

Policy and institutional mechanisms to address climate change and human development issues in Uganda

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ABSTRACT

Uganda has established numerous policy and institutional frameworks to counteract the negative impact of Climate Change (CC), since the adoption of the United Nations Framework Convention on Climate Change (UNFCCC) in 1992. There have been concerns, however, that the implementation progress is debilitated by a surge of deficiencies ranging from policy to institutional mechanisms. Several institutional actors, for example, were said to remain anonymous, disparate and uncoordinated, causing parallel initiatives that could stifle the effort to address CC.

This article, presents results of a fieldwork and desk research study conducted to analyse the major policy and institutional mechanisms, as well as, the actors involved in CC efforts in Uganda. The article reviews major CC-related policies, actors and institutional arrangements, to establish how far they represent suitable mechanisms of dealing with the problem; and in essence fostering human development (HD). The discussion highlights on who is doing what, with whom and with what progress – across the spectrum of government, development partners, NGOs, private sector and research institutions. The study established a great effort by different stakeholders, but their initiatives remain largely disparate and weak. This is due to poor coordination and communication, exacerbated by weak organisational structures, poor inter-agency relations, limited human skills and technical capacity, and failure to enlist the private sector and local governments to support responses to CC-HD. The need to establish a national CC policy (currently lacking), create more formal and authoritative institutions, promote institutional and human resource capacity, and strengthen monitoring are advocated.

INTRODUCTION

General opinion in the development discourse indicates that climate change (CC) poses a great threat to human development (HD) and well-being of all countries, including those that have far less contribution on the emission of greenhouse gas (GHG) concentrations in the atmosphere. The African continent climate *hot spots* mapping exercise identified the arid-semi-arid parts of eastern Africa (including Uganda) to be vulnerable to climate change and variability (Thornton *et al.* 2006).

Uganda's vulnerability to the negative impact of CC and variability is exacerbated, by its dependence on agricultural production, which is the lifeblood of the economy and almost exclusively rain-fed.¹ The heavy reliance on natural weather conditions mean that the rise in temperature, redistribution of rainfall, and more frequent flooding and droughts in Uganda have caused considerable damage to agricultural production and livelihood. The eastern, northern and south western parts of Uganda have suffered worst with human deaths, famine and destitution as a result of extended droughts, landslides and floods.² Other risks to CC vulnerability include: the high poverty levels and high reliance on wood fuel for energy that creates a heavy burden on natural resources like forests; the limited human and financial resources to deal with disaster preparedness and management; and the weak institutional capacity that manifests in poor coordination and collaborative arrangements towards CC mitigation and adaptation efforts (Obong 2008; Hepworth and Goulden 2008).

While there have been efforts in the form of policy and institutional mechanisms in different sectors to counteract the negative impact of CC in Uganda, there are concerns that the implementation progress lacks proper co-operation and activity co-ordination. There are also deficiencies in institutional and policy mechanisms, all of which debilitate the adaptation and mitigation efforts (MWE 2008; DFID-Uganda 2008; NAPA 2008; Obong 2008). Many of the institutions and actors remain anonymous, disparate and uncoordinated, with a danger of causing parallel initiatives that can stifle the effort to address CC in Uganda (Hepworth and Goulden 2008).

This study, examines and documents the major policy initiatives and institutional actors and activities that deal with CC in Uganda.

The study was guided the following research questions:

- what are the major policy frameworks related to addressing CC issues in Uganda and what are their strengths and limitations?
- who are the key institutions and actors on CC in Uganda; what is the nature of their CC related activities; and with whom and how do they collaborate?
- what are the institutional actors' challenges in addressing CC?
- what are the possible policy and institutional mechanisms to improve the effort in addressing CC challenges in Uganda?

The study's methodology involved face-to-face interviews conducted with key focal persons from institutions and agencies dealing with CC issues, identified as, Government, Development Partners, Civil Society Organisations, Private/Business sector and University/Research bodies. Interviews were complemented by desk research in reviewing documents and analysing major policy and institutional interventions.



CONTEXTUALISING CLIMATE CHANGE AND HUMAN DEVELOPMENT

Human development (HD) is a recurrent development notion, seen as both a process and a goal towards expansion of human capabilities, freedoms and choices, and empowerment (UNDP 2010). HD is an end when human welfare issues like household income, health, education, and empowerment are addressed, but also a means to an end in the context of long-term sustainable development for any prosperous society/ nation. HD is underscored as a prerequisite for the least developed countries' (LDCs) quest for development. HD is about what people can do and become—their capabilities—and about the freedom they have to exercise with real choices in their lives (UNDP 2007).

CC, threatens the very meaning of human development by eroding human capabilities and endangering the basic means of human livelihood. *The Global Human Development Report 2007/2008* demonstrated that the impact from CC, caused by the increasing levels of greenhouse gases can lead to a myriad of problems affecting HD, whereby people's abilities to lead long and healthy lives, to be knowledgeable, to have a decent standard of living, and to participate in community life with dignity and self-respect are grossly affected.

