

# **The pastoralist's parcel: towards better land tenure recognition and climate change response in Kenya's dry lands**

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**Key words:** land administration, land tenure security, social tenure domain model

## **SUMMARY**

Conventional notions of the 'land parcel' have been extended: previously unrecognized tenures including customary, nomadic, or communal interests are now incorporated into the concept. Technical tools including the Social Tenure Domain Model (STDM) enable these new understandings to be operationalized in land administration systems. The nomadic pastoralists of Kenya's dry land regions illustrate where these new approaches can be applied. These regions are exposed to multiple competing interests: export-oriented farming, mineral and oil extraction activities, forestry, and tourism all compete with local livelihood strategies like pastoralism. Competition is further heightened by climate change responses of the actors. This paper frames climate change as an opportunity, not only a threat. It discusses the potential for delivering knowledge, tools, and capacity to secure pastoralist land tenures in order to improve climate change responses. Three example Kenyan counties are discussed to illustrate the issues and confirm where such approaches have utility. It is argued that the interaction between conventional and pastoralist tenures needs more assessment from spatial, legal, economic, environmental and social tenure perspectives. Such knowledge could be used to deliver innovative land policy toolkits, land administration toolkits, and educational toolkits. These can be used for: supporting development of community friendly investment models for local development plans; enabling innovative recording of pastoralist tenures; and improving awareness between stakeholder groups.

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### **1. INTRODUCTION**

In many dry land regions, nomadic pastoralism remains a dominant form of land use (Lengoiboni, 2011). Nomadic pastoralists align their livelihoods with seasonal climate variations by systematically moving livestock to different feed locations (Niamir-Fuller, 2005; Dyson-Hudson and Dyson-Hudson, 1980). The well documented approach has been sustained over millennia.

Nomadic pastoralism is challenged by the concept of private property (McCarthy *et al*, 1999). Conventional private property regimes seek to allocate individual rights to land, traditionally over a fixed and well-defined area. Following the period of decolonization, implementation of these programs became popular worldwide, including regions with arid and semi-arid climate. However, pastoralism activities continued and conflicts ensued, particularly with small holder crop farmers (Homewood, 2004; Mwangi, 2007).

Despite recent policy and legislative improvements, specifically the National Land Policy of Kenya (2007), approaches for practical recordation remain unclear: knowledge on how to record pastoralist tenures in a manner that enables movement across counties is almost non-existent.

The paper aims to provide an overview of proposed work relating to building land administration approaches capable of supporting land polices that promote pastoralist livelihoods. First, the move towards protection of pastoralist land rights and other alternative livelihoods, through concepts such as the continuum of land rights, is discussed. Second, the opportunity presented by climate change response strategies to expedite protection is outlined: groups practicing pastoralism are natural climate adaptors- a secondary benefit of secured pastoralist tenures is the promotion of suitable climate change responses. Third, three areas that highlight this potential are identified: specific land tenure issues and challenges are identified. Fourth, an overview of required work is provided. This is developed based on the synthesis of the three previous sections. Fifth, preliminary results from the work plan are discussed. The paper concludes by summarizing the content of the paper and articulating the next steps.

## 2. PASTORALISM, PROPERTY, AND THE CONTINUUM OF LAND RIGHTS

The centuries old discourse on land tenure ideologies provides the theoretical foundation of this research. Often framed as a debate between private ownership (Hardin, 1968; World Bank, 1975) and more communal forms property holding (Marx, 1848; Ostom, 1994), the discourse has strands across multiple disciplines including economics, law, and social science.

Private property regimes gained supremacy following the cold war. However, awareness of inherent limitations in such regimes grew: in many cases the required land administration systems, financial services, and land valuation tools were lacking (Dale, 2000). More importantly, the societal cognitive capacity to maintain a property market is often found to be lacking (Wallace and Williamson, 2006).

Consequently, the concept of a continuum of land tenure approaches emerged (Payne, 2001; Payne, 2002; UN-Habitat, 2008a; and GLTN, 2012). Rather than being conceived as a trajectory program towards private ownership, it supposes that different tenure arrangements are suitable in different contexts: all should be afforded protection.

Approaches for securing customary tenures, through pro-poor land administration systems, are part of the discourse (FIG, 2010; Zevenbergen et al, 2013). Pastoralist tenures, a specific case, bring unique characteristics: climate dependency, spatial dynamism, inclusion of livestock, and co-existence with other forms of tenure (Lengoiboni, 2011). Whilst these challenges are understood, legal and technical tools for operationalization are lacking.

