

# Down to earth

Governance dynamics and social change  
in artisanal and small-scale mining in DRC



## Shifting Challenges?

Coltan Mining, Reforms and Social Change in the Democratic  
Republic of Congo (2009–2014)

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## ***Down to earth***

### ***Governance dynamics and social change in artisanal and small-scale mining in DRC***

*An in-depth understanding of how international mining reform initiatives for transparency affect governance, local institutions, livelihoods and the roles of women in artisanal mining in DRC.*

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Coltan Mining, Reforms and Social Change in the Democratic Republic of Congo (2009–2014)<sup>1</sup>

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## Context: Mining reforms and their underlying assumptions

In the Democratic Republic of Congo (DRC), the mining sector has the potential to play a pivotal role in post-conflict reconstruction (World Bank, 2008), and artisanal mining sustains the livelihoods of millions of people in the country (PACT, 2010). However, minerals from this artisanal mining have been ill-reputed in the last 15 years. Eastern DRC has often been characterised by chronic instability and violent conflicts (Autesserre, 2010; Stearns, 2011). It is widely believed that minerals in this region have attracted the greed of national and foreign armed groups, who benefit from the mining business.

Although this ‘greed hypothesis’ has been criticised for its inconsistent performance in explaining resource-related conflicts (Le Billon, 2010; Ross, 2006), various national and international reform initiatives have gained momentum (IPIS, 2011). These initiatives aim to make the Congolese artisanal mining sector more transparent and to prevent ‘conflict minerals’ from entering the international market. In 2014, 13 reform initiatives – 10 focusing on 3T<sup>2</sup> and three on gold – were operational in eastern DRC (Cuvelier et al. 2014: 5). The implicit assumptions are that mining reforms will fully ‘clean’ artisanal mining of violence and corruption and that this will contribute to sustaining people’s livelihoods (Garrett and Mitchell, 2009: 12). However, these assumptions do not hold true.

Box 1: How do *creuseurs* and *négociants* perceive mining reforms?

Trading houses and mining cooperatives operating in northern Katanga can be compared to a car without a driver, breaks or headlights but that drives in the dark, over bumpy roads, without anyone being able to stop it.  
(Group interview with *creuseurs* in Kahendwa, August 2014).

## Questioning reforms

This research brief addresses the adverse effects of artisanal mining reforms on many mineworkers (*creuseurs*) and middlemen (*négociants*) in the Congolese region of northern Katanga. This study was part of a larger research programme<sup>3</sup> investigating the implications of implementing initiatives designed to ‘formalise’ the mining sector in eastern DRC. In this work, the ITRI Tin Supply Chain Initiative (iTSCi)<sup>4</sup> – one of the most expanded among these initiatives – is especially important. Designed by the International Tin Research Institute (ITRI) in 2009, iTSCi provides a means of determining the origin of 3T minerals and documenting their trade chain by ‘tagging and bagging’<sup>5</sup> loads from mineworkers’ shafts to the export points (see Figure 1), where regional certification mechanisms take over. In 2011, the implementation of iTSCi also signalled

2 The abbreviation 3T refers to three types of minerals extracted in the DRC: tin (cassiterite), tantalum (coltan) and tungsten (wolframite). Coltan is an abbreviation of columbite-tantalite, which is commonly used in eastern DRC. It is a mixture of two mineral ores – namely, niobium and tantalum, and is used in high-tech industries. See Nest, M. (2011). Coltan. Cambridge: Polity Press, pp. 3–30.

3 This research is part of the larger ‘Down to Earth: Governance dynamics and social change in artisanal and small-scale mining in DRC’ research programme. More information on this programme can be found at: [www.wageningenur.nl/har](http://www.wageningenur.nl/har)

4 According to a general overview on iTSCi (9th OECD meeting, Paris, May 2015), iTSCi was implemented in 471 mining areas, 232 of which were located in Katanga province.