The danger of CC to HD is, particularly, described by the negative impacts of CC on agricultural productivity and food security, ecosystems and biodiversity, water resources, and human health. CC disasters like weather extremes, changes in rainfall patterns, heat and cold waves, and increasing droughts and floods cause deprivation and social inequities, and affect people's abilities to lead long and healthy lives, to be knowledgeable, to have a decent standard of living, and to participate in community life with dignity and self-respect (UNDP 2007).

The above issues explain why CC and HD have become rallying themes in many policies of nation-states and international development agencies in recent years. Thus any attempts to deal with the dangers of CC through policy and institutional mechanisms are squarely viewed (in the context of this discussion) as mechanisms to address HD needs, as well.

POLICIES TO ADDRESS CLIMATE CHANGE AND HUMAN DEVELOPMENT

The discussion on country efforts towards CC cannot be thorough, outside the shadows of international policy regime and partnership. It is pertinent to highlight Uganda's position in the international arena by linking it to some international and regional initiatives on CC.

International and regional policy highlights

Uganda ratified and has been involved in implementing international protocols related to CC. Uganda joined the Community of Nations and ratified the UNFCCC. It acceded to the Kyoto Protocol, and has been involved in continental and regional initiatives pertaining to CC. Key national actions Uganda took to implement the international policy and protocols include:

- Establishment of the Climate Change Unit (CCU) within the Ministry of Water and Environment (MWE), to primarily support implementation of the UNFCCC and the

Kyoto Protocol; and to offer national guidance, collaboration and technical support required to deal with the dilemma of CC.

- Setting up the National Adaptation Programmes of Action (NAPA) – a short-term adaptation intervention and institutional framework for carbon trade activities by MWE.
- The National Development Plan (NDP 2010-2015), which recognised CC as an explicit enabling sector for performance of the Ugandan economy.
- Adopted the Vulnerability and Adaptation Assessment for the Water, Agriculture, Energy and Forestry sectors.
- Participation in East African Community (EAC), regional sectoral support programmes such as the Nile Basin Initiative (NBI) and the Lake Victoria Environmental Management Programme (LVEMP), which have the potential to contribute to CC adaptation.
- Participation in the Clean Development Mechanism (CDM) capacity building activities and projects, as well as, public-private partnerships aimed at boosting carbon market investment in Africa with international collaboration.

Whereas the Kyoto Protocol established the (CDM) with a twin objective of assisting developing countries to achieve sustainable development and assisting industrialised countries to meet emission reduction commitments, Uganda has experienced some limitations. There has been a lack of capacity to develop projects; limited number of attractive large-scale projects; and generally the poor investment environment, which confronts most African countries (Hepworth and Goulden 2008).

Uganda has participated in several meetings of Conference of Parties (COP) to renew efforts towards CC. However, there are misgivings against the COP, especially regarding the lack of commitment and failure of the North to fulfil financial pledges made to the global South.³ While COP has promoted interest over CC issues, the delegates of COP 15 in Copenhagen expressed dissatisfaction over COP's failure to inform policy and strategies on revitalising the CC effort.⁴

Climate Change Related National Policies and Initiatives

The National Environment Action Plan (NEAP)

During 1991 to 1994 the Government of Uganda developed a National Environment Action Plan (NEAP) that led to the formulation of the National Environment Management Policy (NEMP) of 1994. The NEMP provided a basis for the formulation of a comprehensive environmental legal framework under the 1995 Constitution of Uganda and the *National Environment Act*, 1995. The NEMP informed various environment – CC related policies/ legislative instruments, such as the *Water Act*, 2000; the *Land Act*, 1998; the *National Forestry and Tree Planting Act*, 2003; the 2004/5-2007/8 *Poverty Eradication Action Plan* (PEAP), the *Plan for the Modernisation of Agriculture* (PMA) among others (Akello, 2007).

While the policies highlighted above express a range of regulatory regimes that are relevant to environmental issues in general terms, they lack an explicit focus on CC, whose orientation, characteristics and complexity need specific mechanisms outside the general environmental issues. Uganda currently lacks a national policy on CC, despite its laudable advocacy, practices and presence on CC at the international scene. The following sections



make analytical highlights on some key policy programmes that Uganda has passed, with relevance on CC adaptation initiatives.

The National Adaptation Programme of Action (NAPA)

The Government of Uganda, through the CCU developed the NAPA on CC, which has been lauded as significant in setting a political and policy direction to climate variability and CC adaptation in Uganda. The development of the NAPA elicited the traditional coping strategies to climate variability, as were identified by the communities, and integrated them with the national development and MDG goals to give rise to common intervention priority areas that consisted of land and land use, farm forestry, water resources, health, weather and climate information and awareness creation, policy and legislation.

The implementation of the NAPA faced challenges that have affected its adequacy in responding to CC adaptation in Uganda. These include, poor understanding and appreciation of CC issues and its impacts, which undermined support in resource allocation; lack of detail on how projects were costed; inadequacies in technical capacity and financial resources; and weak institutional and coordinating arrangements, reflected in the low levels of commitment from line ministries and the low profile of the steering committee.⁵ Besides, NAPA was conceived as something of an emergency response to the demands of COP7 to address immediate adaptation needs; and it therefore, fell short of addressing broader CC challenges facing Uganda.⁶ Besides, the NAPA has not yet been effectively integrated into the local government and community based operations, and this affected community-based strategies.

