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FlexiCadastre in the Face of Recent Developments in the Mining Regulatory Regime for Zambia

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Mines and Minerals Development Act of 2008



- A replacement of the Mines and Minerals Act of 1995
- Removal of Development Agreements and fiscal matters from mining law
- Restriction of small scale mining licenses to local citizens and citizen owned companies

Mining Rights Regulation



- Central and Regional Mining Cadastre Offices established under the new Act
- Cadastre offices in transition stage in Lusaka and processes all mining rights
- Regional Offices not yet operational but pilot decentralization planned for 2010

Limitation of area sizes under Prospecting and Mining Licenses



- Large Scale Prospecting Licenses limited to 1,000 km² per license
- Cumulative total of 5,000km² per holder for Prospecting Licenses
- Large scale Mining restricted to 250km² per license but without cumulative limit
- 50% compulsory relinquishment for Prospecting Licenses with escalating fees

Why were area limits introduced?



- To reduce speculative holding of ground
- To encourage holders to develop licensed activities over smaller manageable areas
- To enable entry of other players into the sector over idle areas
- Objectives attained? Too early to assess in the transition period...new sister companies may give false impressions of new entries into sector

Paper Cadastre



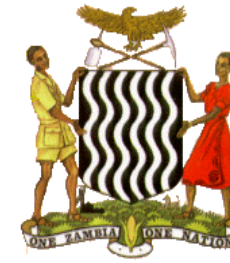
- Orderly Application Registers and Paper Cadastre critical to the development of a computer based Cadastre
- Until 2007, Zambia had different codes for various types of licenses
- This is being unified into one codification system
- An efficient computer system can be slowed down by a disorganized Paper Cadastre
- Plans to change from closed cabinet filing to open shelf filing to reduce file search time

Adjustment of FlexiCadaastre from the 1995 Act to the 2008 jurisdiction



- Business rules and workflows in FlexiCadaastre were easily adjusted to the new 2008 jurisdiction by Spatial Dimension
- In the transition period, both jurisdictions worked alongside with applications received under the 1995 jurisdiction being processed with irregular shapes for conversion later
- Shape change rules, including overlap detections, to migrate old polygons to the 2008 regime

Introduction of geographical coordinates and the cadastre unit



- Holders and applicants required to submit geographical coordinates
- Cadastre unit equivalent to 180mx180m and regular grid provided for in the 2008 Act
- Unit was chosen to accommodate the smallest holder - artisan's mining

Transition provisions for migration to the 2008 Act



- Act initially provided for transition provisions for holders to comply with the new cadastre geometry and other legal provisions

In 2009 new compliance deadline was extended from 31st March 2009 to 31st March 2010

Initial conversion rules



- Holders were required to redefine new polygons inside old shapes
- Based on the principle of assigning complete boundary cadastre units to a holder within their shape
- By 31st March 2009, very few had complied

Challenges in the transition period



- Insufficient computer capacity to handle increased coordinates of the new geometry
- Insufficient human resource and skills gaps
- Threat of of losing ground on tenement boundaries by holders
- Another challenge was the real threat of having sterile cumulative ground without licenses throughout the country

Stakeholder consultations



- World Bank – SEED Project- provided a Consultant and stake holder's workshop to review the Zambian Cadastre
- Resulted in new conversion rules
- Based on “FIFO” in assigning cadastre units
- Conflict between exploration and mining license, a cadastre unit would be assigned to mining license

Bulk Conversion of Licenses



- Ministry of Mines and World Bank-SEED Project- will now conduct a Bulk conversion exercise for all polygons to help meet the impending deadline
- Spatial Dimension contracted to execute the exercise
- All valid licenses will be converted into cadastre compliant geometry by end of February 2010
- Holders will have one month to review their converted shapes
- In the interim, two gemstone mining areas will not form part of the bulk conversion

Challenges with the FlexiCadaastre System



- Management must put in controls outside FlexiCadaastre to ensure that FIFO principle is implemented – enter and validate applications in time
- FlexiCadaastre must force users not to process higher application numbers unless lower numbers are accounted for
- The license addition wizard needs to be broken down into two parts with the first part where basic applicant details can be entered without coordinates and saved

Other technical challenges



- Overlapping licenses granted through appeals and consent require creation of doughnuts - potential for insecurity
- Beaconing regulations need to be reviewed to take into account the cadastre geometry and environment
- Transformation parameters need to be reduced from complicated mathematical equations for GPs users
- Parameters to be used to transform GPS coordinates to Zambian map coordinates and vice versa

Outlook :2010 and beyond



- Zambia set to fully implement the computerized mining rights management system
- To be used as a tool to ensure transparency and provide security of tenure
- Central Cadastre will be stabilized in 2010 before roll out to regions
- Future changes to regulatory regime will be accommodated within FlexiCadastre

THANK YOU



- NATOTELA SANA PAKUKUTIKA KWENU!!!!
- (THANK YOU VERY MUCH FOR YOUR ATTENTION)