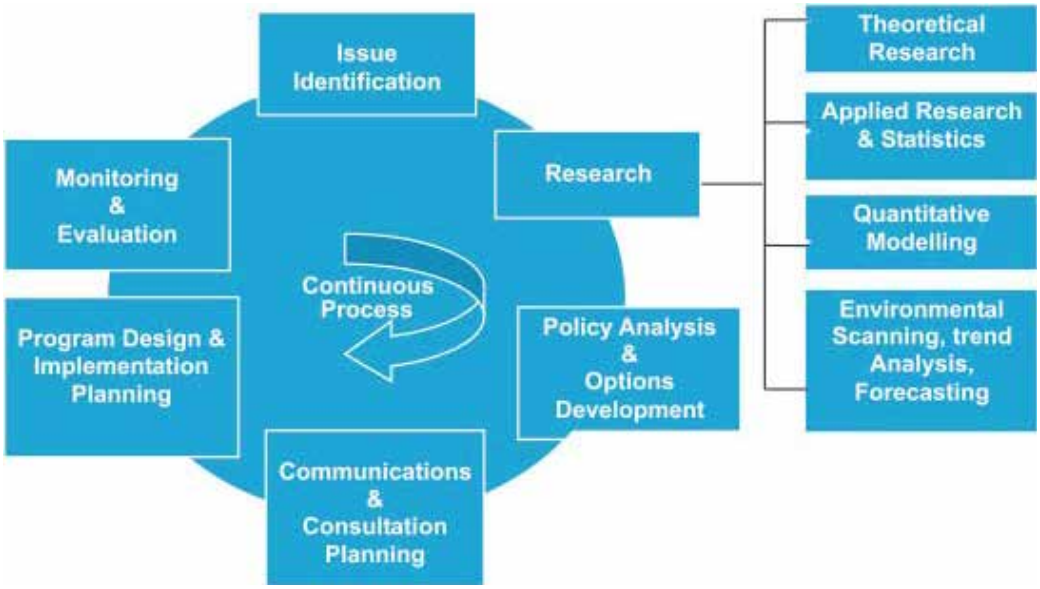

Figure 2: Policy-making process
(Sources: A guide to policy development & management in Uganda, 2009. Republic of Uganda)

3.3 Strategy for Funding in Policy-making

Ensuring that the necessary resources are available is important for making policy happen and for subsequent policy entry into the financing framework. When developing a policy one must always be aware of the cost implications of policy implementation and the need to achieve best value for money. Where policies do not involve significant public expenditure, there may still be implementation costs for the administration and compliance costs for individuals and organisations, which need to be considered and justified.

The ministries, such as that of Finance, are the first port of call for advice on financing policy solutions in most countries. Finance ministries should be involved in policy development at the earliest possible stage and kept up-to-date throughout the process. The key point, however, is that the business case for a policy must stand up on its own terms. Funding should follow policy, rather than policy being skewed, for example, by the availability of funding from external sources.

Whether a policy is determined to be of sufficient priority by sector ministers and subsequently by Cabinet on the basis of the evidence, the resources will be found. Conversely, as there will never be sufficient funding to do everything that is desirable, ministers and, in turn, the Cabinet need to be in a position to take strategic decisions about policy priorities, that is, involving both new and existing policies. That could mean ending existing activities which are no longer necessary in order to allow new priorities to be taken forward.

3.4 Decentralisation Process

In Uganda, the process of government decentralisation began in 1993. Parliament enacted the Local Governments (Resistance Councils) Statute. The statute provided for the transfer of functions, powers and services from the central government to local governments and enabled district authorities to make decisions on the utilisation of funds – decisions that were hitherto made by the central government. Locally-elected assemblies were created at the local government level to ensure adequate reflection of local priorities in government programmes. Generally, district authorities are important for ensuring EbA integration into the policy and financing framework at the local government level.

The 1995 Constitution established the institutional arrangements under which the powers – political, legislative, judicial and administrative – of local governments were further consolidated. Uganda currently has 69 districts that are governed by the Local Government Act 1997. These districts have wide-ranging responsibilities for the delivery of basic services in health, education, agriculture and infrastructure. The government operates a system of conditional grants transfers to local governments which are specifically targeted at each sector, in pursuit of the overall policies and objectives included in poverty reduction.

Low levels of government, most notably the sub-counties, have few service delivery responsibilities, but mostly serve as administrative units for purposes of liaison with the communities. Along with the Local Government Act 1997, the Fiscal Decentralisation Strategy (FDS) 2002 provides for the devolution of central government spending powers and service functions to district, municipal, and other lower levels of government. This is particularly important for the purposes of policy analysis as linking local authorities to the national level provide an entry point for EbA into the policy and financing framework.

3.5 Description of the Budget and Financing Processes in Uganda

3.5.1 The local government level

The local government budget is the detailed plan of how governments intend to spend funds in line with stipulated objectives, needs and priorities. Local governments have discretionary planning and budgeting powers, but their plans and budgets have to reflect priorities and objectives set out in national policies, plans and budgets. Consequently, the local government planning and budget cycle fits into the national planning and budgeting cycle. The planning and policy process starts in October and ends in June.

The Medium-Term Expenditure Framework and the supporting National Budget Framework Paper process constitute a three-year rolling budget system comprising the link between poverty reduction and the budget allocations for the implementation of the various programmes under the plan. The government ensures the national priorities are reflected in local government budgets through the allocation and transfer of conditional grants to local governments. The integration of EbA into these processes could ensure funding as these are conditional funds at local government level.

The two main principles behind the local government planning and budgeting system are:

1. Realistic budgeting through an integrated three-year budgeting and planning framework:

- A three-year rolling (medium-term) framework for planning and budgeting is used so that services and investments can be planned for and communicated well in advance.
- The preparation of three-year district/urban authority development plans, which are fully integrated with the budgeting process, identifies the specific programmes and projects that are to be carried out to address specific communities' local priorities and needs.
- Planning and budgeting must be carried out within expected revenues over the medium term, as this helps local governments prioritise programmes and ensure that what is actually planned and budgeted for can be realistically achieved and afforded. This is done through the preparation of the Local Government Budget Framework Paper (LGBFP).

2. Focusing on the intended results of expenditures – setting objectives and targets and measuring performance;

- Local governments spend money in order to achieve objectives. Clearly stating the objectives of expenditure and setting measurable targets enable local governments to deliver services and choose programmes and investments which are better targeted towards local needs and priorities.
- By linking the achievement of service delivery and investment performance targets to specific expenditures in the budget, local governments can assess the efficiency of their expenditure choices, identify problems and establish how funds can be better spent.

The three main tools that enable integrated planning and budgeting are:

a) The District/Urban Local Government Development Plan (DDP), which constitutes the overall, integrated, district/urban authority planning tool. DDP incorporates the plans of lower-level local governments and of sector departments. All activities to be undertaken by the local government, whether funded by the centre, local revenue, unconditional grants or donors, are included in the DDP. An activity that is not contained and identified in the DDP is not an authorised expenditure.

b) The Local Government Budget Framework Paper (LGBFP), which articulates a local government's three-year budget strategy, and through integrating planning and budgeting helps ensure that budget decisions reflect a local government's longer-term objectives. The LGBFP does so by setting out:
   - previous financial year's revenue performance against revenue budget estimates and revenue projections for the next three years;
   - sector performance in previous financial years (expenditure and service delivery) measured against set performance targets;
   - indicative allocations and sector objectives and performance targets for the next three years;
   - sector unfunded priorities and reallocations of funding; and
   - draft annual work plan and budget estimates, setting out in detail the budgetary inputs, activities and expected outputs and outcomes within the various sectors during the coming financial year.

The LGBFP, if properly prepared and used, will provide councillors with the information required to make decisions that link up inputs and activities with intended results or outcomes (goals set in the development plans).

c) The budget which, alongside the annual work plan, makes the integrated annual performance and financial plan for the coming financial year, sets out:
   - the expected revenues available to the local governments in detail; and
   - the allocation of funds to different parts of the local government for the achievement of the activities and outputs set out in the annual work plan in detail.

The final annual work plan, together with the budget, is presented to the council for approval. Once approved, the budget is a legal document by which the council authorises the local government administration to spend money on its behalf in order to carry out council programmes.

The DDP, BFP, annual work plan and budget are all linked so that at any stage an activity can be identified in the DDP.

3.5.2 The national government level - Financing and budget process in Uganda

Uganda's budget system is well-defined in legislation and is supported by the country's constitution. Further, the Budget Act 2001 and the Public Finance and Accountability Act (PFAA) 2003 incorporate international best practices in public sector budgeting and financial management.

Key actors in the nation's budget process are the Cabinet, which reviews and endorses the budget proposals; the Ministry of Finance, Planning and Economic Development (MFPED), which drafts the annual budget; the legislature (national Parliament), which approves the annual budget; sector ministries and local governments, which execute the annual budget; the Auditor General's Office, which is responsible for auditing the expenditures made under each annual budget; and donors, whose combined aid supports nearly 45 per cent of the national budget.

Figure 3, shows the various phases of Uganda's annual budget development and implementation process. In summary, the budget process begins in October of each year, when the Ministry of Finance organises the first budget consultative conference for members of Parliament, line ministries and local government officials, private sector and civil society members, donors (development partners), and the media. During this meeting, economic policies for the next three-year period are discussed and sector working groups formed. During such a meeting, the integration of EbA into the policy and financing framework would be an opportunity for getting EbA into the national processes.