Plan for Modernisation of Agriculture (PMA)

Uganda adopted the PMA, implemented through the Agricultural Sector Programme Support II (2004-2009). The PMA's adaptation mechanism has been to ensure *inter alia* the development of drought resistant cultivars, provision of water for production, agricultural information dissemination, training and research (Twinomugisha 2005). The PMA has been a commendable intervention in promoting agricultural production, increasing land and labour productivity, competitiveness and private sector participation.

Despite its relevance in reducing the vulnerability of the agricultural sector, the PMA lacked an explicit focus on CC (Hepworth and Goulden 2008). Concern was raised on its failure to provide proper strategic consideration on the likely shifts in climate and the associated implications of water use, pests and disease prevalence, crop production and animal husbandry. There was a fear that the risks could increase if local communities shifted to alternative farming systems such as specialising in climate sensitive crops, as opposed to diversification (Hepworth and Goulden 2008).

National Disaster Preparedness and Management Policy

The National Disaster Management Policy was developed in 2010 by the Office of the Prime Minister (OPM), under whose docket the mandate to ensure effective development of systems and capacity to reduce and manage disaster risks. The policy intended to manage both, the natural and human induced disasters with a focus on reducing risk and vulnerability at household, community, workplace, and national levels. The policy aims at establishing and sustaining capacity to detect, track, monitor and disseminate information on phenomena and activities that trigger disaster events.

The effectiveness of the policy is yet to be tested, but it provides a shift from the previous reactive approach that made disaster management a near misadventure, where attempts to deal with disasters came after the calamity had struck. The *fire-brigade* approach was exposed by the failure to anticipate and effectively respond to the wide spread disasters of droughts, floods, and landslides in northern, eastern and western Uganda during 2007-2010. By June 2012 the OPM was yet to establish disaster preparedness and management institutions at national and local government levels, as earmarked in the policy. The challenge remains financial limitations and how to secure compliance from different governmental and non-governmental agencies.

National Development Plan (NDP) – Integrating the Poverty Eradication Action Plan (PEAP)

The current NDP 2010-2015 replaced the PEAP as a primary national strategic plan that anchors government's fiscal strategy and lower level or sectoral plans, which prioritises interventions for the next five years. The NDP recognises CC as an explicit *enabling sector* that is critical on the Ugandan economy. The NDP acknowledges global warming and other adverse effects associated with CC as having affected sustainable development.

The NDP earmarks four strategic interventions, with regard to CC. The *first* relates to the implementation of the UNFCCC through domestication of its protocols; strengthening the CCU; undertaking CC sectoral studies; and developing a Climate Change Policy. The *Second* aims to redefine CC as a development issue through increased awareness and training; resilience to adverse impact of CC; institutional and manpower capacity; research, data generation; and development of sectoral guidelines for mainstreaming CC. The *third* aims to promote incentives for clean development through, public education on emissions and global warming; incentives to reduce emissions; private sector participation in clean energy; reduce overheads for CDM projects. The *fourth* aims to implement CC conventions through following up on commitments; implementing COP decisions; and participation in CC fora (MoFPED, 2010: 316-317).

The above demonstrates supportive framework to address CC issues in national policy. The challenge remains on how these efforts will be effectively integrated and coordinated across the sectors to avoid duplication and disparate implementation.

Other Policy Challenges to Climate Change

A misconception was reported, especially within governmental bureaucracy, where CC is easily dismissed / lumped up as a general environmental issue and less of a serious developmental concern. This affects priority in budget allocations and steadily transforms into a policy lapse.⁷ Stakeholders argue that this partly explains why CC issues have continued to receive only, a paltry financial allocation from central and local government budgets. A review of three consecutive reports of the Joint Annual Review of Decentralisation (JARD) in Uganda bears no tangible reflection on CC (see JARD, 2004, 2005 and 2006).

Uganda apparently lacks a CC policy, in spite of its involvement in international CC protocols. While there are on-going efforts to establish one CC policy framework for the EAC region, the NGO stakeholders noted that the EAC policy effort is being undermined by the general lack of a consultative framework to enlist local stakeholders in the region, which is likely to lead to a policy that is inconsistent with local realities.⁸



CLIMATE CHANGE INSTITUTIONAL ACTORS' ANALYSIS

This section takes stock and analyses the initiatives and capacity of the key institutional players and actors on CC in Uganda including: Government, development partners, CSOs, professional/research bodies and private/business sector. Institutional capacity involves not only human and financial resources, but also organisational-structural arrangements in the form of systems, processes, collaboration and support, information and communication. The following sections analyse: who is doing what; with whom and how do they collaborate; and with what challenges and prospects in relation to CC focal sectors.

Government Institutional Action

Key players include, Ministry of Water and Environment (Department of Meteorology, Climate Change Unit, Directorate of Water Resources Management); the Ministries of Agriculture; Health; Local Government; the Office of the Prime Minister; the National Environmental Management Authority (NEMA); National Agricultural Research Organisation (NARO); the National Forestry Authority (NFA), Uganda National Bureau of Standards (UNBS); National Water and Sewerage Corporation (NWSC); Parliamentary Forum on Climate Change (PFCC); and Nile Basin Initiative (*See table 1 for sector/ activity detail*).

