

**REVIEWING CONVENTIONAL LAND
ADMINISTRATION APPROACHES AND PROPOSING
NEW ALTERNATIVES: PERI-URBAN CUSTOMARY
TENURE AND LAND READJUSTMENT**

By

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ABSTRACT

The paper covers a range of issues such as pro-poor and practical policy and implementation and re-defining land administration for Sub Saharan Africa, to start thinking outside the box. It then goes on to give examples of thinking outside the box. Firstly it examines a different form of Spatial Data Infrastructure for Sub Saharan Africa and secondly investigates land readjustment, linked to conflict management, as the key land instrument for customary peri-urban areas. In connection with this it addresses questions such as how does customary tenure work in peri-urban areas? What effect does customary tenure have on the property rights systems in peri-urban areas? What are the best land instruments to use for peri-urban customary areas? What are international best practices of conflict management associated with land readjustment? What are the best technical tools for land readjustment in customary peri-urban areas?

INTRODUCTION

This paper covers a lot of ground and includes a number of controversial statements. It is an attempt to help the land administration industry to re-focus its approach to improve land delivery and land titling in the developing world. The paper covers a number of points:-

- Pro-poor and practical policy and implementation;
- Re-defining land administration for Sub Saharan Africa, to start thinking outside the box;
- Example one of thinking outside the box: A different form of Spatial Data Infrastructure for Sub Saharan Africa;
- Example two of thinking outside the box: Land readjustment linked to conflict management should be the land instrument of choice for customary peri-urban areas;

In relation to this last issue a number of points are explored namely:-

- Ø Learning lessons from Botswana and South Africa, how does customary tenure work in peri-urban areas?;
- Ø Learning lessons from Botswana, what effect does customary tenure have on the property rights systems in peri-urban areas?;
- Ø How are the planning, enforcement and other systems linked to the property rights' system affected by customary tenure in peri-urban areas?;
- Ø What are the best land instruments to use for peri-urban customary areas?;
- Ø What are the types of conflicts that need to be managed during readjustment in customary peri-urban areas?;
- Ø What are international best practices of conflict management associated with land readjustment?;
- Ø What are the best technical tools for land readjustment in customary peri-urban areas?;

Finally, the first part of the paper is drawn from a paper presented earlier this year at a regional World Bank workshop on land administration held in Uganda (Fourie:2002). The second part of the paper is drawn from a study (Fourie:N.D) funded by Dfid, British aid, of a programme directed by Dr. Rob Home, on land titling and low income households in peri-urban areas in three countries. The findings from this study will be published in book form next year.

PRACTICAL AND PRO-POOR

As a social anthropologist I have worked in the land titling field for years in Africa and observed the behaviour of role players. One of the key challenges relates to these role players. There are at least two very different sets of people. On the one hand these role players come from a social science, economics, political science, geography, background, and on the other hand, from a land surveying, computer science, planning, valuation, engineering type background. Judging from many forums, these different role players are still mostly talking past each other. To reach the objectives where land policy programmes are translated into specific steps to be

taken in individual countries, practical and pro-poor approaches have to be developed. This will require integrated work by the whole range of role players.

Sam Zhou, a widely respected Zimbabwean land surveyor, stated at a major FIG international conference that there have been too many technical experiments in Africa in the cadastral surveying/land registration field that have failed. Some of the reasons for this failure put forward by different authorities include:-

- Systematic land titling programmes for rural areas are neither appropriate nor within the capacity of most countries and/or individualised, centralised land titling does not fit with customary tenures;
- Designs and laws are adapted from Western countries with all the underlying assumptions of their systems, including sufficient trained personnel, financial capacity and citizen demand for individual titles;
- They do not take into account the needs of the poor, who are the majority in these areas;

In regard to the last point, technical people often see land titling as neutral. This neutrality is a misleading notion. Because of colonial legacies, many African land titling systems are not pro-poor and instead support the needs of investors and the elites.

