'QUI CHERCHE, TROUVE' THE POLITICAL ECONOMY OF ACCESS TO GOLD MINING AND TRADE IN SOUTH KIVU, DRC

'QUI CHERCHE, TROUVE' DE POLITIEKE ECONOMIE VAN TOEGANG TOT GOUDMIJNBOUW EN -HANDEL IN ZUID-KIVU, DRC

SUBMITTED IN FULFILLMENT OF THE REQUIREMENTS FOR THE DEGREE OF DOCTOR IN DEVELOPMENT STUDIES AT THE UNIVERSITY OF ANTWERP

PROEFSCHRIFT VOORGELEGD TOT HET BEHALEN VAN DE GRAAD VAN DOCTOR IN DE ONTWIKKELINGSSTUDIES AAN DE UNIVERSITEIT ANTWERPEN

SARA GEENEN

SUPERVISOR:

PROF. DR. FILIP REYNTJENS (UNIVERSITY OF ANTWERP)

EXAMINATION COMMITTEE :

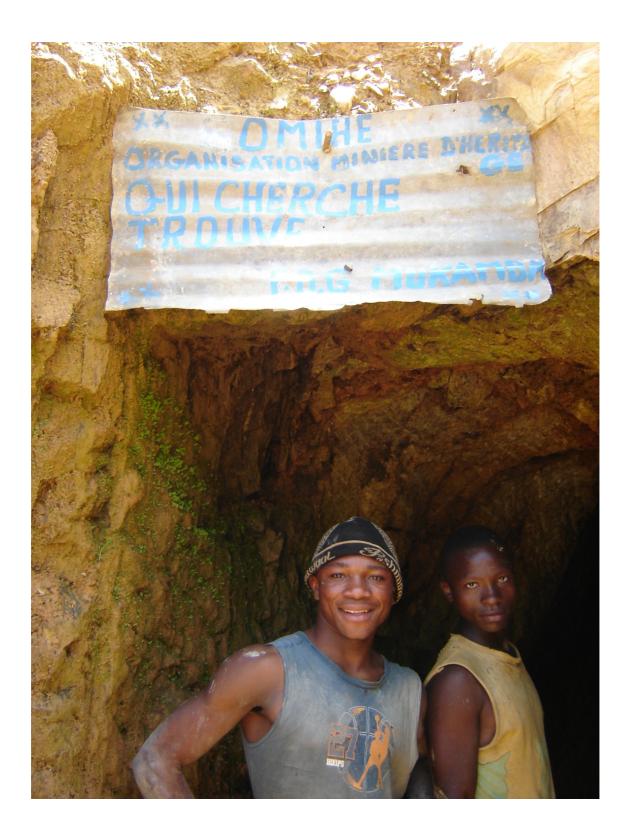
EM. PROF. DR. STEFAAN MARYSSE, CHAIR (UNIVERSITY OF ANTWERP)

PROF. DR. DEBORAH BRYCESON (UNIVERSITY OF GLASGOW)

PROF. DR. TOM DE HERDT (UNIVERSITY OF ANTWERP)

PROF. DR. GAVIN HILSON (UNIVERSITY OF SURREY)

PROF. DR. KOEN VLASSENROOT (GHENT UNIVERSITY)



ABSTRACT

Gold from the eastern Democratic Republic of Congo (DRC) is infamous for sustaining a decade-long conflict and not contributing to development because of its 'illegal' and 'informal' character – it is estimated that 98 percent of it is smuggled out of the country. This dissertation demonstrates first of all why a characterisation of the gold sector in terms of 'illegality' and 'informality' makes little sense in the DRC context. It then calls for a different understanding, based on extensive empirical data which have been dug up through long-term (mainly) qualitative fieldwork in three selected sites. Kamituga, Luhwindja and Mukungwe were chosen because of their importance in terms of people employed and volumes of gold produced, because of their particular historical trajectories and because of the current configuration of artisanal and industrial mining there. Conceptually, the study revolves around 'access' or 'the ability to benefit' from resources, which implies a focus on actors and their practices – how they try to gain, maintain or control access to a resource – but also on the norms and power relations shaping their ability to benefit.

Climbing from the underground mining shafts up to the regional gold trade, this dissertation argues that the gold sector has been (as becomes clear from the historical analysis) and is characterised by specific professional norms and by ambiguous power relations. Miners, traders and other actors involved hold bundles of powers consisting of complementary mechanisms for access maintenance and access control and the configuration of access mechanisms changes over time. These changes depend on local realities, but also on the broader political economy. In the final part, this dissertation studies two recent changes in national and international policies: the attempts at formalisation and regulation of the artisanal mining sector; and the increasing presence of industrial mining companies. Formalisation and industrialisation are analysed as access control mechanisms, causing a reconfiguration of the existing mechanisms and putting a heavy pressure on miners' and traders' ability to benefit.