## 3. CLIMATE CHANGE: POTENTIAL THREAT OR NEW OPPORTUNITY?

Climate changes and related response strategies provide another dimension to the dry lands property question. It can further complicate tenure conflicts through surges in large-scale foreign investment in land, increased nature conservation activities, growth in eco-tourism, more intense forestry regimes, and new oil and mineral extraction programs (Fumagalli, 1978; Talbot, 1986; Homewood, 1995; Fratkin, 1997; Cotula *et al* 2009; Deininger, 2011).

Nomadic pastoralists often lose out in these climate change inspired conflicts. Whilst they are intrinsic climate change adaptors, they are usually weaker economically and legally. Unlike other land uses, pastoralist activities are not often assured by national land policy and administration frameworks (Meinzen-Dick *et al*, 2005; Hobbs *et al*, 2008; Toulmin, 2009). Private owners may be given precedence over customary land tenures (Okoth-Ogendo, 2008).

The climate change mitigation and adaptation discourse offers an opportunity. Agreement is growing regarding the role of pastoralism in supporting sustainable ecological and economic systems (Hesse and MacGregor, 2006; Davies & Hatfield 2007; AU 2010). Moreover, the limitations of conventional private property approaches in some circumstance are increasingly clear. National land policies already reflect the changing ideology (*c.f.* Kenya, 2007).

#### 4. PROVIDING CONTEXT: WEST POKOT, TURKANA, AND KAJIADO

Three specific areas are illustrative of the above issues (Figure 1): West Pokot, Turkana and Kajiado. Combined, they demonstrate the different challenges relating to competing land use generally, and community lands specifically.

Pokot West is characterized by the interface between subsistence agriculture and pastoralism as well as conflicts arising from boundary challenges between the Pokot and Turkana stakeholders. The conflict in the Pokot-Turkana region has resulted in the creation of no-go zones and the non-utilization of good pastures in the region. Additionally, livestock migratory routes have changed as a result of the contestations.

In Turkana, pastoral land uses coexist with riverine cultivation and fishing: a unique set of tenure challenges is created. These existing issues are being complicated even further due to the recent discovery of oil in the county. The different land uses pose challenges in defining community land and community land rights.

Kajiado is predominantly a pastoral land use area interfaced with agriculture and conservation. However, human-wildlife conflicts abound, as do land disputes occasioned by the subdivision of group ranches and historical land claims arising from the pre-colonial land agreements with colonial governments.



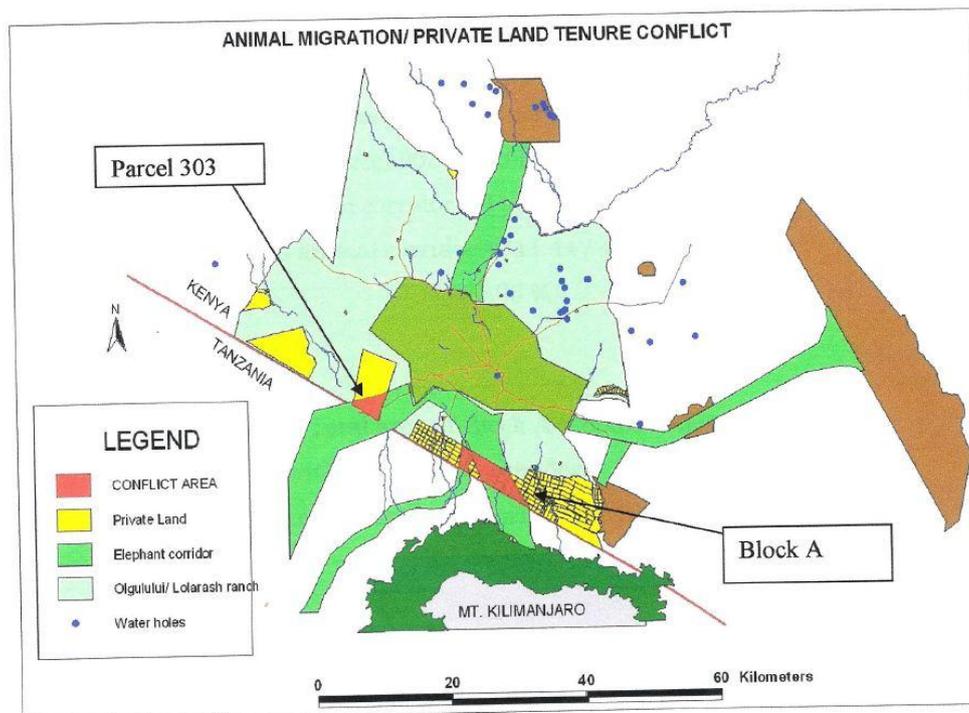
**Figure 1. A few semi-arid sites in Kenya: Turkana, Pokot West, and Kajiado**