Using stereotypes and drawing from my observations, people trained in the land surveying field are not generally trained to undertake critical reviews or reflect. They are instead trained to do the job. On the other hand, the strength of social scientists is in being reflective and critical, but they are not trained to deliver tangible products, such as buildings or survey diagrams or plans. Experience has shown that land surveyors and others can be trained to reflect and re-think their systems, and that social scientists can learn to develop practical steps for implementation. However, the shortcomings of the different role players need to be worked at, as it is a leitmotif in both the poor technical designs I have evaluated, as well as in the impractical land policy I have seen. It is impractical because the technical (legal) tools do not exist at present to deliver on some of the land policy approaches being developed, such as for example:-

- Creating certain records for group rights in situations where the group is not cohesive, and recording rights which are not of equal status;
- Being able to register a large variety of tenures covering any and/or all social tenure types;
- Creating a *de jure* land registration system that matches the *de facto* social land tenure system;
- Creating a coherent land information system for both accurately surveyed parcels and sketch plans, where both centralised registered freehold and less accurately 'surveyed' occupants rights have to be on the same system;
- Community based approaches which are difficult to scale up to national level and/or are isolated designs outside of the national framework;

My conclusion is that firstly, land policy development, to be capable of being implemented, needs to take place within the context of what is practical and doable, in terms of the present toolbox, and the limitations of the technical (legal) tool box need

to be known to all role players. If land policy requires the pioneering of new tools at country level, this decision needs to be taken with the technical (legal) people, with appropriate risk identification analysis and time horizon estimates.

Secondly, many of the new tools required may well be of generic use in Africa, and other developing world countries (and could be adapted). A research agenda as a focal point is critically important. An international research programme should be managed in a structured way to develop Best Practices through work undertaken within different countries.

DEFINING LAND ADMINISTRATION WITHIN AN AFRICAN CONTEXT

One of the more fruitful areas where research involving all role players could and should take place is in defining 'what is land administration in the African context'. The conventional definition is based on the guidelines developed for the United Nations Economic Commission for Europe (UNECE 1996), which defines the term 'land administration' as "the processes of determining, recording and disseminating information about ownership, value and use of land when implementing land management policies" (UNECE 1996:91). In the African context a range of other issues need to be taken into account in defining land administration namely:-

- Governance and institutional aspects;
- Non formal and informal land administration systems;
- Separating rights ('who' and 'what') from boundaries ('where');
- Possessory/ occupancy rights;
- The role of a land administration infrastructure and/or Spatial Data Infrastructure (SDI), which includes both cadastral and non cadastral spatial units;
- Whether the boundary/spatial information is an infrastructure for the Public Good, rather than primarily being legal evidence of individual/group rights;
- Matters raised when land administration systems are reviewed within a pro-poor and decentralised framework;
- Matters raised when making land administration systems simultaneously are useful to investors, the poor, customary areas and formal land markets;

A key problem with the European-centric definition is that firstly, it is cadastral parcel based. Secondly, this definition excludes the governance and institutional issues which are critical to land administration in Africa, where institutional restructuring and decentralisation are common approaches, because of the weakness of the central state and to improve good governance. Thirdly, an exclusive focus on the cadastre automatically excludes those areas outside the cadastre, such as informal settlements and customary areas. Only about 2-10 percent of the area in a country is usually covered by the cadastre. In addition to this, Habitat estimates that 20-80 percent of urban growth in the developing world takes place informally (UNCHS:1996).

As early as 1999 FIG and the United Nations (Bathurst Declaration) concluded that Africa, together with other developing country areas, had a different experience and the term 'cadastral infrastructure' was replaced by the term 'land administration infrastructure', to accommodate the developing world (where there is only about 30% land title coverage).

Cadastral information is often used as the basis for other systems such as:- spatial planning, land use management/controls including natural resource management, service delivery, valuations, the rating of properties, cost recovery on services, land tax, raising financial capital, dispute resolution and conflict management. Therefore, often where the cadastre does not exist (including a fiscal/tax cadastre which can serve as a substitute), there is also no formal planning, sustainable land use, valuation, rates/tax, and cost recovery on services, at scale (applicable country wide).