Governmental agencies participate in various activities of governance, support and effort to reduce the country's vulnerability to CC through mitigation and adaptation strategies.

- The MWE coordinates intergovernmental activities on CC, having within its ambit, the Department of Meteorology (DoM) and the Climate Change Unit (CCU).
- NEMA, NFA, UNBS are mandated to enforce environmental regulations and develop standards and mechanisms to promote human and sustainable development, which can *buffer* climate impacts.
- NARO mainly focuses on CC adaptation through agricultural research and support sustainable agriculture in soils, biotechnology, bio-control and breeding programmes for seeds that are resistant to hostile weather.
- The Parliamentary Forum on Climate Change (PFCC) links with private sector/ civil society and government on CC. In collaboration with GTZ, and the Nile Basin Initiative Organisation, the PFCC conducts workshops to analyse the gaps in CC programmes.
- The Office of the Prime Minister (OPM) through its Commission on Disaster Management & Refugees (CDMR) has the responsibility to coordinate effective response to climate induced disasters such as droughts and floods.
- There is an inter-ministerial dialogue where focal ministries consult each other on a number on CC related issues.

Government Actors' Challenges

Structural challenges

The CCU, as a central unit on issues of CC faces serious structural and functioning capacity dilemmas. The CCU was established by a cabinet memorandum to coordinate the national response on CC and it is currently placed under the MWE's Department of Meteorology (DoM). Stakeholder respondents commented that the CCU was an improvised / *ad-hoc* structure that

lacks the formal regulatory basis to authoritatively command direction of governmental and non-governmental actors on CC, let alone enforcing compliance on CC issues.

The debate continues on where the control arm of CC issues in Uganda should be situated. This is compounded by the fact that CC is a multi-disciplinary issue that derives from different sectoral practices. While the MWE is the key focal ministry on environmental issues, some stakeholders argue that MWE is just another ministry, with own budget priorities and agenda to pursue; and may not address the pertinent CC issues of other sectoral ministries like agriculture, energy, health, trade and industry.⁹ Others state that CCU is largely subsumed within the MWE and it is more engrossed in fulfilling its parent ministry's operations and programmes.

Climate Change Unit's internal capacity

Besides the lack of strong policy, the CCU is overstretched; lacking the human resources to spearhead effective coordination and response from various actors on CC.¹⁰ By April 2011, the CCU had barely a total staff of five people, with three technical officers on CC issues. Two of the technical staff members were on short contractual terms financed by the Danish (DANIDA) and one by the Government of Uganda (who had, reached retirement and was engaged on a part-time basis). This represents capacity deficiency, compared to CCU's responsibility that involves coordination of CC response; representing Uganda at international fora; servicing the needs of the UNFCCC, and; the needs of multiple donors and NGO's involved in CC activities in Uganda.

Climate change coordination challenges

Great concern is raised over co-ordination of CC effort and activities within government ministries and agencies. The deficiencies in government coordination have been manifested mostly in the duplication of work activities and poor disaster risk management and preparedness. These weaknesses came to fore during the 2007-9 floods in north-eastern Uganda and the 2010 and 2012 landslides in Buduuda, eastern Uganda, which claimed hundreds of lives and loss of property. Respondents voiced that a great deal of these disasters could have been contained if there was a proactive approach and proper coordination amongst government agencies.¹¹

Other agencies' capacity

Governmental agencies like DoM, NEMA, NFA, UNBS and directorates in the mainstream ministries of Agriculture, Water and Environment, Tourism, Trade and Industry, despite having legal mandates, were reported to have significant scarcities in human resource, financial and technical capacities to undertake rigorous analysis of potential developmental impacts against CC scenarios and are equally weak in enforcing conditions for environmental discipline.¹² NEMA, for example, lacks the capacity to expeditiously review and sanction environmental impact assessment requests and cannot effectively monitor/ enforce environmental regulations.¹³

Poor intergovernmental relations

The alluded to vacuum on co-ordination of CC affects inter-agency activity and relations. It was reported that when the World Bank wanted to pay for carbon products for instance, they



could not easily get the necessary documentation from the MWE officials who kept on being averse and constantly referring them to other government authorities.¹⁴ While there is an inter-ministerial dialogue on CC related issues, there are complaints that some parties often turn back on agreed upon positions. Apparently there are no means to ward-off defiance and non-cooperation.¹⁵

Concerns were raised about intergovernmental conflicts, orchestrated by petty politics, empire-building and jostling for access to funding streams.¹⁶ Troubled relations were reported between the central and district/local governments, especially on the management of natural resources. The episodes in 2005 when almost the entire board and top management of the NFA resigned over government's insistence that NFA issues licenses to investors to use natural forest reserves in Kalangala District for sugarcane and palm oil growing, was mentioned as one major case in point.¹⁷ Other cases cited include attempts to de-gazette Mabira Forest for commercial sugar plantation in 2007, which caused turbulent relations between government (NFA and MWE), on the one hand, and civil society activists on the another hand, resulting in violent protests that claimed several lives.¹⁸

The PFCC could constitute a focal policy support and advocacy arm of the legislature on matters of CC, but it is neither a standing/sessional committee, nor an official agency of the Parliament of Uganda. It is a voluntary advocacy forum constituted by individual parliamentarians who subscribe to CC issues. The PFCC was registered as a private company (limited by guarantee), and was trying to transform into an NGO to meet some requirements of donor support.¹⁹

Development Partners' (DP) action

The key Development Partner players include, World Bank; UNDP; DFID; FAO; UNEP; SIDA; JICA; GTZ and German Development Services; ADB; and the embassies of the Norwegian, Danish, Swedish and Irish (**See table 2 for sector activity detail**).

