

Managing Unintended Consequences of Democratizing Land Rights

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SUMMARY

The pressure to change and provide more appropriate and efficient land administration services and strengthen security of tenure is growing within global political circles. Land was prominent on the agenda for the G8 and G20 meetings in 2013 and global land indicators are planned within the replacement of the Millennium Development Goals. The ability of the current land administration paradigm to quickly scale up to engage the excluded 75% of the world's population is impossible; there are simply insufficient land professionals. It is time to radically rethink how we record and manage land rights.

Several new initiatives are reacting to these challenges by proposing a radical new approach by providing a free to use, transparent, global platform where citizens can record evidence of their land rights. The proposed solutions are usually based on global cloud based platforms, ISO land information standards, mobile technology and participatory / crowdsourcing techniques to capture and maintain land rights.

It is essential that these innovative and scalable solutions establish robust governance, processes and monitoring procedures to minimize unintended consequences, to build trust with users and to ensure that these solutions do not empower the wrong people. This paper identifies some of the likely unintended consequences and describes possible measures to mitigate these risks.

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1. INTRODUCTION

The current solutions to delivering land administration services have very limited global outreach; 75% of the world's population do not have access to formal systems to register and safeguard their land rights. The majority of these are the poor and the most vulnerable in society and without any level of security of tenure they constantly live in threat of eviction. For example, foreign investors through large-scale land acquisitions (agriculture) have attained 83 million hectares of land (RRI, 2013) in largely poor and middle-income countries since 2000; many indigenous people have lost rights to their land. This creates significant instabilities in societies and severely limits their ability to participate in economic development.

The pressure to change and provide more appropriate and efficient land administration services and strengthen security of tenure is growing within global political circles. Land was prominent on the agenda for the G8 and G20 meetings in 2013 and global land indicators are planned within the post 2015 Sustainable Development Goals. The ability of the current land administration paradigm to quickly scale up to engage the excluded 75% of the world's population is impossible; there are simply insufficient land professionals. A radically rethink of how we record and manage land rights is required.

An increasing number of initiatives are emerging, for example, UN-FAO FLOSS SOLA Open Tenure, Rights Resource Initiative and Rainforest Foundation UK that are reacting to these challenges by proposing radical new approaches where citizens can record evidence of their land rights on a free to use, transparent, global platform. These innovative solutions are usually based on global cloud based platforms, open source collaborative platforms to support Apps, predominantly ISO land information standards, mobile technology and participatory / crowdsourcing techniques to capture and maintain land rights (McLaren, 2011). These initiatives are trust rather than legal based systems and increase security of tenure through societal evidence and global publicity.

However, land is such a valuable commodity that there is considerable corruption across the global land sector (van der Molen, 2007). In fact, globally it is the third most corrupt activity and the current land administration solutions are in many instances controlled and manipulated by the rich and the elite for their gain. Therefore, any new land administration solution, such as crowdsourced land rights, will be open to similar abuse unless safeguards are in place to identify and mitigate the risks.

It is essential that these innovative and scalable solutions establish robust governance, processes and monitoring procedures to minimize unintended consequences, to build trust with users and to ensure that these solutions do not empower the wrong people. This paper

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2. SUPPORT OF FIT-FOR-PURPOSE APPROACH

More appropriate and lower cost approaches to capturing land rights are being achieved through the adoption of ‘fit-for-purpose’ approaches and the provision of tools for these innovative approaches. Fit-for-purpose means that the land administration systems – and especially the underlying spatial framework of large-scale mapping - should be designed for the purpose of managing current land issues within a specific country or region - rather than simply following more advanced technical standards. The fit-for-purpose approach is participatory and inclusive – it is fundamentally a human rights approach. Benefits relate to the opportunity of building appropriate land administration systems within a relatively short time and for relatively low costs. The fit-for-purpose approach being proposed here offers governments and land professionals the opportunity to make a significant improvement in global land issues. It is a realistic approach that is scalable and could make a significant difference in the intermediate timeframe.