In brief, artisanal gold mining and trading activities do offer many benefits (economically as well as socially and culturally) to local people in South Kivu, not only directly to miners, traders and their families, but also to those trading and providing services around the mines, and indirectly to the entire local and regional economy. The question is how these people can increase and improve their benefits and maintain them under changing political economic circumstances. In the conclusion this dissertation outlines a possible development path.

ACKNOWLEDGEMENTS

This journey started in the deepest caves of the Congolese gold mines. I first need to thank everyone who gave me access to these fascinating places: the miners and traders in Kamituga, Lugushwa, Luhwindja, Burhinyi, Mukungwe and Bukavu, the people living there and the authorities who gave me permission to carry out my research. In Kamituga I stayed with Alpha 11 in his 'hotel de luxe' and I spent pleasant moments with Guy, Jean-Pierre, Kikyas, Kyabinya, Mbike, Mukamba, Napoleon, Shamamba, Vimba, Dismas (who also accompanied us and generously offered us a place in Lugushwa) and many others. In Luhwindja I stayed at the parish and I want to thank Makelele, Jonas, Peter, Sosthème, Cigeregere as well as the Banro staff, Raoul and Soraya in particular for their hospitality. I also enjoyed my time at the parish in Mubumbano, and thank Marocain, Chunu, Singasinga, Jean-Pierre and many others in Mukungwe. Of course, this dissertation would not be worth anything without the stories of all my interviewees. Although they remain anonymous, their voices can hopefully be heard through this research. My first expression of gratitude needs to go out to them, and to them I dedicate this work.

In Bukavu I worked and lived with many other people who have been important in the materialisation of this dissertation. First of all my colleagues from the Catholic University of Bukavu: Prof. Ntagoma, who welcomed me upon my very first visit, introduced me at the university and took me to the finest Bukavu restaurants; Prof. Namegabe, who coordinates the CEGEMI project (Centre d'Expertise en Gestion Minière) and who was always willing to facilitate my research; and other professors, assistants and collaborators who have contributed to and enriched my research: Alice, Célestin, Francine, Florent, Godelive, Guillaume, Innocent, Janvier, Lucette, Paterne, Yeshi. I also thank the students from the Master in Public Administration and Development for having been so enthusiastic. And of course I particularly thank the entire CEGEMI team for having embarked on the same research journey.

The mining sector has become 'hot' in South Kivu in recent years, so I have especially appreciated the continuous commitment and extensive field knowledge of Eric and Tibere Kajemba and Didier de Failly. The CEGEMI project is part of an Interuniversity Cooperation project financed by VLIR (Vlaamse Interuniversitaire Raad). Their financial support, as well as the support from the FWO (Flemish Scientific Council) and IOB, have been crucial for the necessary fieldwork.

A number of people really made me feel at home in Bukavu. I therefore express a very special thank you to Basimine, who always welcomed me with a big smile and whose wife prepared delicious food; to Dismas, who was at least as enthusiastic about my research as I was myself, and whose family always welcomed me with open arms; to Kyanga, who told me wonderful stories about his childhood in Kamituga; to Philippe de Villé, who has been a great mentor in Bukavu and in Belgium and who always showed his appreciation; to Laurence, a good friend from 'back home' who also showed me how to relax in Bukavu; and of course to my family, the Muhanzi family.

Dieudonné, Maguy, Axel, Gabriel, Anette, Deborah, Philippe, Michael and Diana, you have made me feel more than at home: you made me dance in the living room, just to mention one thing... There is no better place to stay in Bukavu than in the Avenue Nyo Fu.

Finally what would this research have been without Gabriel? He was always walking besides me, like a real guardian angel. We climbed steep hills, spent hours on the back of motorbikes, traveled in overcrowded buses, crawled through underground mines, shared some beers and some spaghetti with canned sardines. Your enthusiasm, curiosity, dedication and tactful contact with all people opened up a lot of doors. Your lovely children and Sylvie, who also made me feel very much at home, undoubtedly needed a lot of patience during (y)our many field visits. I would like to thank them for that as well.

In Bujumbura, I found a home with Gilbert Midende, Prudentienne and Sybille. Despite his busy schedule Gilbert always had time for me, he facilitated my research in many ways and frequently called me 'at the other side of the border' because he was worried and curious about my doings.