The development partner actors' mapping shows an all-round sector support in addressing CC.

- The World Bank has provided leadership of the donor community on CC and supports different initiatives on CC. These include World Bank financing a facility through government to support energy for rural electrification, to cut-back on forest cutting;
- The UNDP promotes research and policy, adaptation and disaster risk reduction;
- UNEP deals with adaptation and CC policy mainstreaming and capacity building;
- The Danish Government/DANIDA supports policy formulation, institutional capacity building (directed at the CCU) establishment, climate development planning and support in international negotiation.
- Norway leads in support initiatives on mitigation through forestry activities under Reducing Emissions from Deforestation and Degradation (REDD) and the CDM initiatives, as well as coordination activities of CC;
- Belgium promotes institutional capacity building and together with the Norwegian Government, it supports CDM initiatives;
- The UK Government / DFID supported CC studies and needs assessment by appraising CC impacts and response, advocacy and capacity for the PFCC.

- The German Technical Cooperation (GTZ) has dealt with CC issues mainly through a water resources project, dubbed Reforming Urban Water and Sanitation (RUWASS), and energy initiatives.

While CC issues have become a joint concern in the activities of the two Development Partner Groups (DPGs) (Environment and Natural Resources and Water and Sanitation), there is still need for a CC focal platform and common leadership to deliberate, given that some donors who subscribe to the two DPGs may not have particular programmes or support that specifically targets CC. It is reported that the support on CC issues by donors in Uganda had remained largely disparate and uncoordinated, sometimes bypassing the coordination mechanisms of sectoral working groups (Hepworth and Goulden 2008). The DPGs were yet to develop a collaborative response on CC issues. The challenge is that the choice of development assistance each development partner makes, is ordinarily derived from priorities determined back home, and not necessarily the decisions of joint partner groups.

The other challenge is with donor support choice and processes. Most donor programmes prefer to channel support through government and are commonly reluctant to provide support beyond two years. This implies that donor programmes may lack sustainability. NGOs also expressed displeasure over the preference to channel donor support through government, arguing that government's structural and operational processes are cumbersome and often derailing.

Non-governmental organisations' actions

The Key non-governmental organisations' players include: IUCN focus on CC as a critical thematic area, within the framework of other developmental issues; DENIVA, OXFAM, Environmental Alert, Uganda Coalition for Sustainable Development (UCSD), UWASANET, Nature Uganda, National Association for Professional Environmentalists (NAPE), Uganda Environmental Education Foundation (UEEF), Ecotrust, ACODE, CARE (**See table 3 for NGO activity details**).

The NGOs in general conduct research and have attempted to develop evidence based advocacy; make effort to identify and pilot adaptation responses; engage in education and awareness programmes to communities; and holding government to account for responses towards CC. There is a demonstrable potential for NGOs in Uganda to undertake better key roles in propagating the effort and response to CC threat. The NGO sector in Uganda in general has established collaborative network that is noticeable mainly under two umbrella organisations; the Uganda National NGO Forum and the Development Network for Voluntary Organisations (DENIVA).

NGO Challenges

A growing number of NGOs are focussing on CC but there is no particular leadership on efforts towards CC. Several respondents revealed that NGOs mostly partner with government and donor agencies, rather than amongst themselves as NGOs. The relationship with donors and government is largely driven by and pertains to seeking funding. The NGO actors admitted that it was difficult to undertake joint programmes



with other sister NGOs, since each organisation basically undertakes activities that are prescribed in their individual work-plans and as their budgets may allow; unless such conditions are prescribed by project financiers. Where collaboration existed, it was reported to be loose or still in its infancy. Thus, there was a manifest duplication of activities and effort, especially in the areas of tree planting, community awareness, environmental advocacy, which is further heightened by the existing clamour and competition for donor and government financing.²⁰

Private/business sector

Key players in the private and business sector include: Uganda Carbon Bureau, Uganda Manufacturers Association (UMA), and the Private Sector Foundation (PSF) (**See table 4 for Private sector/activity details**). The relevance of the private/ business sector on matters of CC lies in the need to combat CC through practical steps that can reduce the carbon burden of their products, services and processes. The activities of the private sector through umbrella groups like the UMA and PSF mainly involve awareness and appeal to member organisations to engage environmentally friendly technologies and advocacy to promote the role of business in combating CC.