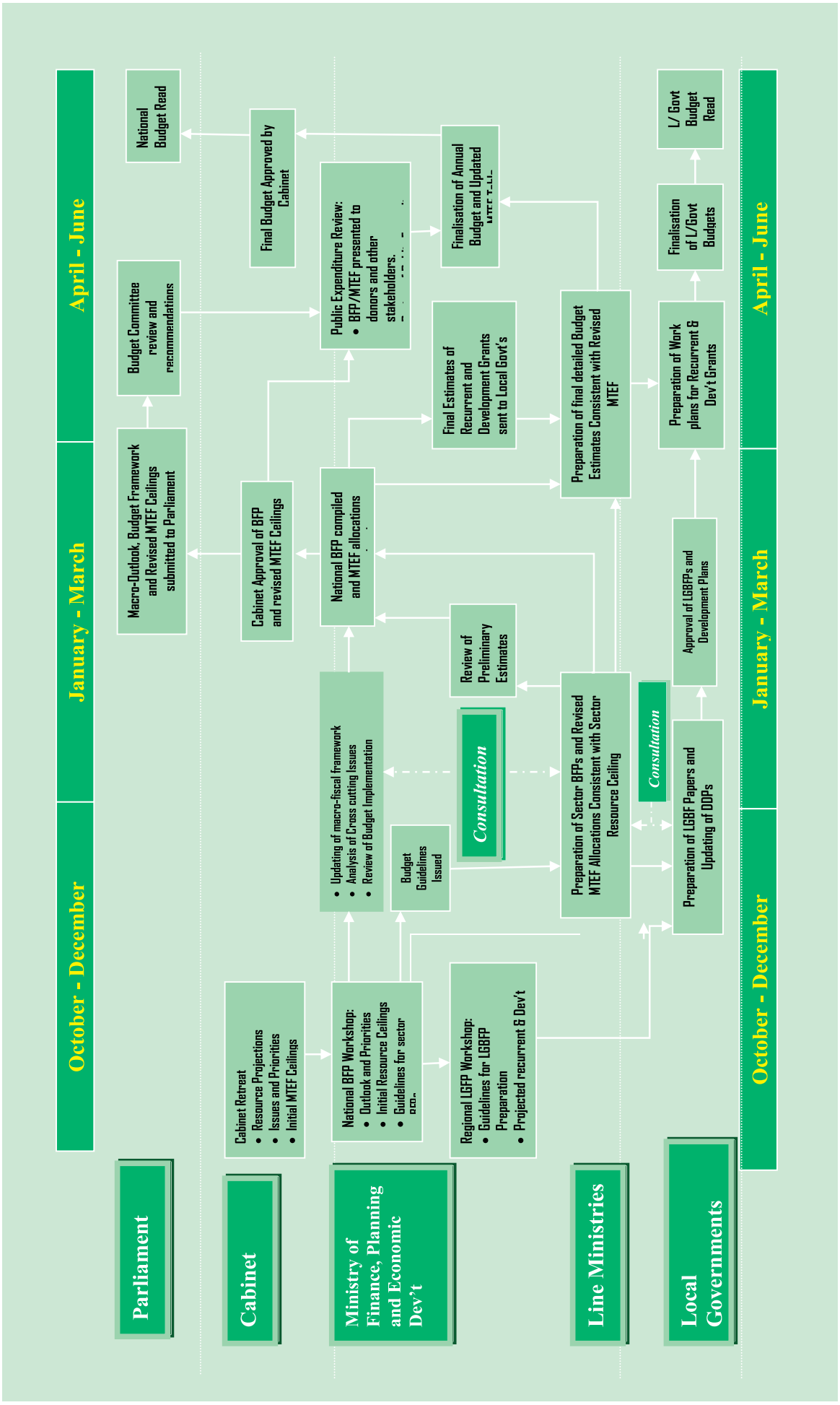

Figure 3: The annual planning and budgetary process in Uganda.
Source: Ministry of Finance, Planning and Economic Development (MFPED)

Financing process and the Annual Planning Calendar (for October to June)

The events held between October and December are as follows:

i. Cabinet discussions are held, and Cabinet papers are produced reflecting the issues and priorities arising from the National Development Report (NDR). EbA policy issues could be included in the relevant documents, especially the NDR itself, given that this document is the basis for all strategic priorities. A strong point of departure would be an analysis of the current NDR to identify where there are direct and indirect links with EbA;

ii. The National Planning Authority produces the annual National Development Report (NDR). The NDR is like a monitoring report;

iii. The Ministry of Finance produces the updated macro-fiscal framework, and reviews budget implementation. Sectors at this stage are provided with budget implementation guidelines for the new phase of budgeting;

iv. The Ministry of Finance further holds regional local government workshops at which it issues guidelines for local government budget framework papers and the projected recurrent and development grants;

v. Sector ministries produce the BFPs based on a revised Mid-Term Expenditure Framework (MTEF). The MTEF analysis usually reflects natural resource policy/climate change policy interventions in respect of funds for implementation; and

vi. Local governments produce the budget framework papers and start updating the DDPs. These require sound analysis of issues basing on the objective indicators and projection statistics for each local government.

The events for January to March are as follows:

vii. In this period, Parliament receives and debates the macro-outlook, the budget framework paper, and the revised MTEF ceilings. The Budget Committee of Parliament is expected to make a commitment (political commitment) that forms the basis for the provision of resources for any planned interventions. There is, therefore, need to collaborate with the parliamentary forum to ensure that funding for addressing climate change and ecosystem degradation through EbA is considered and financed.

viii. In Cabinet, the minister responsible for planning is expected to present the key priority issues regarding planning. The minutes of the Cabinet should reflect the commitments of the Cabinet in terms of budgetary and policy commitments.

The events for April to June are as follows:

ix. After April, the Ministry of Finance produces the integrated annual budget proposals. Public expenditure at this time should reflect sufficient provisions made for expenditure on human capital development.

x. The budgetary estimates are allocated funds for interventions coordination and advocacy at sector and district levels.

xi. The Ministry of Local Government is expected to have received the approved local government BFPs. These papers should contain information on the district action plan interventions which are allocated funding.

3.6 Government Institutions – Gaps and Opportunities

In Uganda, the fact that some government institutions (i.e. ministries, departments and operational units) are operated through a multi-sectoral approach that adopt cross-cutting themes (such as the environment and climate change) similar to the themes addressed by EbA presents opportunities to promote EbA approaches. The relevant institutions are the Ministry of Agriculture, Animal Industry and Fisheries; the Ministry of Water, Lands and Environment; the Ministry of Finance, Planning and Economic Development; and the Department of Climate Change. The institutional setting also supports dialogue across sectors (including coordinated planning, prioritisation and budgeting), joint implementation (coordinated budget planning) and accountability (such as for effective monitoring and evaluation).

4. HEALTH RISKS AND EbA ACTIVITIES

Awareness of climate change health impacts on the global population is increasing. For instance, many publications exist on diseases related to climatic conditions (Baguma *et al.,* 2014; Ahmed *et al*., 2008). The effects of climate change influence ecosystems and the delivery of health-care services, including treatment for climate-related diseases (Gill *et al*., 2007). Additionally, changes in disease patterns are also linked to variability in the condition of ecosystems (Nichols *et al.,* 2010; Ryves *et al.,* 2011).

Data was collected on the top ten diseases causing mortality and morbidity in Kween district because these could create a basis for advocacy issues in the integration of EbA into the policy and financing framework (Table 7). Kween district health data was selected because the district is situated on the upper reaches of Mt Elgon, and has poor health facilities. Moreover, several diseases that are currently endemic in Uganda are likely to increase in prevalence and distribution owing to climate change (USAID, 2014).

Table 7: The top 10 diseases causing mortality and morbidity monthly, in 2013, for Kween district

No.	Diseases	Male		Female		Total
		Number (n)	Per cent (%)	Number (n)	Per cent (%)	
1	Malaria	28,502	58.1	20,565	41.9	49,067
2	Pneumonia - cough or cold	12,515	41.08	17,953	58.9	30,468
3	Intestinal worms	7,693	42.63	10,354	57.4	18,047
4	Pneumonia	2,289	40.59	3,350	59.4	5,639
5	Skin diseases	1,886	42.30	2,573	57.7	4,459
6	Diarrhoea- acute	1,749	46.36	2,024	53.6	3,773
7	Urinary tract infections (UTIs)	1,200	33.00	2,436	67.0	3,636
8	Typhoid fever	959	32.92	1,954	67.1	2,913
9	Injuries due to trauma	1,253	44.21	1,581	55.8	2,834
10	Other eye conditions	1,112	42.15	1,526	57.8	2,638
Total		59,155		64,316		123,471

The evidence collected indicates the top ten diseases causing mortality and morbidity monthly, for Kween district in 2013. The diseases were malaria, which was the most dangerous disease, causing 58.1per cent of mortality and morbidity among men; and typhoid fever, causing 67.1 per cent mortality and morbidity among women. The EbA project could contribute to minimising climate change impacts through financial support for adaptation, such as putting emphasis on the use of mosquito nets and water management through sensitising the inhabitants to the importance of draining stagnant water and eliminating mosquitoes in the Mt Elgon region.

5. FINANCING FRAMEWORK – OPPORTUNITIES AND GAPS

5.1 Budget and Financing Framework Analysis

The budgetary process in Uganda is characterised by relative transparency and openness and broad participation (MFPED, 2009; de Renzio *et al*., 2006). After the Budget Speech is read in June each year, Parliament discusses and concludes debate on the budget and the concerns raised can be incorporated before the budget is approved in September. To get EbA activities considered as routine adaptation options at national and local government levels, the EbA project could utilise the invaluable opportunity of participating in government discussions and contribute information during the consultative process from June through to September of the budget debate after the Budget Speech reading.