The idea is that 1/some form of appropriate land administration infrastructure and spatial unit is necessary so that these other systems can be put in place 2/alternatives to the cadastral parcel information need to be developed such as sketch plans, geocodes etc. for this purpose 3/that an integrated spatial information system would include both/all of these different spatial units. FIG, in a recent African conference (2001), have moved to strengthen this definition of land administration infrastructure, through expanding its technical aspects to include telecommunications infrastructure etc., but the thorny issue of a robust alternative spatial unit has still to be tackled.

Given the cost of land titling, and it's well documented lack of success to date in Africa, the majority of rural people's tenure security should be catered for outside of the central land registration system. That is, a range of other options to improve tenure security should be utilised such as:- anti-eviction rights, adverse possession (possessory/occupancy/use rights), local level forms of registration/recordal and leases.

While it is clear that centralised land registration systems, run out of the capital city by land professionals working for the commercial sector and elites, is not a system which can be extended to the majority, working models of decentralised land registries exist in Africa (e.g. in Namibia). This registry demonstrates that the majority of people in an area can benefit from decentralised land titling, in terms of an improvement of their asset base, good governance and service delivery. Therefore, land titling *per se* cannot yet be ruled out when land policies are developed.

The role of land professionals, and the design of a regulatory framework in this situation, would be to 1/make it possible to title those who could afford it and were prepared to pay 2/protect those who cannot afford it from losing their land during a land titling exercise 3/develop approaches which allow simple forms of evidence to be used to protect these 'untitled' rights and/or to develop decentralised land titling systems.

Also, existing and new designs of land titling systems need to be assessed to see what extent they are pro-poor. It is suggested that a way to do this would be by using a sustainable livelihoods analysis.

The spatial information side of the cadastre needs to be re-evaluated and further researched, and I take this point up next. To overcome the lack of spatial information in Sub Saharan Africa, some countries have generated some spatial information but this is not stored or shared in a systematic manner and is spread among a range of organisations. This limits the country's ability to set up a systematic infrastructure for land administration and use by a range of systems. Other countries, especially for rural areas, have not developed any alternative to cadastral information, and there is therefore a void that directly affects a range of key decisions linked to quality of life.

The role of the land professionals should be to 1/develop appropriate less accurate spatial information 2/store it in a Spatial Data Infrastructure appropriate to Africa, to ensure it is systematised and sustainable 3/ develop this infrastructure as a Public Good for a range of purposes.

Finally, we need an appropriate definition of land administration in Africa in the light of the themes discussed above.

EXAMPLE ONE OF THINKING OUTSIDE THE BOX: SUB SAHARAN AFRICA NEEDS A DIFFERENT FORM OF SPATIAL DATA INFRASTRUCTURE (SDI)

The creation of an appropriate SDI for Africa requires extensive research. Working with Paul van der Molen and Dick Groot of ITC a research agenda has been created, in regard to this issue, for publication as a forthcoming paper. Key issues raised in this paper are identified below.

“The most important research issue is the creation of a common geo-spatial framework that can accommodate a range of land administration organisations, not all of which use cadastral parcels and co-ordinates. This is not yet a solved problem, but could well be solved in terms of new technology... One possible approach for such a common geo-spatial framework, discussed for Africa, is the creation of a framework based on visualisation (UNECA). Another possible approach could be based on grids that are simultaneously useful to a range of organisations, and measurement and non-measurement experts. However, other frameworks might well be more appropriate.

..We need to develop a range of spatial units, including but going beyond cadastral parcels, that simultaneously allows land ..administration to continue across (a) range of organisations, but which facilitates increased inter-operability over time between these organisations. .”