The Uganda Carbon Bureau was among the first to deal with carbon credits in Uganda and a player on CC mitigation. The company provided professional advice and support to project developers, carbon credit buyers, development agencies and financiers on CC. The Bureau engaged communities to plant trees and preserve forests to get 'carbon credits' from richer countries or companies that want to compensate for the pollution they create.²¹

Private sector/business challenges

Research conducted among 470 of Eastern and Southern Africa Business consortium (ESA-BMO) member companies Botswana, Kenya, Rwanda and Uganda indicate that the private sector's ability to contribute to CC is inhibited by *inefficient government structures, lack of specialised staff* and *limited access to energy efficient technology and finance*. While the government of Uganda, just like Botswana and Rwanda developed the NAPAs, none of them had implemented adaptation strategies that deal with the effects of CC on businesses such as the farming and fisheries industries (the big revenue earners), and the productivity and profitability of businesses in the wake of insufficient/expensive power, owing to extended droughts. Over 66% of industries have no skills or knowledge about energy efficiency in the Eastern and Southern African region and it is difficult to hire qualified professionals in the areas of energy efficiency, renewable and alternative energy and environmental experts.²²

Other challenges reported to be facing the private sector's participation in CC include:

- General lack of awareness among the private sector organisations on what exactly government is doing towards CC. There is no Public-Private partnership arrangement to promote the role of business combating CC in Uganda.
- Over 90% industries are using old technologies, mainly generators and industrial machinery that are not environmentally friendly.²³ The tea factories for example are one of the biggest industrial manufacturers in Uganda, and are currently using firewood as the main source of energy in tea processing.

- Most industries are small-medium with little capital base; the transfer and change of technology is very expensive; leads to increase in cost of production, which burden cannot easily be transferred to consumers. Government has no subsidy to support this.
- New technology was reportedly unavailable on the local market and developing local technologies are equally expensive; there are apparently no incentives to support either development or transfer of new technology.
- A few sugar manufacturing companies had alternative energy sources – biomass from sugar cane husks, while many others that have such by-products cannot use it, because it is an expensive process. Instead, these by products are exported to the neighbouring Kenya.

Research institutions

The key research players include Makerere University's research units, including the Centre for Renewable Energy and Environmental Conservation (CREEC); Department of Geography (housing Meteorology and Environment); the Institute of Environment and Natural Resources (MUIENR); Faculty of Agriculture; Faculty of Forestry and Nature Conservation; and the National Agricultural Research Organisation (NARO). (*See table 5 for sector/ activity detail*).

POLICY AND INSTITUTIONAL MECHANISMS

National Climate Change Policy

Uganda needs to develop a national CC policy, to help resuscitate the earlier attempts made under the NAPA and to serve as a common point of reference to redirect national efforts on CC. The CC policy should reflect a strong commitment to cooperative approaches, utilising partnerships amongst governments, and between governments and communities. The national CC policy could earmark to achieve, *inter alia*, fostering human adaptability through awareness, learning and innovation; enhancing resilience against the negative feedbacks of CC; enforcing compliance of actors and mechanisms; transforming the current *ad hoc* and institutional arrangements into sustainable mechanisms.

Planning and Strategy

The inadequacies of the NAPA implementation have been highlighted, suggesting that there is a need for a comprehensive appraisal of all CC responses, as contained in the NAPA's framework. There is need to reassess the role played by different stakeholders within the central and local government spheres, the communities and development partners. This should culminate into a more strategic action plan that should be harmonised with and supported by the long awaited CC policy.

There is a need to promote CC, not merely as an environmental threat, but a real development issue. While the current NDP 2010-2015 attempts to mainstream CC as a core component of the country's development agenda, it should be translated into action



plans and budget allocation priorities at the central and local government levels. The key sectoral-government ministries such as Health, Water and Environment, Agriculture, Trade and Industry, Energy and Natural Resources, Education should lead the CC mainstreaming process in their activity plans.

Climate change coordination

The deficiencies in CC activity coordination and capacity problems in the CCU would be handled more efficiently by upgrading the CCU from a unit under one ministry to a more autonomous, and overarching commission/authority with an enabling/parent legislation and own budget-line charged from the consolidated fund. Apart from the inter-agency activities, coordination is needed in some critical areas of CC effort, including training human resources, CC research (adaptation and mitigation) and dissemination, weather and climate monitoring for improved data generation, and technology development and climate proofing of development programmes. The development partners need to strengthen their role by setting up a thematic group on CC, either as a separate focal group or within the ambits of the existing environment and natural resources working group.

Inter-agency relations

One way to address the low enthusiasm in inter-agency relations is through the awaited national CC policy, which should support structures beyond the existing *ad hoc* arrangements, to link the effort of sectors such as energy, agriculture, water, health, finance and education. In this regard, the current inter-ministerial dialogue should be transformed into a formal and authoritative inter-ministerial committee on CC, to constitute political and technical stakeholders to provide guardianship and the political-policy campaign on CC mitigation and adaptation.

Institutional capacity

There is need to strengthen the existing institutional arrangements to promote effective environmental governance. Government authorities like NEMA, NFA, and UNBS require strengthening in human resource, financial and technological capacities to effectively enforce conditions which can conserve the natural resource assets (e.g. wetlands/forest/freshwater resources). The PFCC which draws members from Parliament has a focal advocacy potential, but it must transform from its current state of a voluntary organisation to a regular committee of the legislative arm of government.