Once Cabinet has approved the budget, a first budget call circular is sent out to ministries and local governments to communicate the budget strategy for the following financial year to prepare and submit Budget Framework Papers (BFP). The BFP links the sector ceiling, priorities and their vote and are prepared at the national, sectoral and local government levels (MFPED, 2009). Similarly, given that the EbA activities are also prepared at the national, sectoral and local government levels, new or future EbA projects could use the existing opportunities to contribute information to the public sector finance and policy processes at the various levels.

The sectoral BFP presents sector expenditure priorities and outlines the sector's contribution to poverty reduction (MFPED 2011). A well-formulated sectoral BFP may lead to a balanced and adequate allocation of sector ceilings in the Mid-Term Expenditure Framework (The Global Mechanism, 2008). The EbA project can utilise the opportunities by working with sector working groups.

The ministerial policy statements are important in forming the basis for Parliament to scrutinise and debate the budget of each ministry. They are prepared by 30 June annually. The statements also provide a link between the ministry's strategic priorities and the proposed budgetary allocations. Given that every ministry prepares and submits a Ministerial Policy Statement each financial year on the planned expenditure and outputs for the following financial year to Parliament, the opportunity to have EbA activities considered can perhaps be explored through networking and collaboration.

5.2 Financing Instruments and Implementation Frameworks

The financial instruments include the Local Government Development Programme, the MAAIF Development Strategy and Investment Plan, the Environment and Natural Resources Strategic Investment Plan, the Budget Framework Papers and grant transfers. The EbA project has to operate within these instruments to suit the financing and public sector policy processes.

The Local Government Development Programme (LGDP) provides local governments with technical and financial support to implement mandates with respect to decentralised service provision and the devolution of the development budget. The LGDP supports the government efforts to integrate its development budget with the development budgets of local government units.

The Ministry of Agriculture, Animal Industry and Fisheries (MAAIF) Development Strategy and Investment Plan (MDSIP) seeks to clarify the objectives and outputs for the MAAIF sector, highlighting priority areas and linking spending to ministry goals and objectives. Given the strong link between agriculture and EbA, there is a strong and logical opportunity to strengthen EbA priorities in the MDSIP - as the ministry invests in programmes and plans for future improvement.

The Environment and Natural Resources (ENR) Sector Investment Plan envisages investments in the sub-sectors of land, forestry, fisheries, wetlands, meteorology, wildlife, environmental management and administration. The EbA project supports the same sub-sectors and could easily be considered for contribution. Additionally, only 0.64per cent of total ENR expenditures are linked to poverty reduction resources, and these are allocated exclusively to wetlands. This is an important opportunity for the Government of Uganda to recognise the sustainable management of natural resources as a tool of poverty reduction. EbA can utilise the opportunity presented by this necessity.

The Sector Investment Plan (SIP) is a document that can make a strong case for a sector as a poverty reduction tool but does not determine final and approved investments (Poverty Status Report, 2012). Analysis of the SIP can identify activities that would help achieve relevant objectives. Resource constraints due to limited revenue generation and competition between sectors mean that only some of the sectors' policies and strategies receive due attention. The EbA project can build a case and formulate strategies which can be included in the plans as they can be easily considered and funded.

The National Agricultural Advisory Services (NAADS) was established with the aim of increasing the efficiency and effectiveness of agricultural extension services. The programme is implemented through local governments at district and sub-county levels. The NAADS programme is funded by development partners through earmarked budget support, which is pooled with the Government of Uganda's contribution, into a common basket fund under the Government Consolidated Fund. Some contributions come from farmers through payment for services delivered. Under the Mid-Term Expenditure Framework, there is a ceiling for NAADS that imposes restrictions on the roll-out and implementation of the programme. EbA can utilise the opportunities presented by the NAADS programme by providing advisory services at local government level.

The allocation of unconditional grants presents few possibilities for financing EbA activities because grant transfers are formula-based and rarely cover more than operational expenditures. To work with the discretionary powers of local governments in the allocation of resources, it is important that EbA needs and priorities are accurately identified as part of the local government budgetary process and are fed into the budgetary process at national level.

To access LGDP funds, local authorities usually have a three-year rolling District Development Plan (DDP) in place and expenditures are in line with the approved annual work plans and budgets. An assessment of local government performance verifies local government compliance with the overall legal and policy framework and sector policies and guidelines. The assessments determine local government access to development grants under LDGP and are crucial for obtaining financing for the implementation of DDPs.

The decentralisation system of government aims at enhancing the efficiency of resource allocation in line with local priorities.

The system provides for the transfer of functions and services from the central government to local governments and enables district authorities to make decisions on the utilisation of funds – decisions that were hitherto made by the central government. Local governments in Uganda enjoy about 10per cent flexibility of non-salary conditional grant allocations to recurrent sector budgets and sector budget lines (Budget Monitoring, 2012). They also enjoy discretionary planning and budgeting powers. However, local government plans and budgets need to fit into national priorities and policies.

The EbA project could utilise this opportunity by suggesting emphasis of expenditure on EbA strategies.

5.3 Government Expenditure Analysis – Domestic Generated Revenue

Domestic revenues for two consecutive years are anticipated to rise from the projected outturn of USh. 6,213 billion for financial year (FY) 2013/2014 to USh. 7,332.5 billion in FY 2012/2013 (Budget Background, 2013/2014) (see Figure 4). The increase is equivalent to 13.4 per cent of market price nominal GDP, representing a 19.8 per cent increase on the projected outturn.

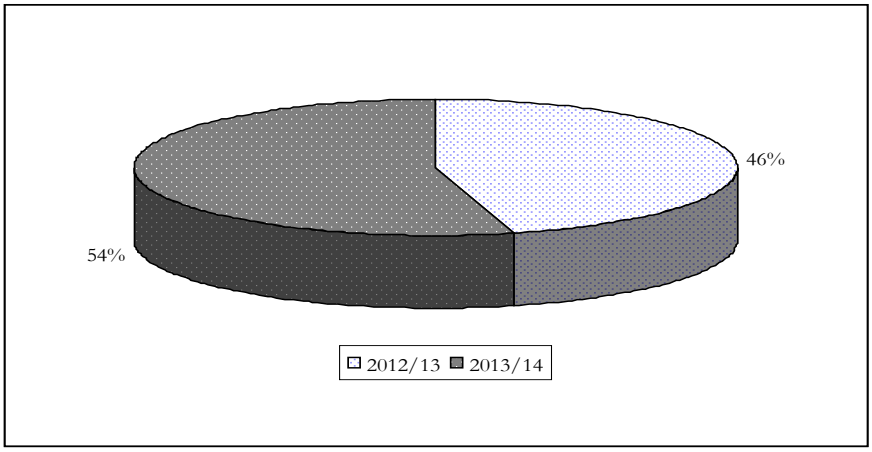

Figure 4: The anticipated rise in domestic revenue sources and EbA activities

Taxes constitute the largest proportion of domestic revenue. The government generates domestic revenue from tax and non-tax sources. Examples of revenues from taxes are notably taxes on income, profits and capital gains, taxes on goods and services (such as value added tax (VAT)) and excise duty. The non-tax revenues are obtained from sources such as licences and concessions. In this analysis, tax is one important economic instrument that generates revenue.

Taxes, charges and user fees schemes require that money be paid to the government in return for engaging in some behaviour (Barg *et al*., 2000).

Introducing these economic instruments discourages undesired behaviours towards ecosystem resources by raising their price. For instance, to induce a significant degree of behavioural change, a tax or fee may have to be imposed at a level that raises the price of an undesired behaviour above that of an alternative behaviour. The general principle to follow in applying revenue-generating instruments is to tax activities and behaviours that are to be discouraged or reduced. The EbA project and the Government of Uganda could conduct research and training aimed at using taxes for adaptation purposes.

Table 8. Climate change-related expenditure considering budgets and outturns for 2008/9-2011/12

Institution	2008/2009		2009/2010		2010/2011		2012/2012	
	Budget	Outturn	Budget	Outturn	Budget	Outturn	Budget	Outturn
MAAIF	5.6	5.6	9.4	1.6	3.5	6.5	7.4	2.3
MoH	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
MWE	9.5	6.4	13.9	5.8	16.8	7.1	25.9	13.7
MoWT	16.2	13.4	23.4	12.4	32.3	30.9	10.9	28.2
MLHUD	0.6	0.6	0.8	0.8	1.0	0.6	0.9	0.6
OPM	0.0	2.2	1.1	0.9	3.3	2.0	1.9	4.0
MTTI	0.1	0.0	0.1	0.1	0.1	0.0	-	-
MTIC	-	-	-	-	-	-	0.1	0.0
MTWA	-	-	-	-	-	-	0.0	0.0
MED	64.7	13.1	154.2	31.0	96.0	18.2	88.2	22.1
NPA	0.2	0.2	0.6	0.6	0.7	0.7	0.9	0.9
Total	96.9	41.5	203.4	53.2	153.6	66.5	136.0	71.8

5.4 Mt Elgon District Expenditure Analysis

The Mt Elgon districts in Uganda are Kween, Kapchorwa, Sironko and Bulambuli. These districts experience climate hazards and require budget support. According to the chief district officer of Bulambuli, when it rains water from the hills floods the lowlands and the roads become impassable. Fatalities are also caused by landslides, and these impact on livelihoods in the communities. Addressing these challenges requires substantial amounts of money. The money received from the government is, however, inadequate for most financial years (FY). The annual amount received from the government for wetland planning and management for Kween district is around USh.5,000,000 (USD 1,938.74) and around USh. 4,950,000 (USD 1,899.96) for Bulambuli district in FY 2012/ 2013. The inadequacy of funds in the districts constitutes a gap and an opportunity for EbA to source funds and support the area in the one-year remaining period and in future.