In regard to the critical issue of cadastral parcel accuracy, Fourie, van der Molen and Groot state that the research questions which need to be asked are, “..can core data, and a common infrastructure, only be created by using high accuracy co-ordinates? ..can we create infrastructures that accommodate systems that lack co-ordinates? ..The extent to which co-ordinates (accurate or not) are affordable should be assessed. This should be done taking into account issues such as fitness for purpose; short term investments using quick and dirty approaches; low versus high value investments; ..(and) a common focus on set up costs rather than on maintenance and sustainability..;

Other aspects to be investigated include issues such as, the role of the legal and regulatory framework in regard to ..geo-spatial data. Although some countries have a current land policy, it is likely that many do not have a coherent geo-spatial data management policy. The question needs to be explored as to whether it is possible, ..to share data if there is no legal ..framework for ..geo-spatial data? Also, ..to what extent are current multiple local initiatives autonomous sub systems outside of the legal and/or information framework of the country? And to what extent these sub systems operate sustainably? Also, what is an appropriate policy and legal ..framework for developing countries for (S)DI development..,? Finally, ..how is capacity built in regard to relevant regulatory frameworks, to increase inter-

operability at local level but also across the nation..?” (Fourie, van der Molen and Groot: Geomatica: forthcoming).

EXAMPLE TWO OF THINKING OUTSIDE THE BOX: LAND READJUSTMENT IN CUSTOMARY PERI-URBAN AREAS

This section will conclude that the most important land instrument for peri-urban customary areas is an appropriate form of land readjustment where conflict management is a central theme. As indicated, the material for this paper comes from another, and much longer, paper which will be published (Fourie: N.D). Here I will briefly summarise some of its foundation themes and then focus on a few key ideas.

Learning lessons from Botswana, what effect does customary tenure have on the property rights systems in peri-urban areas?

Gaborone, the capital of Botswana, is experiencing large-scale urbanisation, much of which is taking place in the peri-urban areas on tribal land. One of these areas is Mogoditshane, where many approaches have been tried to manage large scale informal urban growth.

The Botswana Government has tried to address the results of urbanisation in peri-urban customary areas, and specifically in the Mogoditshane area, in a number of ways, such as the 1991 the Presidential Commission of Inquiry to Look into the Land Problems of Mogoditshane and Other Peri-Urban Villages. It found that, “..the owners of ploughing fields ..had been subdividing and selling land to individuals without the consent of their Land Boards. Such informally allocated plots created unplanned and haphazard developments that were subsequently difficult to provide with infrastructure.” (Home: N.D.b). He also states that “Land Board.. officials were selling plots, issuing fraudulent ownership certificates and without planning permission” (N.D.a). In addition to this, a ruling in the High Court gave field owners the right to dispose of their fields to whoever they wished for allocations before 1994; and a high up political figure overturned a petition by a Land Board to the High Court for an eviction (Home: N.D.a).

In 1992 government tried to address the problem in Mogoditshane using a range of approaches such as:- establishing a task force with police officers to monitor illegal land developments; mapping the area’s land rights; creating a sub-ordinate Land Board for the area with more flexible rules for urban land management; establishing a Land Tribunal to assist with disputes; building surveying and record keeping capacity in the Land Board; and the Department of Town and Regional Planning, usually responsible for planning in urban areas, prepared a detailed layout plan for the area (Home: N.D.a,b and interviews).

The results from all this work were dismal, because as soon as surveyors tried to place the beacons according to the plans they found “..non conforming sub-divisions, unauthorised structures (houses, fences etc.) and land occupiers denying them access..” (Home: N.D.b). A mandatory 5000 pula (USD 300) fine was put in place by government for illegal occupation. However, this also became part of the negotiations and manipulation that took place between government, owners and claimants who were buying the land (Home: N.D.b and interviews).