5 iTSCi uses two types of barcoded tags: a mine tag and a *négociant*/processor tag, each with unique reference numbers and clearly visible areas of allocation.



*Creuseurs extracting coltan in their shafts (Mai Baridi/May 2014)*

the arrival of trading houses and mining cooperatives in the artisanal mining areas after these were demarcated by the Congolese state as artisanal exploitation zones.<sup>6</sup> However, questions have been raised about the efficiency of iTSCi for improving structural problems of mining governance and improving people's livelihoods (Cuvelier & al. 2014; Vogel and Radley, 2015).

Box 2: Main research question

How have initiatives to reform artisanal mining (iTSCi in particular) affected institutional change, how does this relate to change in patterns of coltan production and trade, how were *négociants* and mineworkers affected by these changes, and how did they respond in the coltan mining areas of Kahendwa, Kisengo and Mai Baridi (northern Katanga) from 2009 to 2014?

To shed light on the main research question (see Box 2) and address the abovementioned assumptions, this study examined institutional creation and change. It looked especially at how, following iTSCi, newly introduced institutions (mining cooperatives) interacted with pre-established *creuseurs'* organisations, analysing how these interactions altered existing patterns of coltan access, the implications of this change for the livelihoods of *négociants* and mineworkers, and how these individuals responded to the politics around 'tagging and bagging'.

<sup>6</sup> The formation of artisanal exploitation zones is restricted to areas where 'the technological and economic factors are not suited for industrial exploitation' (Mining Law, T. 4, Ch. 1, Art. 109).



## Analytical framework and methods

Analytically, the study adopted two main perspectives. First, an actor-oriented approach was taken, building on the premise that individual actors have the agency, knowledge and experience to reflect upon their situation and to respond to changes in their surrounding context (Giddens, 1984). Although the examined mining reforms consist predominantly of ‘ready-made’ techniques such as iTSCi’s ‘tagging and bagging’, analysing reforms with an actor orientation helps to highlight people’s reactions and responses. This includes how reform policies are applied in institutions (e.g. mining cooperatives), how they interact, how they are assigned meaning and how they are negotiated by social actors (Christoplos and Hilhorst, 2009).

Second, the study builds on the sociology of economic life, which holds that economic action is a form of social action that is socially ‘embedded’, meaning that it is linked with or dependent on actions and institutions (such as social networks) that are noneconomic in content, goals and processes (Granovetter, 2005). This perspective facilitates the analysis of the livelihoods of *négociants*, including mechanisms of smuggling minerals into and beyond the mining areas where iTSCi is in force.

This study was undertaken at three coltan mining sites of northern Katanga: Kahendwa, Kisengo and Mai-Baridi. Coltan has been extracted at these sites since 2007. From March 2013 to September 2014, data were collected using participant observation of people’s practices (extraction/sale of coltan and various types of interactions between trading houses, cooperatives, mineworkers and *négociants*), as well as detailed interviews with mineworkers, *négociants* and their households. Data were also collected from the staff of mining cooperatives, trading houses, state authorities and civil servants – predominantly of the *Service d’Assistance et d’Encadrement du Small-Scale Mining* (SAESSCAM) and the Division des Mines. The last group of informants were a group of clandestine coltan *négociants* (known as *hiboux* – literally, ‘owls’), who were followed in the study.

## Focusing on *creuseurs* and *négociants*

This research focuses on two key groups of actors: *creuseurs* and *négociants*. Although policymakers supporting reform initiatives have fixed ideas about how artisanal mining and the mineral trade should be organised, they tend to overlook the meaning and consequences of reforms for mineworkers and *négociants*. In many studies (Geenen, 2011; Maconachie and Hilson, 2011), *creuseurs* and *négociants* have been examined separately. It is often reported that, because of their easier access to information, financial assets and connections, *négociants* often enjoy a brokering position that allows them to dupe the *creuseurs*. This research aimed to nuance this argument, demonstrating that *creuseurs* and *négociants* experience similar realities after the reforms.