## 5. A WAY FORWARD: EMBEDDING PASTORALISM INTO LAND ADMINISTRATION SYSTEMS

The problems relating to Kenya's dry lands and property rights are clear and identified. Indeed, the need to improve protection of pastoralist users is already made explicitly in the national land policy. The challenge now is to operationalize the new ideological support.

Many studies focus on understanding the status quo: pastoralism actors, related resources, and various interactions are studied. For example, ongoing work at the Intergovernmental Authority on Development's (IGAD) Climate Predication and Applications Center (ICPAC) and Centre for Pastoral Areas and Livestock Development (ICPALD) studies Fulani livestock movement from Senegal to Sudan and Ethiopia, and by Borana from Isiolo to Ethiopia. The Conflict Early Warning Response Mechanism (CEWARN) develops knowledge related to conflict and livestock movement. Other works seek solutions. Research at the ITC Faculty of the University of Twente uses earth observation tools for integrated assessment of water resource clashes at Kenya's Lake Naivasha. Work by Dr. Marcel Rutten of the African Studies Centre in the Netherlands aims to establish stakeholder dialogue in several Kenyan water basins: collaborative land and water management approaches are sought. Lengoiboni (2011) describes Kenya's pastoralist tenure regimes and potential alignments with conventional systems. Amongst all sectors, strong impetus remains to continue such work.

Whilst pastoralism is widely studied and even mapped (Figure 2), many migratory routes remain coarsely or poorly documented: only vague ideas exist of how pastoralists move. Moreover, climate change induced shifts in routes are also unknown. This is important in the context of land policy operationalization. Experience shows that successful legitimization of land tenures relies on clear descriptive and spatial identification being understood and available at local, county, and national levels. Adjudication, mapping, and recording processes deliver this point of authority to local communities, governments, and civil society (Henssen, 2010). However, conventional land administration tools, focused on fixed parcels, are not equipped to capture or manage the dynamism inherent in pastoralist tenures. The Community Land Act, being developed by the Kenyan Government, aims to enable pastoralist land such adjudication, demarcation and registration- however, the nature of the processes remains unclear. Developing tools that enable an integrated understanding of the existing and future spatial, legal, social, economic, and environmental (climate change) aspects of migratory routes will support the process.



**Figure 2. Example conflicting tenures map (Wayumba and Mwenda, 2006)**

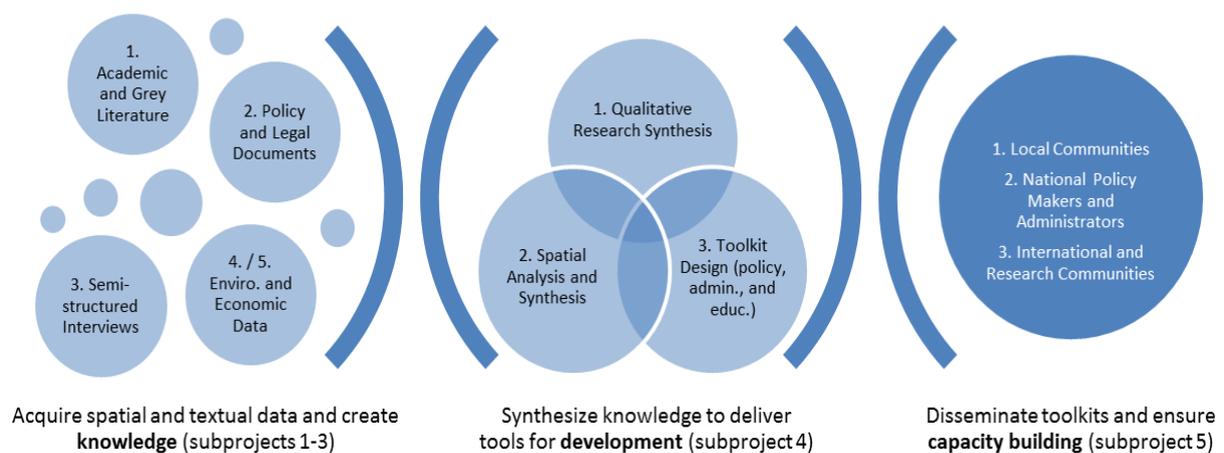
The way forward can be underpinned by the rationale that climate change response capacity can be built amongst government, civil society, and pastoralist stakeholders if more knowledge and tools exist for understanding and securing pastoralist practices. Conventional tools need redesign. Innovative methods, such as the Social Tenure Domain Model (STDM) (FIG, 2010) are needed, ones that enable recording of tenures at low-cost, high-speeds, and appropriate qualities. These approaches must be capable of: supporting community friendly development plans; livestock mobility; linking land and water access; and providing natural resources for different users at different timeframes.