Sub-national government forum

The role of local governments and the local community is often highlighted as being critically complementary to national policy implementation success. There is a need to establish a local government forum to revitalise the efforts of NAPA villages and civil society groups to regularly review and undertake appropriate actions to address CC and HD threats.

Private sector concerns

It is necessary to establish national and local public-private partnerships on CC. This will enable the integration of private sector business stakeholders who are currently neglected in the discussions and implementation of CC programmes.

Energy and technology issues preoccupy the concerns of the private sector in as far as CC is concerned. There is a need for the energy strategy and energy efficiency plan to provide alternatives to the old industrial systems and technologies that emit dangerous gases into the ecosystem. The strategy is to introduce investment incentives and tariff subsidies to industrialists who use efficient technologies or import expensive modern technologies.

CONCLUSION

The institutional actor analysis reveals an array of different players in Uganda and a commendable effort to counter the negative impact of CC through multifarious sectoral priorities and activities. However, the rather good attempts to combat CC continue to be faced with weak policy and institutional mechanisms that fall short of addressing adaptation and mitigation efforts. While there have been major efforts to register CC as a top item on the agenda in recent national dialogue and policy streams – including the NDP 2010-2015, there are still disparate adaptation initiatives, orchestrated by a lack of a strong and effective leadership, poor coordination and communication, especially within government; but also amongst the different institutions and actors. These drawbacks are mainly manifested in the form of weak organisational structures, poor inter-agency relations, limited human skills and technical capacity, limited financial resources, and the failure to enlist the private sector and local governments to support effective responses to CC.

The analysis thus draws on the need to establish a national policy framework for CC; create more formal and authoritative institutions; promote institutional and human resource capacity; strengthen monitoring and coordination, research and policy outputs. The presentation and discussion, thus, provides an understanding of the effort of the different actors on CC in Uganda and it exhibits both the interplay and corollary of policy and institutional factors affecting successful efforts to deal with CC.

NOTES

- 1 Agriculture sector remains the mainstay of Uganda's economy, with contribution to the total GDP 21.5 percent in 2008 and employment 73% (UBOS, 2009).
- 2 Recent CC related disasters include Bududa, Mbale landslides, March 2010; Kabale Floods, October-November 2009 and March 2010; Teso Floods, September 2007 and 2008; Karamoja, Teso droughts 2009.
- 3 Interview, Senior Government Delegate to COP 15.
- 4 Interview, Government Delegate to COP 15.



- 5 Interviews, officials from Dept. of Meteorology and the Climate Change Unit, MWE.
- 6 Interview, NGO and Development Partner officials.
- 7 Interview, stakeholders – the NGO Forum and the Royal Danish Embassy officials.
- 8 Interview, officials from NGO Forum, Environment Alert and UEEF.
- 9 This is a position re-echoed by various stakeholders who interface with the Climate Change Unit.
- 10 Interview, Chairman PFCC; Official, Royal Danish Embassy.
- 11 Interview, Actors and Stakeholders on Climate Change in Uganda.
- 12 Interviews, with officials from MWE, NEMA, NGOs and Development Partners.
- 13 Interview, NEMA Senior official.
- 14 Interview, Senior Environment Specialist, The World Bank, Kampala.
- 15 View expressed by several development partners interviewed.
- 16 View expressed by several development partners interviewed.
- 17 Interview NGO official from Environmental Alert.
- 18 View expressed by a couple of Development Partner agency officials.
- 19 Interview, Chairman Parliamentary Committee on Climate Change (PFCC)
- 20 Interview, with NGO Forum and Environmental Alert officials.
- 21 Interview, Director/Consultant, Uganda Carbon Bureau.
- 22 Research conducted by ESA-BMO (2009) on Energy capacity in business organisations.
- 23 Interview, Policy Analyst, Uganda Manufacturer's Association.

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Appendix

Table 1 Government actors on climate change in Uganda

Government Agencies – Climate Change Actors	Sectors and Activities																			
	Agriculture		Energy		Water & Environment				CC Specific		Cross-Cutting and Specific Activities									
	General Agriculture	Food Security	Renewable Energy	Energy Efficiency	Water Resource	Environment General	Forest/REDD	Meteorology	Carbon Finance	COP 15	Disaster Risk	Health	Livelihood	Policy & Strategy	Coordination	Capacity Dev't	Financial Cooperation	Awareness & Education	Research	Advocacy/Lobby
Ministry of Water and Environment	x				x	x	x			x			x						x	
/Climate Change Unit						x								x				x		
/Dept. of Meteorology						x		x			x							x		
MAAIF	x	x									x			x				x		
MEMD														x						
Ministry of Health																				
Ministry of Local Gov't													x							

continued on next page

Government Agencies – Climate Change Actors	Sectors and Activities																			
	Agriculture		Energy		Water & Environment				CC Specific		Cross-Cutting and Specific Activities									
	General	Food Security	Renewable Energy	Efficiency	Water Resource	Environment General	Forestry/RFD	Meteorology	Carbon Finance	COP 15	Disaster Risk	Health	Livelihood	Policy & Strategy	Coordination	Capacity Dev't	Financial Cooperation	Awareness & Education	Research	Advocacy/Lobby
Office of the Prime Minister											x			x				x		
Parliamentary Forum on CC			x	x	x	x	x	x	x	x	x	x		x		x			x	
NARO	x	x				x	x				x		x		x				x	
NEMA					x	x												x	x	
NFA									x	x				x	x			x	x	
NAADS	x				x															
NWSC					x	x												x		
Nile Basin Initiative					x															
Meteorology Training School	x							x			x									