## Organisation of mining, reforms and the coltan trade

Prior to the reforms (2007–2009), artisanal mining and the coltan trade were informally organised. There were an estimated 6,000 mineworkers at that time in Kisengo and Mai Baridi together.<sup>7</sup> These were people from surrounding villages and urban cities (mainly Kalemie and Nyunzu) seeking livelihood opportunities. The majority were young men aged 19–45 years. They had different backgrounds, including farmers, deserters and demobilized army. In the mines,

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<sup>7</sup> Mining started in Kahendwa in September 2011 when this mining site accounted for near 5,000 *creuseurs*.

they were organised in teams of 4–10 people, selling coltan to the 105 independent *négociants* present in the mines in 2009. Some *négociants* were independent traders. Others purchased coltan for urban-based trading houses (*comptoirs*) based in Kalemie (northern Katanga), Uvira and Bukavu (South Kivu), and Goma (North Kivu). At that time, mining cooperatives and trading houses were not yet established in the mining areas.

By 2008, efforts to reform artisanal mining had gained traction because of legislative and policy measures taken at the provincial and national levels. In November 2008, the governor of Katanga urged all unauthorised agencies to leave the mining areas (Circular Note no. 263). In March 2009, the Katangese provincial government granted Mining Mineral Resources (MMR, an Indian trading house) the monopoly on buying minerals from four mining sites in northern Katanga (Katonge, Kisengo, Mai Baridi and Lunga). Then, in October 2009, the same Katangese government raised administrative charges for transporting tin and coltan from Katanga to any other province, discouraging many independent *négociants* from continuing their activities. In the same year, the national mining ministry demarcated a number of artisanal exploitation zones. Later, on 1 April 2011, iTSCi was launched in Katanga, with Kisengo as its first pilot site. In March 2011, the national government made it clear that only recognised cooperatives could continue to work in the artisanal mines (Iguma and Hilhorst, forthcoming). The mining cooperatives were expected to originate from pre-established mineworkers' organisations (*groupements d'exploitants artisanaux*).

All of the factors indicated above influenced the organisation of mining activities. In most mining areas, mining cooperatives and trading houses started to provide technical support to mineworkers. For instance, MMR and the *Coopérative des Artisans Miniers du Congo* (CDMC)<sup>8</sup> provided motor pumps and water and performed the *découverture*, a shovelling job to remove the top layer of the shafts to facilitate *creuseurs'* access to coltan deposits. In December 2014, there were about 3,000 *creuseurs* in the study area (half of the 2009 estimates), many of whom were able to obtain a permit (the *carte de creuseurs*) from the mining cooperatives that allowed them to mine.