Congo, according to the famous colonial anthem 'as big as a world where your flag has been planted', actually is a small world for researchers. I was happy to repeatedly run in to the following people at conferences and in the field: Karen Büscher, Giuseppe Cioffo, Jeroen Cuvelier, Jose Diemel, Nicole Eggers, Kasper Hoffmann, Margot Leegwater, Koen Leuveld, Charlotte Maisin, Gillian Mathys, Emery Mudinga, Marie Müller, Aymar Nyenyezi, Katrien Pype, Laura Seay, Julie Vandamme, Eva Vandenbroek, An Verelst, Christoph Vogel. Dan Fahey was a nice colleague, but also a good friend who always encouraged me and took me to the best pools in the Great Lakes Region.

Leaving the mines and the DRC behind me, I want to thank a number of people who have been extremely important in the materialisation of this dissertation. The following colleagues have given much appreciated comments on articles or chapters of this PhD: An Ansoms, Deborah Bryceson, Jeroen Cuvelier, Tom De Herdt, Pierre Englebert, Gavin Hilson, René Lemarchand, Sabine Luning, Stefaan Marysse, Pierre Merlet, David Newbury, Timothy Raeymaekers, Filip Reyntjens, Kristof Titeca, Marijke Verpoorten, Koen Vlassenroot and a number of anonymous reviewers of journal articles. I also had the privilige to work with several co-authors on some of the articles that formed the basis of this dissertation. I therefore owe a lot to insights from and discussions with Anna Bulzomi, Klara Claessens, Raf Custers, Dan Fahey, Jana Hönke, Francine Iragi, Gabriel Kamundala, Ken Mathysen and Ben Radley. Serge Lammens put me on the right track in the beginning of my research and provided extremely valuable information on Kamituga's history. I am also particularly grateful to Filip Hilgert (IPIS) who provided most of the GPS locations that form the basis of the maps in annex, and Nik Stoop for spending a few hours making these maps for me. A special thank you goes out to Joëlle Dhondt for her very efficient helping hand in the lay-out of this document. And finally thank you to Craig Rollo, who undertook a careful proofreading of this dissertation – while all errors of course remain mine.

I want to thank the members of my jury in particular, and I take the freedom to address them in person, and with their first name.

Stefaan, you actually put me on this research journey on the Congolese mining sector. Although in the beginning you were a bit skeptical about this history student without too much knowledge about economics, I think we got along pretty well in the end... In any case I consider you a great mentor. On your retirement we sang a song for you, and one of the phrases of that song according to me best captures who you are: (music, la ballade des gens heureux): "later he went to the Congo rimbou - débrouillez-vous it was a miracle – and I guess he's the only one who – has not completely become cynical". I take off my hat to that quality of yours, because I have found myself far too impatient and too easily frustrated by some obstacles on the way which you took with great dignity.

After your retirement your role as supervisor was taken over by Filip. The vacancy for which I applied in 2007 mentioned I was expected to study 'local political dynamics in the Great Lakes Region'. Although by choosing the topic of mineral resources, it first seemed as if I was going to divert from this path, I think the study eventually became much more political than even I foresaw.

Filip, your evident authority and erudition were rather intimidating when I started at the IOB - and they still are sometimes. But I have always been very motivated by the way you do your work and your research, and the way in which you encourage your junior colleagues and show your sincere appreciation.

Tom, picking your brain is an enormous challenge as it often has unexpected twists, but it is incredibly enriching as well! I want to thank you for having significantly contributed to the improvement of my work and for the pleasant and constructive collaboration, not only as a colleague-researcher, but also as the Chair of the institute.

Koen, you were the supervisor of my master dissertation at the University of Ghent, for which I took my first steps in the Great Lakes Region. During my master studies you scheduled a lecture on Kamituga, based on one of your articles. Needless to say that these were crucial steps in the origins of this PhD dissertation and I owe a lot to the work you have done.

Gavin and Deborah, it was so nice to find out that there are other people obsessed with artisanal mining! I really admire your work and hope to continue collaborating in the future.

The IOB has been such a wonderful environment to work in. I want to explicitly thank all current and former colleagues, for sharing work experiences and ideas for research or teaching, or just for chit-chatting in the kitchen.

Wim, with you I have shared six years of being a mandate assistant at IOB, an office and many stories, gossip, laughter, but also sweat (especially from your side) and tears (especially from my side). I knew that, despite the fact that you kept on telling me that I was 'goe bezig', one day you would pass me by. And that is what you did by defending last year and leaving me behind in 'den S149' (although in the good company of Filip, I must admit).