Some of the things that went wrong were that, during this process and over the years it has been found that the Land Board's land records are either non-existent or inadequate, especially as far as the boundary of the plot and description of size is concerned; and the Board sometimes allocates the same piece of land to more than one party. To complicate matters, the Land Board is being sued with increasing success because of these problems and this is costing government money. Capacity in the Land Board in regard to land record creation, maintenance and keeping records up to date has been weak. Also, while there may be some description of land rights, there is no description of types of land use. This in turn means that there is no detailed spatial information on existing land uses to inform spatial planning and zoning decisions, which often then do not fit existing and historical *de facto* use (interviews: 2001).

The problem is still in place today. As reported recently in a South African newspaper about Mogoditshane, "(h)aphazard settlement complicates the provision of services, .. electricity, water and sewerage. Also ..towards the late 1990s attention became focused on about 5,000 'illegal squatter' households in Mogoditshane, ..last year the government commenced with demolitions of the homes of these squatters .. (and) half.. have been demolished." This is despite the fact that most of these households have pending applications for land with the local Land Board and that they represent a third to a half of all households in the area (Mail and Guardian: 24 –30th May, 2002).

That is, lessons learned over the last decade in Mogoditshane indicate that, in countries where customary land tenure is a national symbol, so-called 'modern' systems of property rights, spatial planning etc. are unlikely to work as anticipated.

Learning lessons from Botswana and South Africa, how does customary tenure work in peri-urban areas?

How does customary tenure work in peri-urban areas? What are its elements that are affecting the property rights' systems in the way described? Comparative socio-political work in south east Botswana and in informal settlements in South Africa show that the customary way of doing business includes the manipulation of land tenure rules, flexibility, uncertainty, ambiguity, and coalition formation linked to entrepreneurship. 'Modern' land titling systems, by comparison, require certainty around rules. Comaroff's work in Botswana showed that rules change over time, as they are only a cultural repertoire which people manipulate for their own gain. Instead, the constant in the society is what he terms the "contradictory tendencies" of hierarchy on the one hand, and egalitarianism on the other. The manipulation of the repertoire of rules over time leads to different manifestations of these hierarchy: egalitarianism tendencies (Comaroff:1982).

Comaroff's approach was found to be useful in the analysis of land tenure in informal settlements in South Africa (Fourie:1994, Davies:1998, Barry:2000). It was shown that land tenure rules in customary/informal areas are manipulated over time by different entrepreneurs and coalitions, for their own political and financial gain, in response to external developments in the wider society, such as urbanisation, government policy and the actions of powerful figures in government. This means that tenure rules become ambiguous. However, while there was a range of tenure rules

over time, there remained a constant in these customary/informal communities, namely the contradictory tendencies of integration: fission.

In terms of this conceptual framework, local customary communities are not isolated from the main stream of events and their tenure and other systems are impacted by external factors such as urbanisation. This does not mean that the external factors will determine the outcome of what happens in the local community, instead the “contradictory tendencies” or structural tensions in the community will articulate, or operate in a dynamic way, with external factors to produce new ways of doing things. What this means is that, if Mogoditshane had conformed to what was prescribed by the external factor of the urban management plans for the area then it would have become a well planned area. On the other hand, if customary tenure was a closed system it would have remained intact and resisted urbanisation and there would have been no peri-urban development. Instead the reality of Mogoditshane is neither of these but something else which includes both of these. This ‘something else’ happened because of the operation of the contradictory principles or structural tension in the community, and at national level around customary tenure issues, and its response to external factors.

The contradictory principles are manifested in different ways and are always present in the society/community. For example, the attempt by Botswana’s government to initially control Mogoditshane’s development without moving away from customary tenure is a manifestation of the operation of the hierarchical and centralised tendency in the society. Equally, the role of powerful figures in government in giving special dispensations to friends undertaking ‘illegal’ land development (Home: N.D) is also a manifestation of hierarchical-aggregation behaviour, related to coalition formation. On the other hand, the informality in Mogoditshane, and claims by field owners that they own the land and have a right to sub-divide and sell it (Home: N.D.), can be seen to be a manifestation of the egalitarianism-individuation tendency also found in the society.