5.5 Climate Change-Relevant Expenditure by Ministry

Government ministries in Uganda are increasingly considering climate change as one of the cross-cutting themes. Expenditure on climate change-related activities are, therefore, spread across ministries, though concentration is in only a few ministries (Table 8).

According to Tumushabe *et al.* (2013), about half of the climate change-related programmes are run by two ministries (the Ministry of Water and Environment, and the Ministry of Agriculture, Animal Industry and Fisheries). Small numbers of climate change-related programmes are found in the Ministry of Energy and Mineral Development and the Ministry of Works and Transport, and the rest are scattered in four ministries. The evidence collected indicates that the climate change unit was upgraded to a department in the Ministry of Water and Environment. Climate change-related expenditure is expected to increase. Interestingly, in 82 per cent of the government institutions listed in Table 8, the outturn is less than budgeted for the four years analysed. Furthermore, spending on items related to climate change within government ministries is an indication of the feasibility of the policy and a facilitating factor for implementation if the policy can draw on the experience and structure of government agencies.

Nevertheless, the existing institutions have their own mandates and objectives, which may not completely coincide with those of the policy. This is a challenge which does not arise when a new structure is created specifically for the implementation of a policy. For example, while the national climate change operations require the Ministry of Health to contribute to implementation and response, inadequate programmes exist in the ministry and its related agencies. The EbA project can take advantage of the opportunity of focusing on EbA operations which support the department of climate change and minimise weaknesses in government institutions and their related expenditure.

6. POLICY ANALYSIS – OPPORTUNITIES AND GAPS, ENTRY FOR EBA INTO POLICY PROCESSES

The United Nations Framework Convention on Climate Change provides information on the need to assess the physical impacts of climate change. Most African countries tend to focus on how to adapt to the effects of climate change. Climate variability is associated with rainfall (Baguma et al., 2014) and rainwater is harvested for domestic use in Uganda (Baguma *et al*., 2012). Indeed, the policy on climate change was formulated using a participatory approach. However, the policy formulation raises concerns about the implementation process and its effectiveness. The analysis focused on identifying gaps and entry points to enable the routine inclusion of EbA activities in the policy and financing framework.

6.1 Climate Change Policy

6.1.1 Effectiveness

The first element used to identify the gaps, opportunities and entry points for EbA into the policy and financing framework was to analyse the effectiveness and success of the recent climate change policy in achieving its objective, i.e. bringing about the desired adaptation changes through the strengthening of sustainable public land management to minimise climatic impacts on mountainous ecosystems.

Additionally, as the policy was developed using the participatory approach, this could contribute to the effectiveness of the policy. Indeed, 92.9 per cent of the respondents believed that the climate change policy was likely to bring about positive change. Thus, the effective implementation of the climate change policy, which already has acceptance and favourable working conditions from stakeholders, provides opportunities and entry points for EbA into the existing policy and financing framework, as EbA does related work.

However, it is often difficult to judge the ultimate effects of the policy because it is not easy to prove the existence of a cause-and-effect relationship, and specific policy items may represent only one of a multitude of factors that simultaneously influence the targeted problem (Milton *et al*., 2011). In response to these issues, the consultant undertook an analysis of other types of data on effectiveness: those focused on the link between a public policy and its intermediate effects and those focused on the link between these intermediate effects and the ultimate effect on the targeted problem. Adopting from programme evaluation methods, the consultant found it necessary for to deconstruct the chain of expected effects between the policy under study and the targeted problem (Champagne *et al.,* 2009b; Weiss, 1998). A useful way was to visualise the chain of effects in the form of logic (Figure 5).

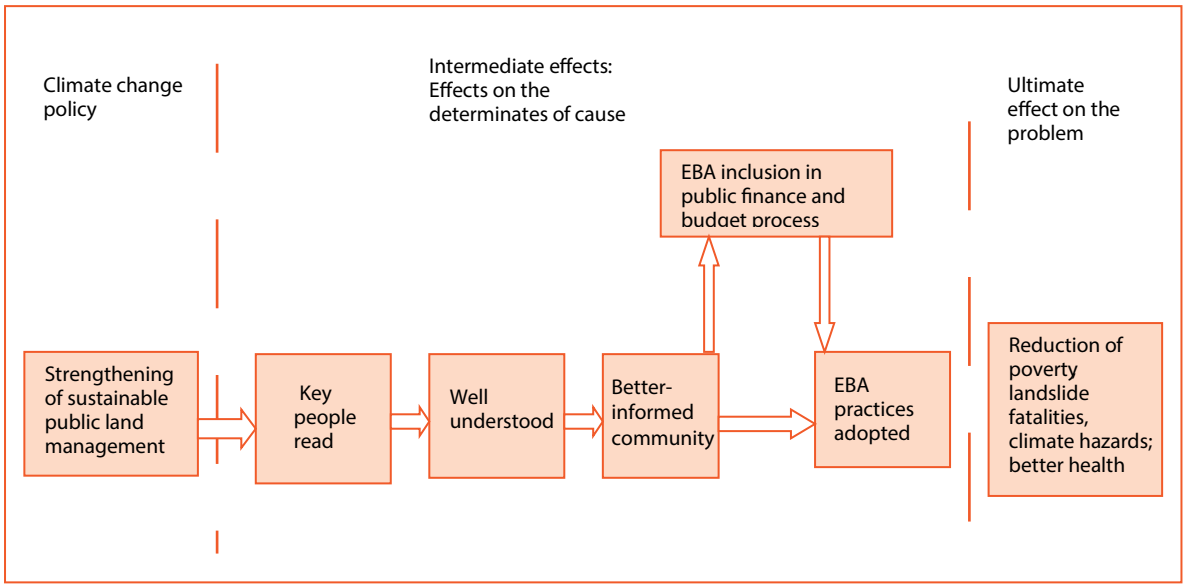

Figure 5: Climate change policy model: Ecosystem-based adaptation

The logic model represents the expected effects and the extent to which the effects are in reality produced. The analysis of intermediate effects strengthens the assumption of causality because effects are less distant, their cause-effect relationship with the policy under study is easier to establish, and as emphasising the policy is effective up to a certain point in the chain of effects, then its actual contribution to the ultimate effect is readily assessed. For example, in Figure 5, it is easy to strengthen sustainable land management through aspects (reading, workshops and seminars), the intermediate effects, such as ensuring that it is well understand, being well informed for inclusion in policy and finance processes could enable EbA practices adoption. Reduction of poverty, landslide fatalities, other climatic hazards and good health can be achieved. Thus, as EbA work includes working at the intermediate level i.e., involving key stakeholder influencing policy to achieving results, the opportunity and entry point will ensure integration of EbA in policy and budget financing processes.

6.1.2 Unintended effects

The unintended consequences referred to are negative effects, i.e. unforeseen consequences of a seemingly well-intentioned policy design.

The fact that the consequences are unintended implies nothing about their value: the effects may be positive or negative. Unintended effects occur partly because EbA-related policies are applied within complex systems characterised by multiple interrelated processes that interact in a non-linear manner and adapt to changes (Morell, 2005).

The evidence collected indicates that 80 per cent agree that unintended consequences of the climate change policy are likely to occur. The unintended effects could be as follows: When trenches are dug to reduce soil erosion, water affects others in the lowlands. Since Mt Elgon is a border mountain there is a likely migration, especially from Kenya to Uganda, due to a stable mountain ecosystem. Also, relocating people after landslides tends to create resistance as people are not sure who takes over their land when they leave, and owing to lack of appropriate compensation for the rich families. There are also other unintended environmental problems, such as pollution and deforestation due to resettlement in new places after the occurrence of landslides. Interestingly, while the local community in the Mt Elgon region (in the four districts) believed the likely effects of the climate change policy,

some of the respondents at national level could not believe that the unintended negative effects could occur. These contradictory responses related to the work of the African Climate Change Policy Centre suggest that the problem of climate change involves a fundamental failure of markets: 'Those who damage others by emitting greenhouse gases generally do not pay'.[1]

In the analysis, key personnel in the local government and national governments easily identified information about how mitigation and adaptation measures against unintended risks could provide an opportunity and entry point for ensuring EbA activities in the policy and budget financing framework, if stakeholders were encouraged and supported. For instance, according to key personnel, the unintended negative effects can be minimised in several ways. These include sensitisation; land use planning and dialogue; technical support and community encouragement, which can minimise unintended risks; strategic assessment, which could help to minimise unintended effects; and a comprehensive and coordinated approach, which can be used in project planning.

6.1.3 Equity analysis

The analysis of the equity dimension of the policy was aimed at determining the different effects on various groups (categorised by gender and socioeconomic status) or whether the climate change policy could create, increase or correct inequalities in the distribution of the targeted population. The underlying assumption was that the gaps and opportunities identified could be minimised along with existing policy and budget financing interventions, ensuring EbA entry into the government framework. The discourse on equity contains conceptual and ideological barriers and historical distortions that affect Ugandan society in general, and are expressed in subtle ways, even among those most dedicated to overcoming barriers and implementing equity (Bakan & Kobayashi, 2000). Furthermore, equity was considered because, frequently, policies could improve climate change adaption in terms of the overall average, but at the same time could deepen social inequalities.