An A, you have shown me the way since my very first days at the IOB. Your enthusiasm, pleasure in your work, your sense of initiative and positivity - not only in your work but also in more important things in life - have been a great inspiration.

An V, your encouragement also meant a lot to me. We are spoiled at the IOB with an accountant who is so efficient, and with a colleague who is so sweet, empathic and colourful.

Bert I and Kristof, your dedication and thoroughness in doing research and fieldwork have been an example for me, and I can only try to do almost as well. Thank you also for distracting me from my work from time to time.

Greet, Inge, Joëlle, Nanneke and Sara, you are wonderful colleagues, but also good friends and beautiful young mothers: you have it all! Thank you for checking on how I was doing at the right moments – in work and in life. For that I also need to especially thank Nathalie H (also a young mother in fact), Marjan and Karel.

v

Katleen, you are a wonderful, crazy woman and a recipe for great fun, but also a shoulder to cry on. I can't say how much this has meant to me in difficult moments. And of course I also need to thank you for carefully following up on the process of preparing this PhD.

Klara, your positive attitude and cheerfulness are contagious (and I never forget your face after having climbed Mukungwe hill). You always helped me out when it was needed and took over some teaching assignments when I was too busy or ill. We had a great fieldwork period together and a wonderful time in exotic conference destinations.

To all other colleagues and former colleagues, friends of the lunch table, the coffee machine and the Happy Hour: Ana, Anna, Bert J, Bjorn, Danny, Dennis, Dominik, Eva P, Eva V, Filip, Frédéric, Geovanna, German, Gert, Griet, Hans, Hugo, Janus, Johan, Jos, Jude, Katrien, Kelbesa, Leen, Liesbeth, Linas, Lode, Loresel, Marie, Marijke, Marleen, Martin, Mattias, Miet, Nadia, Nathalie F, Nicole, Nik, Omer, Patricia, Paul, Pierre, Robrecht, Stani, Stef, Wannes (and those whom I have forgotten): our daily conversations fortunately did not deal with gold mining and gold trade, but discussed much more interesting facts of life, like food, kids, friends, family, relationships, holiday experiences, food, cultural events, television shows, students and fellow colleagues. Without you, my days at the office would have been so much longer, so I thank you for all serious and less serious conversations!

My friends and family, I am sure that sometimes it was hard to understand why I had to travel to Congo all the time. It was not because I wanted to become the 'patron saint of the artisanal miners', as Stijn once called me, but because I first of all felt a need to understand and make sense of their situation and their work, which may seem so senseless at first sight. It was also a fascinating personal journey, in which I was faced with many difficulties and frustrations, but by which I grew stronger.

My friends, some of you were also doing a PhD (in more serious subjects at more Catholic universities), some of you were working abroad, some of you followed my example and bought a house in Mechelen: it was always nice meeting up with you. Thank you for your support and distraction whenever it was necessary.

Kato, thank you for always being there, especially in difficult times, and for bringing a lot of joy with your entire family: Daan, Marie and Klaartje.

Lore, thank you for the nice moments together and the great interest you take in my work. You are looking forward now to starting your studies at the University of Antwerp, and I'm sure you will succeed, whatever you are going to do in life.

Mama, from you I inherited the curiosity and respect for other people, the writing skills and the quality of being compassionate and keeping a healthy distance at the same time, all things that have helped me in my research. And also the fact that I have difficulty saying 'no', which has not always helped me... If you were worried about me being 'in the field' or doing other stupid things, you rarely showed it. Instead you showed confidence and pride, which was much appreciated. Thank you for everything.

Mark, for you the pictures in this dissertation must bring back memories from your own time in the Belgian coalmines, and going underground myself, my respect has surely grown. You put a lot of effort and dedication in going over the reference list of this dissertation. And in the past few months you have done so much for me and for Fabian. Thank you. Moeke, thank you for following up so closely on 'teletekst' on when my plane had landed and for taking such an interest in my work. I hope I have brought 'the Congo' a bit closer to you.

Papa, the hard working spirit, the determination to never give up, the good physical condition and the mental strength were passed on through your genes. They came in handy when completing this dissertation. Thank you for all the support you have given me over the years and for the confidence you have always had in me, albeit mostly unspoken.

Stijn, I want to thank you for having passed on your passion for your mother country (thanks to Willy and Pauline as well), for having shared many wonderful years of my life and for co-authoring the most beautiful epilogue ever.