The equivalent structural tension in Zulu land tenure is that of integration: fission, that is, coalition formation and entrepreneurship. I showed that land tenure rules do not determine the behaviour of people in regard to land in customary areas. Instead rules “only ‘.embod(ied) the ideational and organisational framework within which the process of competition for..’ land and status take place” (Fourie:1994:20 quoting Comaroff:1982:12). Rules are only part of the cultural repertoire people use to manipulate events and so obtain power, land and influence.

In terms of the integration tendency in the “contradictory tendencies”, coalitions are formed to protect traditional rural customary tenure, just as much as coalitions are formed by entrepreneurs to introduce new forms of tenure such as informal settlement into customary areas. Both tenure types and coalitions are a manifestation of the same contradictory tendency of fission: integration. In a case study in South Africa a traditional rural coalition prevented the growth of informal settlement. Also in the case study, an entrepreneur led a break away coalition to facilitate the development of an informal settlement. Also, at one point the person in charge of KwaZulu, and one of the heads of the hierarchy of Zulu land tenure, stated that informal settlers could not be removed, thereby strengthening the coalition supporting the introduction of new tenure types.

Understanding behaviour related to coalition formation is a key to understanding African land tenure systems and customary rights. Hierarchical behavior in African land tenure systems does not follow European allodial systems of land rights, where lesser rights are abstracted from the title, such as freehold. Instead, in African systems social units hold equal rights and there are competing coalitions within the hierarchy, both vertically and horizontally. This means that there is competition for the same piece of land by different social units, such as the extended family with respect to the headman, with respect to the chief, and so on. Equally the competition can be, as in the case of Mogoditshane, between the field owner and claimant of residential rights, between Land Board official and the technical office allocating land according to the layout plan, representing the 'modern' property rights' system.

The manipulation of land tenure rules is part and parcel of this competition, which takes place as new economic opportunities emerge, created by external factors such as urbanisation, or a favorable court case. This manipulation of rules in turn introduces ambiguity and uncertainty around land rights, statuses and values, which end up being constantly re-negotiated. New economic opportunities encourage entrepreneurs to fission off, develop coalitions, manipulate the rules and introduce new ways of doing things.

Currently the land elites in the Mogoditshane area have been strengthened by the hierarchical tendencies present in the society, and conflict management strategies should bring back the society's balance, by encouraging more egalitarian behaviour and facilitating land delivery. It is being suggested that an adapted form of land readjustment is the most useful and instrument which could be used to do this.

How are the planning, enforcement and other systems linked to the property rights' system affected by customary tenure in peri-urban areas?

The history of urban land tenure reform Mogoditshane has shown that the manipulation of tenure rules applies equally to other parts of the property rights' system, such as planning layouts, land use controls, the management of spatial information flows, enforcement etc. –i.e. the land administration infrastructure.

What are the best land instruments to use for peri-urban customary areas?

There are a limited number of land instruments conventionally used for peri-urban land development namely, land acquisition, green fields development (development of vacant land), resettlement, upgrading and land readjustment (also known as land consolidation, land sharing, land pooling). Here land readjustment is considered to be the most appropriate land instrument.

What are the types of conflicts that need to be managed during land readjustment in customary peri-urban areas?

The conflicts which will occur and have to be managed at a number of levels will include:- 1/between field owners and claimants, 2/between claimants and government bodies at different levels (national departments, Land Board), 3/between national departments, 4/between national departments and the Land Board 5/between

'customary' and 'modern' rules and ways of doing business, 6/ between the fixed laws of the national departments and their procedures for dealing with issues, and the *de facto* ways of doing things on the ground in terms of rule manipulation.

What are international best practices of conflict management associated with land readjustment?