Source: Field Research and Adaptation from GTZ-Ruwass – Climate Change Actors Landscape (2010)

Table 2 Development partner actors on climate change in Uganda

Development Partners – Actors Climate Change	Sectors and Activities																			
	Agriculture			Energy			Water & Environment				CC Specific		Cross-Cutting and Specific Activities							
	General Agriculture	Food Security	Renewable Energy	Efficiency	Water Resource	Environment General	Forestry/REDD	Meteorology	Carbon Finance	COP 15	Disaster Risk	Health	Livelihood	Policy & Strategy	Coordination	Capacity Dev't	Financial Cooperation	Awareness & Education	Research	Advocacy
African Development Bank											X			X						
Austrian					X										X					
Belgium Embassy	X		X			X										X				
Royal Danish Embassy	X									X				X			X			
DED-German Development Services			X	X											X					
EC Delegation in Uganda	X		X			X													X	
DFID																				X
FAO	X	X			X						X			X		X			X	
GTZ-General	X	X	X	X	X			X						X		X				
JICA				X																
Norwegian Embassy			X		X		X						X							
SIDA												X							X	
UNDP					X										X				X	
UNEP					X									X						
World Bank	X	X	X	X			X	X	X				X		X	X				

Source: Field Research and Adaptation from GTZ-Ruwass – Climate Change Actors Landscape (2010)

Table 3 Non governmental organisation actors on climate change in Uganda

Non-Governmental Organizations Actors Climate Change	Sectors and Activities																				
	Agriculture				Energy		Water & Environment				CC Specific		Cross-Cutting and Specific Activities								
	General Agriculture	Food Security	Renewable Energy	Efficiency	Water Resource	Environment General	Forest/REDD	Meteorology	Carbon Finance	COP 15	Disaster Risk	Health	Livelihood	Policy & Strategy	Coordination	Capacity Dev't	Financial Cooperation	Awareness & Education	Research	Advocacy	
ACODE						X								X						X	
CARE						X														X	
DENIVA																		X		X	
Ecotrust						X												X			
Environmental Alert	X	X				X												X		X	
Global Humanitarian Forum	X					X							X								
IUCN						X															
NAPE						X															
National Organic Agric. Movement of Uganda	X					X														X	
Nature Uganda						X															
OXFAM GB						X															
SNV						X															
Sustainable Watch Network																					
UEEF	X					X														X	
Uganda Forestry Associatn.																					
Uganda Red Cross Society		X																			
Water Aid																					

Source: Field Research and Adaptation from GTZ-Ruwass – Climate Change Actors Landscape (2010)

Table 4 Private/business actors on climate change in Uganda

	Sectors and Activities																				
	Agriculture		Energy		Water & Environment				CC Specific		Cross-Cutting and Specific Activities										
	Food Security	Agriculture General	Renewable Energy	Efficiency	Water Resource	Environment General	Forestry/ REDD	Meteorology	Carbon Finance	COP 15	Disaster Risk	Health	Livelihood	Policy & Strategy	Coordination	Capacity Dev't	Financial Cooperation	Awareness & Education	Research	Advocacy/lobby	
Private Sector Foundation			x	x																x	
Uganda Carbon Bureau							x		x	x						x		x	x		
Uganda Manufacturers' Association			x	x										x				x	x		x
Total																					

Source: Field Research and Adaptation from GTZ-Ruwass – Climate Change Actors Landscape (2010)

Table 5 Research institutions – actors on climate change in Uganda

RESEARCH INSTITUTIONS – Actors Climate Change	Sectors and Activities																			
	Agriculture		Energy		Water & Environment				CC Specific		Cross-Cutting and Specific Activities									
	General	Food Security	Renewable Energy	Efficiency	Water Resource	Environment General	Forestry/REDD	Meteorology	Carbon Finance	COP 15	Disaster Risk	Health	Livelihood	Policy & Strategy	Coordination	Capacity Dev't	Financial Cooperation	Awareness & Education	Research	Advocacy
Centre Renewable Energy & Env't. Conserv- Mak Univ.			x	x												x		x	x	
Geography Dept-Mak Univ.		x			x	x		x								x		x	x	
Faculty Agric- Mak Univ.	x																	x	x	
Faculty Forestry & Nature Conservation-Mak Univ.						x		x								x		x	x	
NARO		x						x					x					x	x	
Inst. Environment & Natural Resource-Mak Univ						x										x		x	x	
Total																				

Source: Field Research and Adaptation from GTZ-Ruwass – Climate Change Actors Landscape (2010)