Epilogue

Fabian, you brought summertime, you make fish jump, you make the living easier! I am so proud and happy you are here.

PREFACE

This dissertation tells the story of South Kivu's gold miners and traders. It is based on fieldwork carried out between 2008 and 2012. About 160 years before, the gold fever attracted some 300,000 people to California, leading to the development of boom towns and road infrastructure, the establishment of private property rights and a state constitution, and the forced removal of tens of thousands Native Americans from their land. Despite the geographic and temporal distance and the obvious contextual differences, many dynamics described in this dissertation echo the days of the Californian gold rush. Each chapter in this dissertation therefore starts with a quote from the book "Le filon de Jean- Nicolas Perlot. Le véridique histoire d'un chercheur d'or en Californie en 1850, écrite par lui-même" (adapted by André Dejardin, 1974, Editions J. Duculot, Gembloux). Perlot was a Belgian gold seeker who migrated to California in 1848 and provides a vivid and personal account of the early days of the gold rush.

Many chapers in this dissertation are based on articles already published, although all have been extensively rewritten. The following table shows where there is overlap between particular chapters and published articles.

| 1. Questioning mining and development | Geenen, 2011c |
|--|--|
| | Geenen, 2012 |
| | Geenen, 2013 |
| | Geenen, 2014 forthcoming |
| 2. Mining and development in the DRC and | Geenen and Custers, 2010 |
| South Kivu | Geenen, 2011a |
| | |
| 3. Political economy of access to gold: a | Geenen, 2013 |
| conceptual framework | Geenen and Claessens, 2013 |
| | |
| 4. Going underground: some methodological | |
| aspects | |
| | |
| 5. History of mining in Kamituga | Geenen and Kamundala Byemba, 2009 |
| | |
| | Geenen, 2011b |
| | Geenen, 2011b Geenen, 2013 |
| 6. History of mining in Luhwindja | |
| 6. History of mining in Luhwindja | Geenen, 2013 |
| 6. History of mining in Luhwindja | Geenen, 2013 Geenen and Claessens, 2013 |
| 6. History of mining in Luhwindja7. History of mining in Mukungwe | Geenen, 2013 Geenen and Claessens, 2013 Geenen and Iragi Mukotanyi, 2013 |
| | Geenen, 2013 Geenen and Claessens, 2013 Geenen and Iragi Mukotanyi, 2013 Geenen and Hönke, 2014 forthcoming |
| | Geenen, 2013 Geenen and Claessens, 2013 Geenen and Iragi Mukotanyi, 2013 Geenen and Hönke, 2014 forthcoming |
| 7. History of mining in Mukungwe | Geenen, 2013 Geenen and Claessens, 2013 Geenen and Iragi Mukotanyi, 2013 Geenen and Hönke, 2014 forthcoming Geenen and Claessens, 2012 |
| 7. History of mining in Mukungwe | Geenen, 2013 Geenen and Claessens, 2013 Geenen and Iragi Mukotanyi, 2013 Geenen and Hönke, 2014 forthcoming Geenen and Claessens, 2012 Geenen and Kamundala Byemba, 2008 |
| 7. History of mining in Mukungwe | Geenen, 2013 Geenen and Claessens, 2013 Geenen and Iragi Mukotanyi, 2013 Geenen and Hönke, 2014 forthcoming Geenen and Claessens, 2012 Geenen and Kamundala Byemba, 2008 Geenen, 2011b |

| 10. Access in gold trade | Geenen, 2011c |
|--|--|
| 11. Changes in access: formalisation | Geenen, Kamundala Byemba and Iragi |
| | Mukotanyi, 2011 |
| | Geenen, 2012 |
| 12. Changes in access: industrialisation | Geenen and Claessens, 2013 |
| | Geenen, Fahey and Iragi Mukontanyi, 2013 |
| | Geenen and Iragi Mukotanyi, 2013 |
| | Geenen, 2014 fortcoming |
| | Geenen and Hönke, 2014 forthcoming |
| 13. Conclusion | Geenen and Radley, 2014 |