The evidence collected indicates that the climate change policy mainstreams gender (as indicated by 91.4 per cent) but women's roles are not adequately spelt out at the implementation stage. For instance, strengthening public land management, such as mulching, fails to stipulate which gender dimension has what responsibility. In some instances, men will take possession of fertile land, leaving women with less fertile land, which creates disharmony in families. Besides, women do better than men in activities of land management, e.g. tree planting and ensuring domestic food security. One key respondent said that 'the specific role of each gender is left for districts to implement'. However, the likely implication is that the failure of districts to adequately address equity issues could imply failure to support hard-pressed members of the community. As gender equity has not yet been fully achieved, the EbA project could continue enhancing activities that promote gender balance since gender mainstreaming is supported in policy and budget financing processes, such as climate change policy work.

Equity in the socioeconomic arena relates to the whole purpose of climate change policy, which addresses economic issues, including women's access to land. However, there is a skewing of income as men tend to focus on cash crops while women on food crops. In predominantly income-generation agricultural activities, irrigation can be undertaken but is expensive; improved seed varieties are available but are supplying centres are few;

1 United Nations Economic Commission for Africa, African Climate Policy Centre, working documents, 2014

and it is cost-effective to implement climate change activities but the agriculture sector has many poor people. The most vulnerable people are the poor, and there is need to diversify crops as it helps them cope with climate change. Generally, the existence of perpetual poverty is an opportunity and entry point that enable EbA to contribute to poverty reduction, alongside the policy and financing framework. Moreover, the EbA project could continue supporting income generation, such as the honey-production business, as these are in line with the government's objectives.

6.1.4 Cost

The policy analysis considered the actual costs incurred at the implementation stage. This was partly because opportunities and entry points for EbA could require information regarding some actual items in which costs could be incurred and because the Ugandan government expenses on policies are reflected in national and local government budgets (MFPED, 2014; Budget Background, 2013). The evidence collected indicates that 95 per cent of the respondents agreed that it was worthwhile spending on climate change-related adaptation and that the government costs mainly consisted of salaries for technical people, inputs on issues, such as agricultural inputs, learning and planting materials. The costs also included wages for extension workers, technology acquisition and training costs (e.g. related to floods and landslides). The costs included were also incremental (short-, medium- and long-term) for climate change proofing, water harvesting and climate-smart agriculture. The other costs included awareness costs (advertisements and consultancy, e.g. for proposals to generate income).

However, the spending plans published in the annual budget may not always result in the stated amount of funding being released to the relevant spending agencies (Tumushabe *et al*., 2013). The implementation of policies is, therefore, affected because less money than planned is usually received. Furthermore, it was surprising to find that the individual costs incurred included expenses which usually arise when the government offers support to the community. For instance, most government support to communities, the amount is usually less as additional costs are incurred by individuals. The variation in actual expenditure provides an opportunity and entry point for EbA as budgets and policies can be focused on specific regions and actual amounts spent.

6.1.5 Feasibility

The analysis also took into account the possibility of the human, material and technological resources being adequate for the climate change policy on adaptation to minimise climatic impacts through strengthening sustainable land management in the ecosystem. Moreover, the pre-existence of government institutions is an indication of the feasibility of the policy and a facilitating factor, if the policy can draw on the experience and structure of ministry departments and units (Swinburn *et al*., 2005) and ensure conformity with all applicable legislation (Pineault & Daveluy, 1986). The evidence collected indicates the financial and technological resources available are inadequate. Additionally, the department of climate change is 'skeletal', with a limited number of technical staff, skills and tools. The implication is that the available technical staff are unable to coordinate all government agencies and the entire rural community adequately. The inadequacy of resources – human, material and technological – represents an opportunity and entry point as new resources can be provided and conditions created for EbA integration into the policy and budget financing framework.

Furthermore, climate change issues are considered cross-cutting thematic issues and could be challenged owing to the multiplicity of actors involved.

For instance, the evidence collected indicates that the role of the climate change department is to coordinate activities in Uganda. The policy is implemented by the Office of the Prime Minister, the Ministry of Water and Environment receives reports, the Ministry of Finance facilitates implementation with financial resources, but the decentralisation policy empowers district authorities to operationalise government programmes in local areas. The usual criticism of 'to whom it may concern' arises because the emphasis of the policy implementation could be compromised owing to the involvement of many actors. However, the opportunity and entry point exist as many stakeholders can be engaged and EbA options can be integrated into the policy and budget financing framework from different government agencies.

6.1.6 Acceptability

Acceptability refers to the way in which the stakeholders judged the recent climate change policy. Stakeholders are actors usually concerned with the objectives and implementation of a policy (Rychetnik *et al*., 2002). These are: groups directly targeted by the policy, the wider public, ministries, other decision-makers, professionals from the relevant public sectors (e.g. health and education), funding agencies, industry, the media, political organisations etc. (Swinburn *et al*., 2005). The term 'acceptability' also relates to the opportunity inherent in the balance of power between the stakeholders to ensure EbA integration into the policy and financing framework. If the stakeholders do not have enough political support, including that of public opinion and of those with economic, cultural and financial power, regardless of how good the policy and budget framework is, it would be difficult to adopt and implement EbA.

The evidence collected indicates that most stakeholders appreciate the ideas and issues related to climate change, and 88.6 per cent agreed that the problem targeted by the climate change policy and EbA are social issues requiring intervention. Indeed, some stakeholders were troubled about the climatic hazards affecting their livelihoods directly. Besides, government ministries emphasise the need to integrate climate change into work plans and investment plans, which represents an invaluable opportunity and entry point for EbA integration into the policy and financing framework.

6.2 National Management Environmental Policy (on Mountainous and Hilly Areas Management and Regulation, Part2)

6.2.1 Effectiveness

The consultant pursued an analysis of the National Management Environmental Policy to identify opportunities, gaps and entry points for EbA integration into the policy and financing framework. In the analysis, the consultant considered the policy aspect that addresses mountain and hill ecosystems by using district environment committees to draw up guidelines for environmental management. The opinion of key stakeholders on the effectiveness of the policy in bringing about the desired changes was analysed. This was partly because district environmental committees operate in local communities and the inhabitants of the Mt Elgon region are susceptible to severe climate-related hazards, such as landslides and flooding. Besides, these district environmental management arrangements are part of a broader decentralisation process and are intended to increase local ownership and improve the implementation of the environmental policy (Oosterveer & Van Vliet, 2010).

The evidence collected indicates that it is difficult for the policy to be effective because the committee was unable to carry out monitoring visits owing to lack of money and awareness of the specified roles, office barriers and transport,

as well as lack of experience, which affected the operation and functioning of the policy. Indeed, inadequate adaptation in the area is evident, as many fatalities caused by hazards have occurred and at least 516 people have been killed by landslides in Bududa since 1933 (Budada Report, 2010). The opportunity and entry point for EbA could consist in suggesting measures to transform hazards into policy and seek more funding to finance programmes and infrastructure that reduce related risks, such as early warming equipment in project operational regions.

The stakeholders were asked if they thought the guidelines provided were applicable over the long term to analyse the effectiveness of the policy. The evidence collected indicates that only 44.1 per cent agreed the policy guidelines were likely to be sustainable. However, there is need to update the policy to make it work well, and as the process uses grass-roots individuals (local people) the guidelines provided could be applicable over a long period of time. Moreover, environmental management is expected to be more effective when local communities come up with guidelines that are sustainable. Also, the local communities are supposedly better placed to manage their environment and natural resources (NEMA, 2010). The opportunity and entry point for EbA could be to seek resources and request the line ministry to have the policy updated, in the process integrating EbA activities, which would ensure routine financing from the government budget.

In the analysis, because judging the effectiveness of the policy is complicated, given the difficulty in proving the existence of a cause-and-effect relationship, the consultant deconstructed the chain of expected effects between the policy under study and the targeted problem in the form of logic (Figure 6) as has been done in many studies (Swinburn *et al*., 2005).

As reflected in Figure 6, specifying the intermediate effects makes it possible to identify steps that do not function well, and thus the implementation challenges that must be resolved (Morestin, 2012). For instance, regarding the chain, one may ask if the gap is whether committees have been empowered by reading and having access to the National Management Environment Policy on mountain and hill management and regulation. The consultant found that district environmental committees lacked adequate knowledge and capacity to handle environmental challenges. The opportunity and entry point for EbA into the policy and financing framework could be to seek resources and enhance programmes that contribute to knowledge and the capacity to handle environment challenges by district environment committees.