There are already a number of international best practices of conflict management approaches which have been associated with land readjustment. Based on work by Connellan (2002), Derlich (2002), Uimonen (2002), and Andersen (1998) in Europe, and Habitat in peri-urban West Africa (1999), a number of lessons can be learned for customary peri-urban areas under land readjustment namely:-

- The importance of conflict management approaches and these should include:- a mediation forum; dispute resolution approaches; a transparent process; accountability by officials; a due process mechanism; an information campaign; and partnerships between the stakeholders involved;
- Stakeholders should include the government, the field owners and tenants in the area and those with claims (such as those whose houses have been demolished);
- Top down planning and zoning will not deliver results. Instead, as part of the land readjustment exercise participatory approaches need to be introduced and involve all stakeholders in the decision making process (UNCHS:1996:6-8);
- Conflict is likely between the government and the field owners over the valuation of the land and compensation paid. Field owners and others need to be able to negotiate with government about this. They need to be clear about this aspect at all points of the exercise otherwise there will be delays and/or people will not participate in the project and/or informality will increase;

What are the best technical tools for land readjustment in customary peri-urban areas?

The best technical tools for land readjustment in customary peri-urban areas include:-

- Do not attempt to follow developed world land readjustment approaches too closely because of the legacy systems that lie behind these approaches, such as accuracy, a lack of ambiguity, high costs and behaviour focused on the individual;
- Do not attempt to codify the laws and rules; instead focus on the process of evidence creation more than the product. Emphasize participation, empowerment and flexibility;
- Create local land records that are accessible and in a format that is easily understood by all stakeholders. Where possible also modernize the system, by turning it into an easily accessible digital system with information that can be easily disseminated;
- Improve transparency so that all stakeholders understand what is involved in the technical processes being used. Akrofi, based on experience in a peri-urban area in South Africa, argues that there needs to be a focus on the transfer of knowledge and information at all stages (2000);

- Declare the area as a special zone outside of national law for a period of time to avoid confrontation between the national legal framework and the local processes. Junior describes the special interest zones of Brazil which are urban areas primarily destined for social housing. They already contain informal settlements, collectives, illegal sub-divisions and vacant and underutilized urban areas. Another criteria for their designation is that they have a high number of land/housing ownership conflicts, which will result in forced evictions of low-income people (1999) (quoted in Fourie:1999);
- Map all claims to land, including overlapping claims, not just registered/recorded rights;
- Create a land information system which contains information about existing land uses and planned uses held at local level (P.Peacock forthcoming Msc thesis:N.D.);
- Utilise planning approaches which take place on site and are participatory and include knowledge transfer (Akrofi:2000). Experience in peri-urban areas in South Africa has shown that the community cannot relate plans to the ground, except on site at the time of adjudication and planning. For these reasons it is not useful to rely exclusively on aerial photographs showing land use and/or off site workshops with the community to plan the area;
- Create forums to integrate different cultures –urban, rural, customary, modern, certain, ambiguous, to create local rules, build new knowledge and alter attitudes;
- Build capacity in the community to negotiate with government and other bodies through the creation of informed and knowledgeable NGOs. This is critical for dispute resolution (FIG/Habitat:1998, Fourie:1999);
- Develop public-public and public-private partnerships that increase conflict management and decrease confrontation, such as for example including the Land Boards and national government in the same development body (UNCHS:1999);
- Protect the technical people involved in the land development, they should not be made scapegoats in what is largely a political process, more especially as they have scarce skills;

CONCLUSION

When undertaking land readjustment in peri-urban customary areas, because it is an environment with its own particular sets of behaviour, an enhanced range of skills and resources will be required to undertake land development namely:-

- Sufficient professionals with technical skills. They need to also have the appropriate technical skills, such as for example, participatory rather than conventional planning skills;
- Sufficient managers/leaders with expertise in dispute resolution and conflict management;
- Managers who are able to do their political sums correctly; and
- Non conventional technical tools, including an SDI which has cadastral and other data as foundation data;

To conclude, in working both in Africa and also in the developing world, we cannot go on with business as usual, instead we have to be continuously innovative and work at thinking outside of the box, both in the technical field and in professional practice.

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