TABLE OF CONTENTS

| AbstractI |
|--|
| ACKNOWLEDGEMENTS III |
| PREFACEIX |
| TABLE OF CONTENTS |
| LIST OF ACRONYMSXV |
| LIST OF TABLES XVII |
| LIST OF FIGURES XIX |
| Part one21 |
| CHAPTER 1. QUESTIONING MINING AND DEVELOPMENT |
| 1.1. Industrial mining and development: a contentious relationship? |
| 1.2. Artisanal mining and development: a desperate case?27 |
| 1.3. Defining a problem: the debate on 'informality' and development |
| 1.4. Designing the solution: formalisation as a panacea |
| 1.5. Artisanal and industrial mining: processes of dispossession and development |
| 1.6. Conclusion |
| |
| CHAPTER 2. MINING AND DEVELOPMENT IN THE DRC AND SOUTH KIVU45 |
| CHAPTER 2. MINING AND DEVELOPMENT IN THE DRC AND SOUTH KIVU |
| |
| 2.1. Mining in the DRC: a curse? |
| 2.1. Mining in the DRC: a curse? 45 2.2. Mining in the DRC: an overview of the political economy. 47 2.2.1. The political economy of industrial and artisanal mining 47 2.2.2. The Mining Code 52 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices55 |
| 2.1. Mining in the DRC: a curse? 45 2.2. Mining in the DRC: an overview of the political economy. 47 2.2.1. The political economy of industrial and artisanal mining 47 2.2.2. The Mining Code 52 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices55 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining.472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK65 |
| 2.1. Mining in the DRC: a curse? 45 2.2. Mining in the DRC: an overview of the political economy. 47 2.2.1. The political economy of industrial and artisanal mining. 47 2.2.2. The Mining Code 52 2.3. Mining in South Kivu: law versus practices 55 2.4. Conclusion 63 CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK 65 3.1. Institutions, norms and practices 66 |
| 2.1. Mining in the DRC: a curse? 45 2.2. Mining in the DRC: an overview of the political economy. 47 2.2.1. The political economy of industrial and artisanal mining. 47 2.2.2. The Mining Code 52 2.3. Mining in South Kivu: law versus practices 55 2.4. Conclusion 63 CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK 65 3.1. Institutions, norms and practices 66 3.2. Access: rights, structure and relations 67 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining.472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK653.1. Institutions, norms and practices663.2. Access: rights, structure and relations673.3. Power, authority and legitimacy.71 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining.472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK653.1. Institutions, norms and practices663.2. Access: rights, structure and relations673.3. Power, authority and legitimacy713.4. Access maintenance and access control72 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK653.1. Institutions, norms and practices663.2. Access: rights, structure and relations673.3. Power, authority and legitimacy.713.4. Access maintenance and access control723.5. Agency and elite capture74 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy472.2.1. The political economy of industrial and artisanal mining472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK653.1. Institutions, norms and practices663.2. Access: rights, structure and relations673.3. Power, authority and legitimacy713.4. Access maintenance and access control723.5. Agency and elite capture743.6. Putting the frame to work75 |
| 2.1. Mining in the DRC: a curse?452.2. Mining in the DRC: an overview of the political economy.472.2.1. The political economy of industrial and artisanal mining.472.2.2. The Mining Code522.3. Mining in South Kivu: law versus practices552.4. Conclusion63CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK653.1. Institutions, norms and practices663.2. Access: rights, structure and relations673.3. Power, authority and legitimacy.713.4. Access maintenance and access control723.5. Agency and elite capture743.6. Putting the frame to work75CHAPTER 4. GOING UNDERGROUND: SOME METHODOLOGICAL ASPECTS79 |

| 4.4. 'Conducteur' | 88 |
|--|-----|
| 4.5. 'Bout de feu' | 88 |
| 4.6. 'Foreur' | 90 |
| 4.7. 'Panneur' | 92 |
| 4.8. Silence is golden | 94 |
| Part two | 97 |
| CHAPTER 5. HISTORY OF MINING IN KAMITUGA | 99 |
| 5.1. Territorialisation and labour (pre-1960s) | 101 |
| 5.2. Resistance, start of artisanal mining, repression and relations (1960s) | 104 |
| 5.3. Professionalisation of artisanal mining and repression (1970s) | 108 |
| 5.4. Expansion of artisanal mining, tolerance and taxation (1980s) | 110 |
| 5.5. Professionalisation of artisanal mining, negotiation and violence (1990s and first war) | 114 |
| 5.6. Violence, cooperation and expansion of artisanal mining (second war) | 116 |
| 5.7. Privatisation, legalisation and resistance (2003-2012) | 118 |
| 5.8. Conclusion | 120 |
| | |
| CHAPTER 6. HISTORY OF MINING IN LUHWINDJA | |
| 6.1. Coercion, labour and elite capture (pre-1960s) | |
| 6.2. Emergence and expansion of artisanal mining, taxation and legitimisation (1960s-1990s) | |
| 6.3. Privatisation and legalisation (1996-1997) | 129 |
| 6.4. Violence, legalisation and territorialisation (1998-2004) | 131 |
| 6.5. Legitimisation, privatisation and resistance (2005-2012) | 134 |
| 6.6. Conclusion | 140 |
| CHAPTER 7. HISTORY OF MINING IN MUKUNGWE | 143 |
| 7.1. Legalisation, rights, relations and financial capital (1970s-1980s) | 144 |
| 7.2. Violence and legalisation (1990s) | 147 |
| 7.3. Legalisation, privatisation, violence and resistance (2002-2010) | 148 |
| 7.4. Legalisation, territorialisation and violence (2011-2012) | 150 |
| 7.5. Conclusion | 153 |
| Part three | 157 |
| CHAPTER 8. ACCESS IN ARTISANAL GOLD MINING | 159 |
| 8.1. Artisanal mining in Kamituga, Luhwindja and Mukungwe | |
| 8.1.1. Alluvial placer mining | |
| 8.1.2. Underground shaft mining | |
| 8.2. Benefits in artisanal gold mining 8.2.1. Why miners mine | |
| 8.2.2. How much miners make | |
| 8.2.3. How miners spend their earnings | 175 |
| 8.3. Rights-based and relational access mechanisms | 180 |