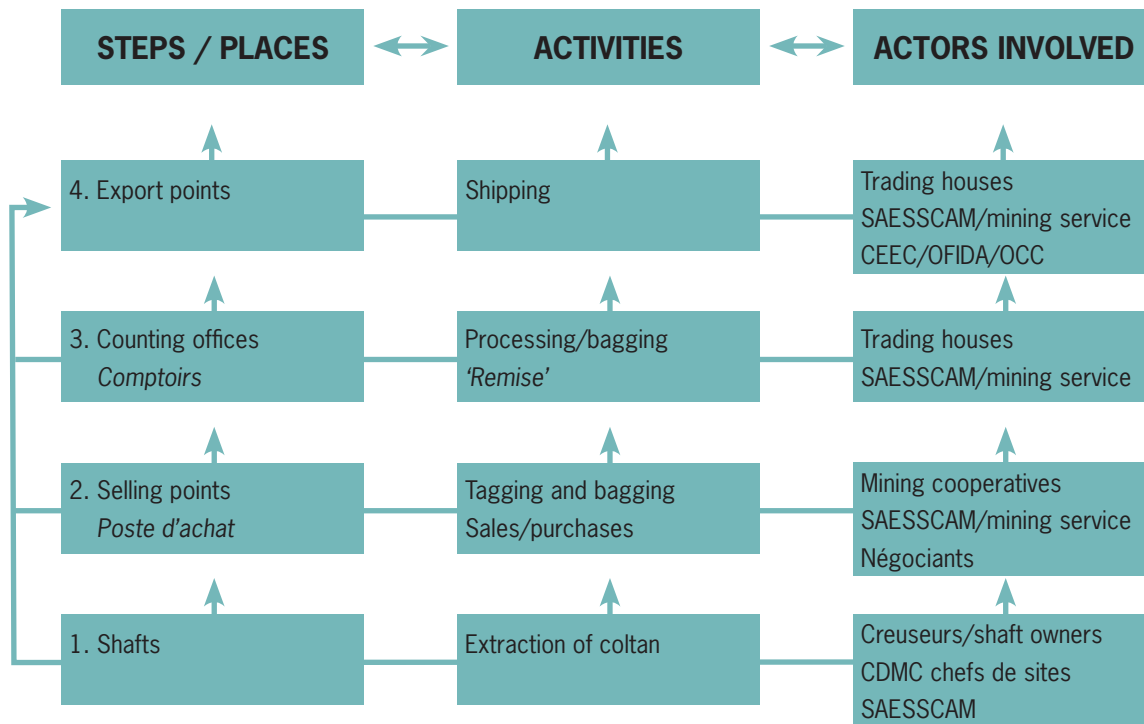
The coltan trade experienced profound change after the reforms. Many *négociants* were excluded from the coltan supply chain by trading houses and cooperatives, reducing their number from 105 in 2009 to only 28 in 2014. After being selected by the trading houses and cooperatives, the 28 *négociants* were pre-financed by these entities, allowing them to purchase coltan from mineworkers. Also, as Figure 1 shows, iTSCi, trading houses and cooperatives organised the coltan processing from the *creuseurs'* shafts to points of exportation.

Figure 1 maps out the organisation of the coltan supply chain. In Step 1, *creuseurs* and shaft owners extract coltan. In Step 2, *creuseurs* sell coltan to *négociants* appointed by mining cooperatives at fixed selling points (*poste d'achat*). At each *poste*, there is a fixed purchase price. For instance, in December 2013, one kg of coltan cost 45 USD in Mai Baridi, 40 USD in Kisengo and 28.8 USD in Kahendwa. After the extracted mineral was 'tagged and bagged' by SAESSCAM civil servants, agents of the Division des Mines recorded all of the transactions on an iTSCi form (*fiche de site minier*) and in logbooks. Then, the cooperatives' staff collected mineral loads and proceeded with the *remise* – handing the mineral loads over to trading houses' counting office (*comptoir*), where these loads were processed and bagged again (Step 3). Finally, the coltan was exported in Step 4. At this stage, other states agencies were also involved in the administrative procedures.<sup>9</sup>

8 Created on 10 April 2010 in Lubumbashi and established in northern Katanga since June 2010, CDMC was the largest cooperative in the area, claiming to represent up to 13,000 *creuseurs*.

9 Agencies involved at this stage were the CEEC (Centre for Evaluation, Expertise and Certification of Precious and Semi-Precious Mineral Substances), the OFIDA (Revenue Authority) and the OCC (Congolese Office of Control).

Figure 1: iTSCi coltan processing steps



Source: Primary data collected in 2013–2014

All of these steps have contributed significantly to improving transparency in the trade of coltan. For instance, from 2011 to 2013, 1,000.53 tonnes of coltan and 15,561.99 tonnes of tin were exported from Katanga (Diemel and Cuvelier, 2015: 158). In 2014, Kisengo alone produced 284 tonnes that were officially exported in Kalemie by MMR.<sup>10</sup>

## Shifting challenges?

This section outlines the main findings of this research. It is shown that, although the reforms primarily aimed to address 'conflict minerals' problems (e.g. the ungoverned character of the coltan trade, abuses of *creuseurs* by armed actors and coltan smuggling), new challenges have emerged.