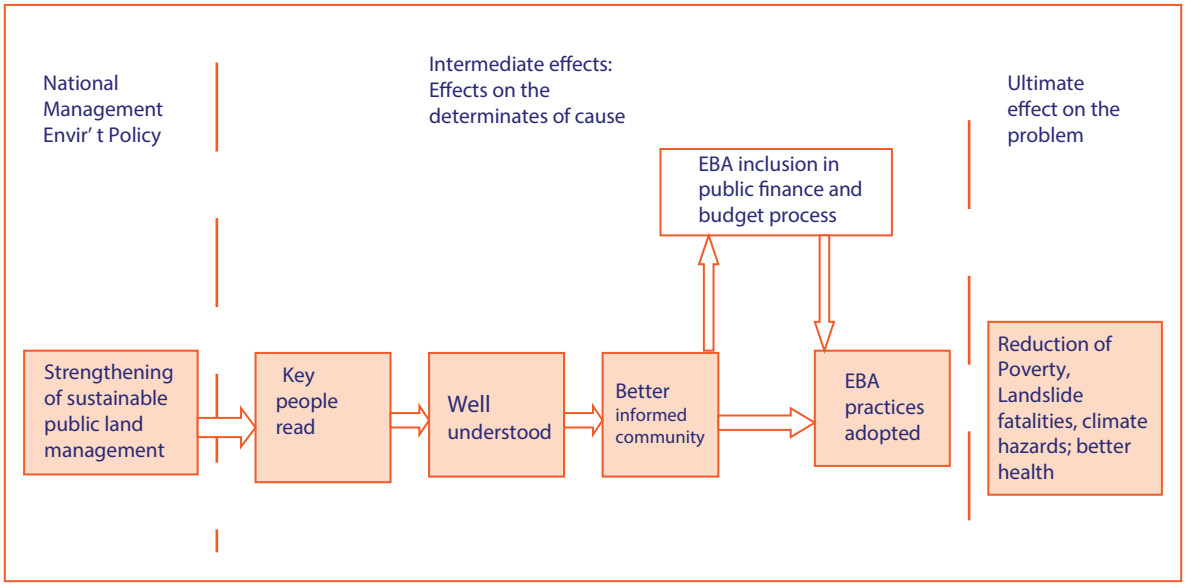

Figure 6: Logic model for National Management Environmental Policy (on Mountainous and Hilly Areas Management and Regulation, Part2)

6.2.2 Unintended effects

The environmental policy involves difficult decision-making due to the need to balance competing interests. This is partly because offsets between different choices are necessary and result in winners and losers among local stakeholders, which calls for environmental and natural resource management. The unintended negative effects created by the environmental policy designed to address mountain and hill ecosystems by using district environment committees were investigated. This was partly because gaps, opportunities and entry points can be identified for EbA integration into the policy and financing framework. The evidence collected indicates that people are displaced, especially through relocation to other areas, thus losing their natural social fabric and livelihoods. People move into gazetted areas and could lose their lives owing to inadequate health and environmental services, the depletion of bamboo vegetation and medicinal plants, and the refusal to plant vegetation on river banks, thus exacerbating erosion. In fact, the farmers stated that the amount of land available for food and cash crop cultivation had reduced. The unintended effects provide opportunities and entry points, for which EbA can seek funds or utilise the available funds to support foster integration into policy and budget framework processes.

The respondents indicated that the unintended effects could be minimised by agreeing with the community, discussing the approach to use, sensitising the community, using the participatory approach, awareness-raising and the provision of incentives, e.g. energy or composting solid waste, and seeking funds from development partners (UNDP or ICUN).

6.2.3 Equity

Gender equality and equality mainstreaming into the environmental policy designed to address mountain and hilly areas using district environmental committees were investigated. The evidence collected indicates that gender is considered in the recruitment of members of environmental committees, and women are at the forefront of handling activities, such as community tree planting.

This relates to other studies that found that cultural practices constrain women's visibility, mobility and behaviour, even when they are members of informal or formal groups (Mwangi *et al*., 2011).

Despite legal and policy rhetoric about the emphasis on gender issues in ecosystem and environmental management, women in Uganda continue to be marginalised in decision-making and collaborative environmental management user-group meetings (Obua *et al.,* 1998; Kugonza *et al.,* 2009). This is partly because social norms, the gendered division of labour and gendered behavioural norms, as well as gendered spaces, all limit women's participation in decision-making that influences ecosystem management, a finding supported by Howard and Nabanoga (2007). Consistently strengthening and emphasising gender balance alongside government efforts would constitute an opportunity and entry point for EbA integration into the policy and budget framework process. For instance, seeking funds to emphasise and support the participation of women in district and national environment programmes could contribute to the integration of EbA into the policy and financing framework.

With regard to socioeconomic equity considerations in the national management environmental policy for the mountain and hilly ecosystems, men and women are involved together in socioeconomic work. For example, men largely take care of planting commercial timber trees on-farm and patrolling fruits, while women are responsible for planting food-fruits and firewood trees on-farm and extracting materials to make handicrafts. All four group discussions in the districts reported that the majority of women members regularly attended environmental meetings, participated fully and freely expressed their opinions. Nevertheless, in about 30 per cent of cases, local politicians and wealthy individuals controlled the agenda, dominated discussions and influenced decision-making in socioeconomic meetings. This provides an opportunity and entry point for continued EbA work in supporting programmes that improve the socioeconomic status of communities, and their emphasis on the policy and financing framework.

6.2.4 Cost analysis

The consultancy aimed at identifying cost-related opportunities and entry points to get EbA routinely considered in the policy and budget financing framework. This was partly because EbA involves costs to governments and individuals. The costs are usually financial and non-financial, and result from implementation policies, such the environmental policy. Within this context, the consultant explored the extent to which cost items can be identified as paid out by the government and individuals. The costs incurred were as follows: transport costs; sitting and field visit allowances; telephone calls; meals; resettlement costs; including non-financial costs such as time; and deliberating by members. The evidence collected indicates that 75.6 per cent considered it to be worthwhile for the government to incur such costs.

This provides an opportunity and entry point as key stakeholders at local government and national levels involved in the study agreed that government should incur costs.

6.2.5 Acceptability

To analyse the acceptability of the policy and aid in the identification of opportunities and entry points for EbA integration into the policy and financing framework, the stakeholders affected by the policy were identified. Besides, the stakeholders' reactions to decisions depend on the extent to which they acknowledge the legitimacy of the decision-makers and the decision-making process (Singer *et al*., 2000).

The evidence shows that 65.7 per cent thought the policy was acceptable. The affected were women, children, the landless in the community, landowners, district administrations and those seeking revenue from ecosystem resources. The opportunity for EbA integration into policy and budget financing framework is in the acceptability of the policy and its work in the stakeholders affected by policy.

Opinions on and reactions to the idea of intervening to address the mountain ecosystem problems (such as landslides and floods) were analysed. This was because natural resources have been woven into the daily lives of many people, thus the stakeholders' judgement concerning the EbA also affects its acceptability in the policy and budget financing framework. The evidence collected indicates that the stakeholders are interested in addressing adaptation concerns, but they have reservations about what they would gain from it since the resources to facilitate work is limited. The opportunity and entry point for EbA is to seek resources and use the money available in the remaining period to address hazards, and ensure integration into the policy and financing framework.

6.3 Land Act

6.3.1 Effectiveness

The land Act builds on a number of fundamental principles, some of which hold that 'land is a natural gift for all citizens of Uganda to hold, own, enjoy, use and develop either individually or in association with others' and that the 'management of land resources must contribute to democratic governance, by nurturing institutions and procedures for resolution of land disputes and conflicts' (Ravnborg *et al*., 2031). The literature on the land Act also indicates that some of the rich households acquire credit which is often used to finance non-direct investments, such as education and health expenditure (Ravnborg, 2013).

This highlights the need for continued support to prioritised EbA activities, such as credit for small enterprises. Within this context, the consultant explored whether the Land Act (land policy) design of using local authorities to control public land and natural resources for ecosystem protection and tourist activities, had been effective in bringing about the desired changes in EbA-related activities, and in fostering EbA integration into the policy and budget financing framework.

In all the four Mt Elgon districts visited (Kween, Kapchorwa, Bulambuli and Sironko), the stakeholders indicated that the Land Act (land policy) required enforcement to ensure compliance because encroachers were putting up resistance. Indeed, the Ugandan government reported that it had successfully evicted encroachers on forest reserves in the Mt Elgon region and in Semiliki (Budget Background, 2014). In some instances, enforcement by local political leaders is difficult because local authorities fear to lose votes and so fail to implement approved local laws. The implication is that the policy is not effective in bringing about the desired change.

Additionally, the policy is not working well partly because the district officials have not seen or read the land policy, and most of the land has no titles and is inadequately covered by the national policy. This notwithstanding, where village chiefs (LCs) are involved, they are enthusiastic and active in interventions aimed at stopping/reversing land degradation. Increasing awareness through providing additional quantities of the policy in both hard and soft copy could improve the effectiveness of the policy and awareness, and ensure EbA integration into the policy and financing framework.

The effectiveness of the land policy is difficult to ascertain using a single policy intervention given the existence of the cause-and-effect relationship.

However, the chain of expected effects between the policy under study and the targeted problem was deconstructed in the form of logic to enable identification of opportunities and entry points into the policy and budget financing framework processes.

As Figure 7 shows, specifying the intermediate effects makes it possible to identify steps that do not function well or gaps, and thus the challenges that the EbA project could help resolve if integrated into the policy and financing framework. For instance, in the chain, the consultant found that district environmental committees lack adequate knowledge and the capacity to handle environmental challenges. Support could be given to such committees, e.g. through providing adult learning for councillors to enable improvement in reading and acquiring adequate knowledge of how to integrate EbA into the policy and budget financing framework.