| 8.4. Structural and relational access mechanisms | |
|--|-----|
| 8.5. Professional norms in gold mining | |
| 8.6. Conclusion | |
| | 205 |
| CHAPTER 9. ACCESS THROUGH RELATIONSHIPS | |
| 9.1. Building relationships | |
| 9.2. Credit and debt relationships | |
| 9.3. Professional norms: friendship and trust | |
| 9.4. Professional norms: sanctioning | |
| 9.5. Conclusion | |
| CHAPTER 10. ACCESS IN GOLD TRADE | |
| 10.1. Gold trade from the local to the global | |
| 10.1.1. Local gold trade | |
| 10.1.1. Local gold trade | |
| 10.1.3. Regional gold trade | |
| 10.1.4. Global gold trade | |
| 10.2. Access mechanisms in gold trade | 240 |
| 10.2.1. Access to markets | |
| 10.2.2. Access to financial capital | |
| 10.2.3. Access to vertical relations | |
| 10.2.4. Access to horizontal relations | |
| 10.2.5. Access to information about prices | 248 |
| 10.2.6. Access to technology | 251 |
| 10.2.7. Access to trickery | |
| 10.2.8. Access to smuggling | |
| 10.2.9. Access to foreign currency | |
| 10.2.10. Access to alternative markets | |
| 10.2.11. Access to the state regulatory framework | |
| 10.3. Conclusion | |
| Part four | 267 |
| CHAPTER 11. CHANGES IN ACCESS: FORMALISATION | 269 |
| 11.1. Overview of international initiatives | |
| 11.2. Certification and traceability as access control | 271 |
| 11.3. Overview of national initiatives | |
| 11.4. Formalisation as access control | |
| 11.5. Conclusion | |
| CHAPTER 12. CHANGES IN ACCESS: INDUSTRIALISATION | 202 |
| 12.1. Industrialisation as access control | |
| | |
| 12.2. Access maintenance | |
| 12.3. Benefits in the artisanal production mode | |
| 12.4. Conclusion | |
| CHAPTER 13. CONCLUSION | 297 |

| 13.1. Academic contribution | |
|--------------------------------|-----|
| 13.2. Development contribution | |
| REFERENCES | |
| ANNEXES | 345 |
| SAMENVATTING | |