Specific knowledge gaps that need addressing include: 1) the lack of integrated spatial, legal, social, environmental, and economic knowledge regarding unrecorded pastoralist land tenures and impact of climate change; 2) the lack of aligned policy, administrative, and educational tools to support adjudicating, mapping, and recording the interaction between pastoralist tenures and other land tenures; ones that recognize climate change impacts, reduce conflict and support tenure reconciliation; and 3) the limited knowledge regarding land administration capacity building in terms of enablement of stakeholder interaction at multiple levels, and disseminating of tools that support multi user land approaches in Kenyan dry lands.

In summary, there is an overarching need to support climate change response strategies by developing knowledge, tools, and capacity relating to pastoralist land tenures in Kenya's dry land areas. More specifically, there is a need to generate integrated spatial, legal, social, environmental, and economic knowledge regarding pastoralist land tenures and the impact of climate change in Kenya's dry land areas; to design and disseminate policy, administrative, and educational tools that assist local communities, civil society, and governments to

reconcile land tenure conflicts in the face of climate changes; and to develop the capacity of East African local communities, civil society, governments, and externals that work on land tenure management and climate change response in dry land areas.

To answer the questions multiple disciplinary perspectives will be required: spatial, legal, social, environmental and economic narratives are considered essential if the intrinsic complexities of the project questions are to be understood beyond rudimentary levels. Close interaction between research and non-research groups is required: a trans-disciplinary approach is necessary. A potential conceptual approach is provided in Figure 3.



**Figure 3. Conceptual model, trans-disciplinary approach and operationalization**

The outcomes of such work would be: 1) integrated knowledge regarding pastoralist tenures, conflicts, and impact of climate change in the three selected regions of Kenya; 2) tool creation for development including innovative approaches for adjudicating, mapping, recording, disseminating, and reconciling pastoralist tenures, for use by local communities, organizations, and governments, in climate change responses strategies and development and; 3) capacity development including improved institutional links between non-research, and research communities, and improved capacity of Kenyan government, civil society, and local communities.

## 6. PRELIMINARY WORK AND RESULTS

A DFID (UK) and NWO (NL) funded workshop held during January 2013 in Nairobi revealed that capacity needs to be built amongst government, civil society, and pastoralist stakeholders if more knowledge and tools are to be created for recording pastoralist practices. It was confirmed that conventional tools need redesign and that designs should enable recording of tenures at low-cost, high-speeds, and appropriate qualities. The approaches need to support local development plans; livestock mobility; linking land and water access; and providing natural resources for different users at different timeframes. The workshop included

over twenty (20) stakeholders from local, national, and levels, and from various research and non-research sectors. The group resolved to pursue further work: land information may become a crucial tool for supporting thriving social, economic, and environmental systems in semi-arid Kenya, with means for peacefully resolving land tenure related conflicts. In this sense, the pastoralist's 'parcel' is not at all about land taxation, but about ensuring local tenure security and national recognition for pastoralist land users- meaning these communities are more empowered to determine their livelihood approaches against external threats.

## **7. CONCLUSION**

The Kenyan case demonstrates the movement by government and civil society towards recognition of previously overlooked land interests: the continuum of land rights is being realized. Conventional notions of the 'land parcel' have been extended: previously unrecognized tenures including customary, nomadic, or communal interests are now incorporated into the concept.

However, moving from policy to implementation and actually building pastoralist land rights into cadastres is a significant step: much is still unclear regarding operationalization. Technical tools including the Social Tenure Domain Model (STDM) enable these new understandings to be operationalized in land administration systems- however, they are still in the early phases of implementation. At any rate, the nomadic pastoralists of Kenya's dry land regions illustrate where these new approaches can be applied. It is envisaged that future research will focus on supporting these developments.

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