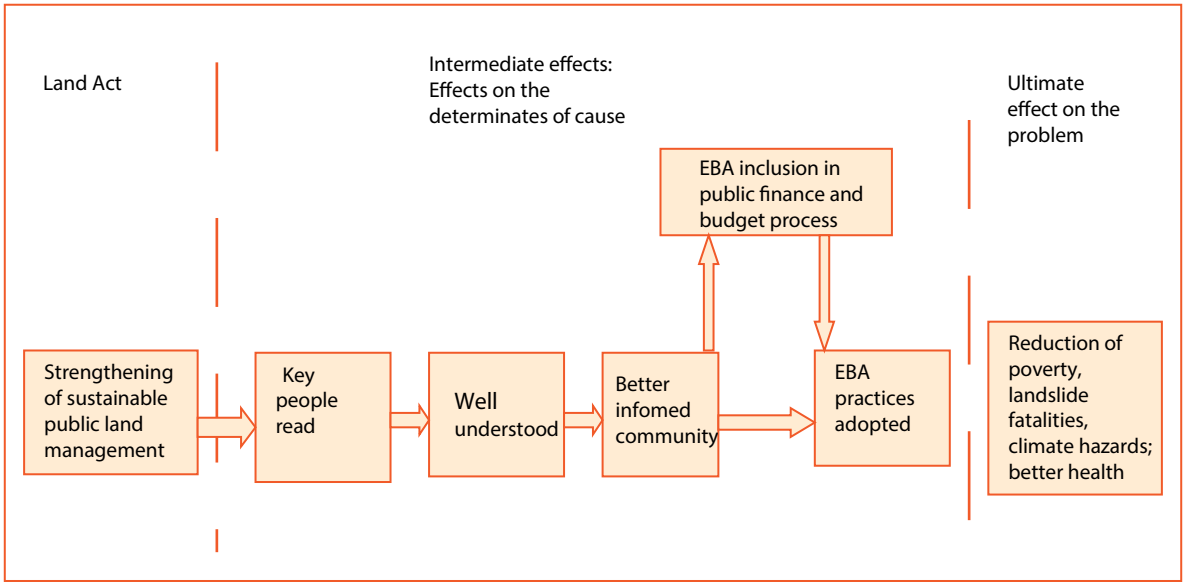

Figure 7: The Land Act (44)1 Logic Model: Control of public land and natural resources by local authorities

6.3.2 Unintended effects

Policy implementation is often difficult without unintended effects, whether positive or negative (Rychetnik *et al*., 2002). Implementation tends to be complex, programmatic and context-dependent. In the analysis, the evidence indicates that 51.4 per cent agreed that there were negative unintended effects created by the land policy implementation. For example, after community residents were displaced by hazardous landslides, conflicts between displaced people due to settlement in the new area ensued. All groups in the four districts reported that to minimise the unintended negative effects, in addition to seeking resources from development partners, the authorities should fully and freely guide and sensitise the communities to protect land, be transparent and conduct comprehensive meetings on measures to minimise unintended effects, provide security for tourists, and approve land for national parks and for the resettlement of displaced people. The opportunity and entry point for EbA is that unintended effects could be minimised and thus redued risks from re-settlement.

6.3.3 Equity

Using local authorities to control public land and natural resources for ecosystem protection and tourist activities was analysed. This was partly because land policy analysis is expected in any investigation of equity and because the land policy is also expected to foster land markets, including rental markets, which have the potential to facilitate access to land for those who, owing to non-economic factors, such as gender or ethnicity, are excluded from gaining access to land.
At the same time, land markets favour the economically resourceful, not only in terms of land access but also of perceived tenure security.

The evidence collected from women councillors indicates that whenever a household wanted to sell land, the consent of women to the transactions was required, especially in Bulambuli district. The transfer of ownership cannot, therefore, be made without the consent of the wife. Additionally, the evidence indicates that in all the districts, the communities are aware that the government has mandated, as part of affirmative action, that at least one-quarter of committee members be constituted by women, a provision adequately implemented in all the surveyed districts.

However, despite legal and policy rhetoric about the emphasis on gender issues in ecosystem and environmental management, social norms, the gendered division of labour and gendered behavioural norms, as well as gendered spaces, limit women's participation in decision-making, which, in turn, influences ecosystem management and adaptation strategies. The imbalance in the gender dimension provided the opportunity and entry point for EbA to seek money to support its integration into the policy and budget finance framework processes.

In line with the national efforts to strengthen land administration, the consultant analysed the financial and non-financial costs/gains linked to the Land Act (land policy) section concerned with local authorities controlling public land and natural resources. The cost items identified were those incurred by the government and individuals. The evidence collected indicates that the costs include expenses such as land surveying, support for land administration and dispute resolution. Other costs include transport to monitor land and non-financial costs such as time. Most of the land in the Mt Elgon districts is not surveyed and its use for obtaining formal commercial credit is on a low scale. The opportunity and entry point for EbA would be to seek funds or use the available funds to research and support programmes related to land management, such as conducting awareness campaigns among stakeholders on the integration of EbA activities linked to land management into the policy and financing framework.

6.3.4 Feasibility

The consultant analysed whether the required human, material and technological resources were adequate to implement the Land Act (land policy). This was because the feasibility of the policy depends on the availability of the required resources, including personnel, material resources and technological resources (Pineault & Daveluy, 1986; Sabatier & Mazmanian, 1995; Swinburn *et al.,* 2005).

The evidence collected indicates a lack of adequate funds and logistical resources (motorcycles, motor vehicles and human resources capacity). Moreover, the respondents revealed that human resources could be available but the lack of funds impacts negatively on work. The opportunity for EbA is to seek resources and support human resources that could aid in ensuring the integration of EbA into the policy and financing framework processes in land work.

In considering the feasibility of the policy, the consultant analysed whether the Land Act (land policy) falls under the department that has the right mandate to implement it. This was because the distribution of roles between levels of government (municipality, town and sub-county) needs to be considered and conformity with existing legislation needs to be verified (Pineault & Daveluy, 1986; Buffet *et al*., 2011). Moreover, if the land policy involved several other sectors besides the natural resources department in the districts or the Ministry of Lands, the limits of each agency's mandate would have to be respected.

The majority (98 per cent) of the respondents indicated that the implementation of the Land Act (land policy) falls under the department that has the right mandate to implement the policy. This is important as the policy is able to target the right decision-makers or stakeholders, who would be held responsible and accountable in case any issues arose and who could facilitate the integration of EbA into the process policy and for routine financing.

6.3.5 Acceptability

To analyse the acceptability of the land policy, the consultant considered the stakeholders affected by the objectives and the implementation of the policy. This was because any policy that does not garner enough support (including support by public opinion, and by those with economic and financial power) is likely to face difficulty being adopted and implemented and in producing the desired effects (Salamon, 2002), and may not be integrated into the policy and financing framework processes. The evidence collected indicates that the affected people are the local community, the government, those benefiting from land and immediate neighbours.

However, the degree of coercion associated with the Land Act (land policy) exists. A myriad of other policies also exist, including less coercive policies (such as information campaigns), moderately coercive policies (e.g. a public subsidy to encourage certain kinds of behaviour) and more coercive policies (e.g. regulations prohibiting or making mandatory certain kinds of behaviour) (Salamon, 2002). Nevertheless, the stakeholders think that ecosystem-related problems (such as landslides or floods) should be addressed by organisations separate from the government, such as community-based organisations (CBOs).

They believe that enforcement should be emphasised. They also believe that, though people want exclusive rights, they do not, on the other hand, want anybody from elsewhere to control the land. This would provide opportunities and entry points for EbA integration into the policy and financing framework, ensuring community protection and ownership.

7. HOW TO TAKE ADVANTAGE OF OPPORTUNITIES, LINKED REVENUE

The specific identification of the types of gaps was facilitated by using a policy mix illustrated in Table 9. The advantage of a policy mix matrix is its ability to indicate, which policy instrument types might be underrepresented, thus, revealing the gap and opportunity.

The policy instruments help in shaping and managing people's behaviours. The policy instruments include economic, regulatory, direct expenditure and institutional instruments. Policy analysis reveals that the mix of policies results in inadequate improvement in adaptation.

Table 9: Policy matrix for identifying the instrument

Description	Drivers	Pressure	State	Impact	Effect*
DPSI	Demographic changes, economic and societal processes	Land use change, resource extraction, emissions of pollutants and waste, and modification and movement of organisms	Climate change, stratospheric ozone depletion, changes in biodiversity and pollution, degradation of air water and soils, landslides, flooding, river bank erosion	Health, economic performance, material assets, good social relations, security	
Economic instruments	Market creation instruments, e.g. tradable permit Revenue-creating instruments Subsidies Moral suasion	Project operations Carbon tax	Landslides, flooding, degradation of air, water and soils, deforestation	Health, low incomes, food insecurity, malnutrition	+
Regulatory instruments	Enforcement activity	Settlement policy in hilly areas	Climate change policy Land policy	Health, economic performance	-
Direct expenditure	Research and development Moral suasion Programme/ project operation	Innovation			+
Institutional instruments	Internal education Internal policies and procedures		Climate change	Material assets	++

Notes: DPSI implies, Drivers, Pressure, State, Impact

7.1 Economic Instruments

Economic instruments are measures that directly influence the price that a producer or consumer pays for a product, behaviour or activity. Examples of revenue-generating instruments include tradable permits, deposit refunds, performance bonds, taxes, earmarked taxes and funds, user fees, subsidies, tax breaks and administrative prices, or specific instruments such as emission permits, such as carbon dioxide and development quotas for tourism construction. Economic instruments are known for shaping and managing people's behaviour into a desired norm. The climate change policy and the National Environment Management Policy (NEMP) have not provided adequate advice on the use of such instruments to influence community behaviour towards EbA. In this regard, the EbA project could carry out research and advise on ways to inform the stakeholders on policies that ensure the effective use of economic instruments for sustainable land management and on the use of district environment committees for improved EbA.

The land policy enables the use of collateral for obtaining formal credit and thereby enabling both land-related and non-land-related investment. However, most of the land in the Mt Elgon region has no title and the use of economic instruments is still on a low scale. EbA activities could explore ways to inform policy about the need to utilise economic instruments and to improve community incomes by advising local communities and the government on the use of the instruments.

7.2 Direct expenditure

In terms of direct expenditure, governments may influence producer and consumer behaviour by channelling expenditures directly at the behaviour they want to encourage. This can be achieved through directly supporting the operations of programmes/projects. With regard to the climate change policy, the environmental policy and the Land Act, the Ugandan government could put or increase in the budget amounts of money for programmes and projects directly linked to ecosystem protection and restoration in the Mt Elgon region. However, this has not been adequately done. The EbA project could utilise the opportunity through steadfastly contributing to and supporting new short-term projects aimed at improving EbA activities that fit within the implementation plans.