### 1. Mining cooperatives created with the objective of improving mining governance have been an emergent – rather than durable – solution in terms of representing the interests of artisanal miners.

One of the major findings of this work is that the idea that mining cooperatives can exist and perform as mineworkers' organisations does not hold true. Many cooperatives are top-down, urban creations, controlled by 'big men' with large economic interests in artisanal mining. Thus, to the detriment of the *creuseurs*, the creation of cooperatives overlooked the influence of elites in the process of institutional formation. If new cooperatives in the study area were meant to break away from 'big men' politics, they failed from the start. For many *creuseurs*, 'cooperatives are etiquette, appendix, wrap, skeleton', meaning that these cooperatives did not represent the interests of the majority of mineworkers.

<sup>10</sup> Report of the *Division des Mines*, Kisengo, January 2015.





Coltan at a selling point (Kisengo, April 2014)

## **2. Reforms give rise to new social tensions and local conflicts around property rights and access to coltan.**

The study found that ongoing reforms have caused new conflicts around property rights and access to coltan. Opposing trading houses, cooperatives and *creuseurs*, the provincial Katangese state authorities were the driving force behind these conflicts. Conflicts also resulted from trading houses and mining cooperatives having a near monopoly position following iTSCi implementation. This concerns not only how these entities fixed (or imposed) coltan prices. Discussions with many *creuseurs*, *négociants* and their households indicate that the monopoly position exerted by trading houses and cooperatives allowed these entities to control *creuseurs'* and *négociants'* activities, reducing their access to coltan. In terms of accessing minerals, *creuseurs* have been excluded from some highly productive mining areas, causing clashes with trading houses and cooperatives. Moreover, *creuseurs* have lost their bargaining position regarding mineral prices, and this has affected their livelihoods. Thus, the reforms have contributed little towards improving conditions for the mining populations or addressing their appalling poverty.

## **3. Mining reforms have affected the livelihoods and economic position of *négociants* in different ways, with findings contradicting the widespread opinion that traders are always abusive brokers in the mineral production and commodity chain.**

Prior to the reforms, many *négociants* controlled the coltan market. After the reforms, they have limited room for manoeuvre. Although *négociants* are pre-financed by buying houses and cooperatives and can only purchase coltan under these entities, trading houses and cooperatives often confront financial difficulties such as cash-flow problems. Such difficulties affect *négociants'* activities as well as mineworkers' livelihoods. To cope with financial difficulties, *négociants* have no choice but to rely on their social networks to diversify their livelihood activities or to smuggle coltan.

#### 4. Coltan smuggling is a deeply rooted and networked practice that continues in different forms.

Despite of the contributions of iTSCi, trading houses and cooperatives to addressing the smuggling of coltan, it remains a deeply rooted practice. The social networks in which *creuseurs* and mine-based *négociants* are embedded perform a double function: These networks allow *creuseurs*, *négociants* and smugglers to maintain close relationships and to breach official regulations – as is often assumed – but the networks also enable *creuseurs* and mine-based *négociants* to cheat in their dealings with the smugglers.

## Conclusions

- All of the elements highlighted above suggest that mining reforms have undergone a major shift from addressing the initial problems associated with ‘conflict minerals’ to creating or reinforcing various types of problems, such as the influence of ‘big men’ in the mining business, coltan smuggling and the emergence of new access conflicts.
- Rather being ‘enclaves of regulations’, coltan mining areas where iTSCi takes place are, in fact, neither fully local nor fully locked down. This means that understanding and addressing practices such as smuggling calls for a comprehensive approach at local and broader levels.
- To have policy relevance, reform initiatives such as iTSCi should be based on knowledge about the actual situation, supported by an awareness of *creuseurs*’ and *négociants*’ responses to reforms, and grounded in an in-depth understanding of emerging challenges.

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