The term “Fit-for-purpose” is not new at all, but what is new is relating this term to building sustainable land administration systems. Therefore, the approach used for building land administration systems in developing countries should be flexible and focused on citizens’ needs, such as providing security of tenure and control of land use, rather than focusing on top-end technical solutions and high accuracy surveys. A fit-for-purpose approach includes the following elements (FIG/World Bank, 2014):

- **Flexible** in the spatial data capture approaches to provide for varying use and occupation.
 - **Inclusive** in scope to cover all tenure and all land.
 - **Participatory** in approach to data capture and use to ensure community support.
 - **Affordable** for the government to establish and operate, and for society to use.
 - **Reliable** in terms of information that is authoritative and up-to-date.
 - **Attainable** in relation to establishing the system within a short timeframe and with available resources.
 - **Upgradeable** with regard to incremental improvement over time in response to social and legal needs and emerging economic opportunities.
- The MMR initiative and the use of mobile technology will directly support and accelerate the implementation of the Fit-For-Purpose approach.

3. UNINTENDED CONSEQUENCES

These new, trust based approaches to capturing evidence of land rights are very effective at reaching those citizens excluded from formal land administration systems, but are potentially open to mis-use. An initial view of the some of the likely mis-uses is detailed below:

- People simply record fraudulent claims for land that is not theirs.
- Many slum dwellers want to live outside of formal systems of bureaucracy and wish to hide. Therefore, they will not want to engage with these initiatives and will not want to record their rights.
- Citizens want to record their rights, but due to sensitivities of their natural resources, for example, they do not want their rights publicized outside of their communities.
- The crowdsourced initiatives disrupt the power structure of communities and the technology savvy members of communities have a distinct advantage over other community members and subsequently take control of land.
- If the initiatives do not capacity build and support communities to establish systems for transparent, just, and equitable administration of those lands then mismanagement, corruption, and local elite capture will occur. They may also further weaken women's land rights by inadvertently entrenching discriminatory norms that exclude women from land governance and undermine their inclusion in community decision-making.
- Some initiatives are planning to use trusted intermediaries / para-surveyors to help citizens record their evidence of land rights. However, the cost of these trusted intermediaries may turn them into gatekeepers and restrict access to their services.
- These initiatives increase security of tenure through publicity. However, this publicity may lead to the information being mis-used and vulnerable communities targeted by land grabbers.

When it comes to corruption, people are always very innovative in devising new schemes to beat the system. Therefore, these crowdsourced initiatives will have to continually monitor, learn fast, innovate and improve mitigation measures – just like drug testing in sport.

4. MANAGING UNINTENDED CONSEQUENCES

Although these unintended consequences could seriously undermine and potentially render these initiatives unworkable, there are a number of procedures and technology tools that can be used to mitigate these risks. This section identifies the most promising.

4.1 Use of Trusted Intermediaries

The initial phases of implementing these crowdsourced initiatives plan to use trusted intermediaries (sometimes called para-surveyors or barefoot surveyors) to collect evidence of land rights on behalf of communities and citizens. These trusted intermediaries would be trained by the NGOs / CSOs and over time could obtain qualifications as has happened with

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the “land entrepreneurs” of the BRAC property rights initiative. These trusted intermediaries would be vetted initially by the NGOs, but over time this network of trusted intermediaries would self-organize into collaborating networks and provide scalability. The trusted intermediaries could support a range of information services, including health, finance, agriculture, weather, for example, as well as land rights. Land rights could simply be a by-product of other services, e.g. microfinance, micro-insurance. This would add further confidence between citizens and the trusted intermediaries and limit abuse of these trust based land registration approaches.

4.2 Build Trust through use of Societal Evidence

A fundamental aspect of data authentication will be the use of societal evidence. The capture of evidence of land rights will be a highly participatory process, led by the trusted intermediaries, and communities will be engaged in capturing, reviewing and signing off the land rights within their community. This represents the strongest form of authentication – self-regulation. There will inevitably be land disputes within and amongst communities and these will have to be adjudicated through traditional processes of local land tribunals and the courts, for example, where necessary.