7.3 Green procurement

Green procurement is another aspect providing an opportunity for EbA entry in financing processes. Governments can opt to spend their routine procurement budgets on goods and services that spur EbA pathways and goals. As government resources are inadequate, the EbA project could utilise the opportunity by continuing to support efforts aimed at improving adaptation, such as promoting the establishment of commercial tree nursery beds and river bank plantations.

7.4 Research and development

Research and development present another area where governments could allocate budget expenditures to research and development directed at specific environmental goals, such as sustainable land management for climate change adaptation. The EbA project could consistently utilise the opportunity of funding research and development aimed at sustainable land management for climate change adaptation since funding for government programmes is a little slow in coming.

7.5 Moral suasion

Moral suasion is an important aspect where direct expenditure by governments (Uganda, Nepal and Peru) may adequately positively influence EbA activities. In this respect, governments can encourage behavioural changes consistent with ecological goals by funding programmes

designed to provide information and education to raise awareness. These moral suasion and education programmes are based on the premise that people behave in environmentally harmful ways because they lack information and knowledge, and that if they have good information they will do the 'right' thing (Barg *et al.,* 2000). Moreover, evidence from the analysis indicates that some people mistake degrading the environment for utilising it and thus require sensitisation. However, the support of the Ugandan government for moral suasion in the Mt Elgon region is inadequate and limited. The EbA project could leverage this gap by supporting EbA activities through moral suasion that emphasises sustainable public land management and tourism sites protection and through supporting the involvement of local leaders in EbA work.

7.6 Regulatory

The use of regulatory instruments relates to creating changes through legal avenues. There are laws that bar the community from degrading the ecosystem in Uganda. The legislative instruments are the Acts and regulations passed to authorise the carrying out of legal mandates for change. However, regulatory instruments like enforcement and liability which induce social-response behaviour by establishing legal liability for activities such as natural resource damage, non-compliance and fees, are poorly implemented. In the survey, the respondents indicated that the environment was degraded because enforcement was inadequate and consequently people had continued to cut across hills for settlement, which had partly caused fatalities from landslides in the community. Moreover, according to one respondent, communities settling in areas considered inhabitable viewed themselves as utilising natural land, and would prefer being advised on utilising the land to being evicted. The EbA project could explore ways to fill the gap in the regulatory instruments as it is inadequately emphasised.

7.7 Institutional capacity

The institutional capacity affects the work of the government itself in efforts to promote change. In some instances internal efforts to improve skills among technical officers and increase their number are important for coordinating the policies. For the climate change department, however, the challenge is in attaining the required number of staff and improving knowledge capacity for climate adaptation among stakeholders, particularly in the countryside. The EbA project could support the policy by enhancing consistent information flow to the countryside.

8. CONCLUSIONS AND RECOMMENDATIONS

The purpose of the report was to provide information on policy gaps and the entry points EbA can take advantage of in the public sector policy and budgetary processes. It was also to probe the conditions in which the identified gaps and entry points can be considered for planning and budgetary processes.

The climate change policy is likely to cause the desired change because several activities are already taking place and the implementation process seems to have a favourable condition. However, as policy formation and implementation focus on the role of individuals in the process of policy implementation, substantial capacity-building is required among the EbA project stakeholders. Consistently, the EbA project could utilise the opportunity of supporting the region's human capacity by enabling access to training and credit facilities.

EbA-related policies are applied within complex systems characterised by multiple interrelated processes that interact in a non-linear manner and adapt to changes. Unintended consequences of the climate change policy are likely to occur. Comprehensive planning and implementation of EbA activities are necessary after integrating EbA into the policy and financing framework.

The policy mainstreams gender but women's roles are not adequately spelt out at the implementation stage. For instance, public land management and agricultural practises, such as mulching, fail to stipulate which gender dimension was responsible for. In some instances, men will take possession of fertile land, leaving women with less fertile land, which creates disharmony in families. Additionally, 'the specific role of each gender was found [to have been] left for districts to implement'. However, the likely implication is that the failure of districts to adequately address equity could imply failure to support hard-pressed members of the community. As gender equity is not fully addressed, the EbA project could continue enhancing activities that promote gender balance as the entry point into the policy and budget financing processes.

Government expenses on policies are reflected in national and local government budgets. However, the spending plans published in the annual budget are not always actual amounts of funding released to the relevant spending agencies. The implementation of policies is, therefore, affected because less money than planned is usually received. The variation in actual expenditure provides an opportunity and entry point for EbA as budgets and policies can be focused on specific regions and actual amounts spent.

Most stakeholders appreciate the ideas and issues related to climate change. Moreover, the stakeholders are concerned with the objectives and implementation of a climate change policy and how the policy affects them directly. EbA has the opportunity of working on a theme that is liked by government players as well as the international community, which favours its into entry into the policy and financing framework.

In analysing the effectiveness of the policy, the respondents were asked if they thought the guidelines provided were applicable over the long term. The evidence collected indicates that only 44.1 per cent agreed

that the policy guidelines were likely to be sustainable.

There is need to update policies to make them work well. The policy implementation process uses grass-roots individuals (local people) and the guidelines provided could be applicable over a long period of time. Moreover, policies are expected to be more effective when local communities come up with guidelines that are sustainable. Also, the local communities are supposedly better placed in communities to manage their environment and natural resources. The opportunity and entry point for EbA could be to seek resources and request the line ministry to have the policies updated, in the process integrating EbA activities, which would ensure routine financing from government budget.

Policy implementation involves difficult decision-making due to the need to balance competing interests. Different choices are necessary and result in winners and losers among local stakeholders, which calls for environmental and natural resource management. The unintended negative effects created by the environmental policy designed to address mountain and hill ecosystems by using district environment committees were investigated.

Gaps, opportunities and entry points can be identified for EbA integration into the policy and financing framework, given the likely unintended negative effects. People are displaced, especially through relocation to other areas, thus losing their natural social fabric and livelihoods. People also move into gazetted areas and lose their lives owing to inadequate health and environmental services, the depletion of bamboo vegetation and medicinal plants, and the refusal to plant vegetation on river banks, thus exacerbating erosion. The unintended effects provide gaps, opportunities and entry points, for which EbA can seek funds or utilise the available funds to support policy and budget framework processes that save lives.

Economic instruments are known for shaping and managing people's behaviour into a desired norm. The climate change policy, Land Act and the National Environment Management Policy (NEMP) have not provided adequate advice on the use of such instruments to influence community behaviour towards EbA. In this regard, the EbA project could carry out research and advise on ways to inform the stakeholders on policies that ensure the effective use of economic instruments for sustainable land management and on the use of district environment committees for improved EbA.

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ANNEX: 1

Sample Questions used in the analysis of policies

Effectiveness

- What are the effects of the public policy under study (positive, neutral, negative) on the targeted health problem?
- How effective is this policy in terms of its intermediate effects?
- Is the intervention logic of this policy plausible?
- How does the implementation context influence this policy's effectiveness?
- How much time is needed before effects can be observed? Do the effects persist over time?

Unintended effects

- Does the policy under study produce unintended effects, whether positive or negative?
- How can the negative unintended effects be mitigated?

Equity

- What are the effects (intended or unintended) of the policy under study on different groups?
- Does this policy create, reinforce or correct social inequalities in health?

Cost

- What are the financial costs and gains for the government? For other actors (industry, community organizations, consumers, taxpayers, etc.)?
- How are the costs distributed over time?
- To what extent are the costs apparent?
- How do the costs of the policy under study compare with those of other potential policies, including that of inaction? What is the cost-effectiveness of the policy under study for the government, for society?

Feasibility

- Are the required human, material, and technological resources available?
- Does the policy being studied fall under the legal jurisdiction of the authority who wishes to adopt it? Is it in conformity with existing legislation?
- Is this policy a follow-up to a pilot program?
- Can this policy be administered by pre-existing mechanisms?
- Is the authority promoting this policy also the one that will implement it?

- If not, how many different actors are involved in implementing this policy? Are they effectively guided by the policy's promoters? Do they cooperate well?
- Do the opponents of this policy have the ability to interfere with its adoption, its implementation?

Acceptability

- Which actors are or would be affected by the public policy under consideration?
- Is the problem targeted by this policy considered a social issue that requires intervention? What are stakeholders' reactions to the idea of intervening to address this problem?
- How do stakeholders think the issue should be addressed?
- What do stakeholders think of the proposed policy? Of its effectiveness, its unintended effects, its equitability, its cost, and its feasibility? Of the degree of coercion it involves?
- What do stakeholders think of the conditions surrounding adoption and implementation of this policy?
- Can the policy's acceptability evolve during the period in which it is being implemented?

Respondents of the EbA Policy Analysis study

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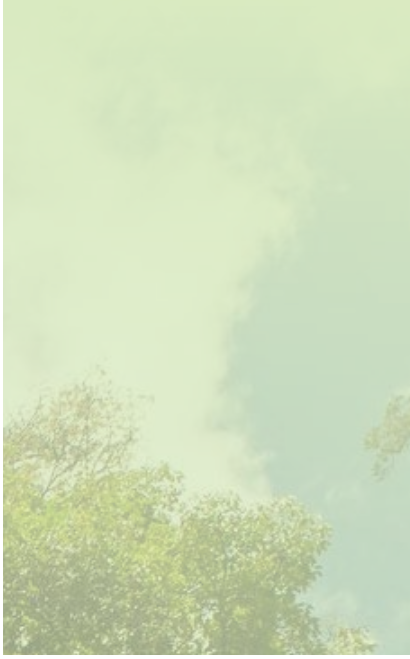

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