4.3 User Driven Reputation Systems

Users should also be able to report feedback on their experiences with trusted intermediaries to a centralized user reputation system. This would support evaluation of this expanded network of trusted intermediaries for citizens and simple color coding could be used to reflect reputation in the user interface.

4.4 Technology Triggers & Interventions

Users will primarily use mobile technology to record their evidence of land rights. The use of mobile phones allows a number of passive monitoring approaches to be implemented, including:

- The network timestamp can provide a robust (99.999%) piece of evidence that can be associated with land rights data during recording on the mobile device.
- The use and location of use of the mobile phone can be logged over time and analyzed to infer the location (and home) of the mobile phone owner. This information can be logged with the evidence of land rights.
- Users who have recorded their evidence of land rights could set geo-triggers. These would provide warnings of new land rights claims that either overlap or lie within a user-defined proximity of their land rights claims.
- Spurious land right claims in areas not serviced by trusted intermediaries can be identified and flagged.

4.5 Land Governance Capacity Building of Communities

The recording of evidence land rights within communities must be accompanied by authentic governance changes that support communities to establish intra-community mechanisms to ensure good governance, intra-community equity, sustainable natural resource use, and authentic community approval for all transactions with outside investors. This community capacity building must be an integral component of these new initiatives.

4.6 Create Pathways for Formalizing Rights

Wherever possible, these crowdsourcing land rights initiatives should work with governments to transition crowdsourced land rights to formal land rights. This will ensure appropriate evidence is recorded to allow this to happen and move citizens and communities up the continuum of land rights from their initial entry point.

4.7 Robust Privacy Management

Although transparency and ease of access to the evidence of land rights data is key to increasing the security of tenure of citizens and communities, the new initiatives will need to be extremely sensitive to privacy needs of their users as open land information can potentially empower the wrong people. The disclosure of natural resources associated with indigenous people, for example, may precipitate unwanted exploitation. Privacy and associated trust are key success factors and robust privacy management must be put in place.

Therefore, the person recording the data must own their evidence of land rights data being managed by these global initiatives. Users must then be able to directly set associated privacy levels that restrict the scope of data to be accessed by and exposed to specified groups. This will involve the user defining what data will be exposed to what groups. For example:

- Only my immediate community can access all data;
- A regional group can access a sub-set of the data that excludes natural resources data;
- The world can only access the fact that someone has rights in this location and cannot access details of the person or their specific land and resource rights.
- Only the community can update the evidence of land rights data.

The visualization of the land rights data could also be used to desensitize individual land rights data, for example, areas could be illustrated as ‘occupied’ with no further details of the communities, citizens or their land rights.

5. CONCLUSIONS

These new initiatives to democratize land rights will have to implement very effective monitoring to quickly identify and significantly reduce misuse. Channels will have to be established to obtain feedback directly from users on misuse. It is only once these initiatives understand how to effectively monitor and mitigate misuse that they will be able to build trust with communities worldwide and accelerate the increase in security of tenure. Once this widespread trust has been established then the initiatives may then be in a position to incrementally initiate open crowdsourcing of evidence of land rights.

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BIOGRAPHICAL NOTES

Robin McLaren is director of Know Edge Ltd a UK based, independent management consulting company formed in 1986. The company supports organizations to innovate and generate business benefits from their geospatial information. Robin has supported national governments in formulating National Spatial Data Infrastructure (NSDI) strategies. He led the formulation of the UK Location Strategy and has supported similar initiatives in Kenya, Hungary, Iraq, Western Australia and Canada. He has also supported the implementation of the EU INSPIRE Directive in the UK and was a founding member of the UK Location Council. Robin is also recognized as an expert in Land Information Management and has worked extensively with the United Nations, World Bank and EU on land policy / land reform programs to strengthen security of tenure and support economic reforms in Eastern and Central Europe, Africa, Middle-East and the Far-East. His recent research focuses on the innovative use of crowdsourcing to support citizens in directly capturing their land rights.

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