LIST OF ACRONYMS

| ADEPED | Action pour le Développement des Peuples en Détresse |
|--------|---|
| ADMR | Action pour le Développement des Milieux Ruraux |
| AEZ | Artisanal Exploitation Zones |
| AFDL | Alliance des Forces Démocratiques pour la Libération du Congo |
| ANR | Agence Nationale des Renseignements |
| APEF | Action pour la Promotion des Enfants et de la Femme |
| ASM | Artisanal and Small-scale Mining |
| BGR | Federal Bureau of Geo-Sciences and Natural Resources |
| CASM | Communities and Artisanal and Small-Scale Mining |
| CEEC | Centre d'Evaluation, d'Expertise et de Certification des substances minérales |
| | précieuses |
| CHDC | Congo Holding Development Company |
| CNDP | Congrès National pour la Défense du Peuple |
| CNKI | Comité National du Kivu |
| CODELU | Comité pour le Développement de Luhwindja |
| СОКА | Coopérative de Kamituga |
| CSR | Corporate Social Responsibility |
| СТС | Certified Trading Chains |
| СТСРМ | Cellule Technique de Coordination et de Planification Minière |
| DGI | Direction Générale des Impôts |
| DGM | Direction Générale de Migration |
| DGRAD | Direction Générale des Recettes Administratives et Domaniales |
| DMCC | Dubai Multi Commodities Centre |
| DPMER | Direction Provinciale de Mobilisation et d'Encadrement des Recettes |
| EITI | Extractive Industries Transparency Initiative |
| FAR | Forces Armées du Rwanda |
| FARDC | Forces Armées de la République Démocratique du Congo |
| FAZ | Forces Armées Zaïroises |
| FDLR | Forces Démocratiques pour la Libération du Rwanda |
| ICGLR | International Conference on the Great Lakes Region |
| IIED | International Institute for Environment and Development |
| IPIS | International Peace Information Service |
| ITRI | International Tin Research Institute |
| iTSCi | ITRI Tin Supply Chain initiative |
| JLT | Jumeirah Lakes Tower Free Zone |
| LAV | Laissez l'Afrique Vivre |
| LSM | Large-scale Mining |
| MGL | Minière des Grands Lacs |
| Miba | Minière de Bakwanga |
| MLC | Mouvement pour la Libération du Congo |
| MMR | Mining Mineral Resources |
| MMSD | Mining, Minerals and Sustainable Development project |
| MPC | Mouvement des Patriotes Congolais |
| OCC | Office Congolaise de Contrôle |
| OECD | Organization for Economic Cooperation and Development |
| OFIDA | Office des Douanes et Accises |
| OGP | Observatoire Gouvernance et Paix |
| OKIMO | Office des Mines d'Or de Kilo-Moto |
| | |

| PAC | Partnership Africa Canada |
|----------|--|
| RCD | Rassemblement Congolais pour la Démocratie |
| RMA | Ressources Minières Africaines |
| RPF | Rwandan Patriotic Front |
| Saesscam | Service d'Assistance et d'Encadrement du Small-Scale et Artisanal Mining |
| SAKIMA | Société Aurifère du Kivu-Maniema |
| SAMIKI | Société Agricole et Minière du Kivu |
| SOMICO | Société Minière du Congo |
| SOMIGL | Société Minière des Grands Lacs |
| Somimu | Société Minière de Mukungwe |
| Sominki | Société Minière et Industrielle du Kivu-Maniema |
| UJCC | Union des Jeunes Congolais pour le Changement |
| UMHK | Union Minière du Haut-Katanga |

LIST OF TABLES

Table 1. Taxes and duties applicable to artisanal mining

Table 2. Official gold exports from South Kivu (1998-2012)

Table 3. Official exports by comptoir (2007-2012)

Table 4. Official exports from Burundi (2001-2009)

Table 5. Estimate of gold flow in Kamituga

Table 6. List of artisanal exploitation zones in South Kivu

Table 7. Number of 'cartes d'exploitant artisanal' sold by Provincial Mining Division

Table 8. Number of 'cartes de négociant' sold by Provincial Mining Division

Table 9. Taxes and duties received by the Provincial Mining Division of South Kivu (in USD)

Table 10. Access analysis of Kamituga's mining history

Table 11. Access analysis of Luhwindja's mining history

Table 12. Access analysis of Mukungwe's mining history

Table 13. Primary reason for working in this sector

Table 14. Motivation to stay in artisanal mining

Table 15. Typical calculation of costs and individual profits in mining

Table 16. Time spent in the sector and in the current mining site

Table 17. Standard formula for calculation of gold price at different levels in the chain

Table 18. Measures and instruments to weigh gold

Table 19. End-use gold consumption 2008-2012 (in tonnes)

Table 20. Alternative jobs proposed by artisanal miners

Table 21. Supply of gold to the market

LIST OF FIGURES

Figure 1. Schematic presentation of the analytical concepts

Figure 2. Sominki's gold production 1976-1996 (in kg)

Figure 3. Workers' houses in Kamituga

Figures 4-7. Kamituga: miners working with a karai, biporo and sluice with kisasi

Figures 8-9. Artisanal miners working alluvial deposits in Mwana river

Figures 10-11. View on the shafts in the hillsides around Mobale mine and Kalanga and Lukwera

Figures 12-13. 'Qui cherche, trouve' in Kamituga

Figures 14-15. 'Descenderie' in Mukungwe and 'direction' in Kamituga

Figures 16-17. Wooden constructions inside the shafts in Mukungwe and Kamituga

Figures 18-19. 'Mamans twangaises' in Kamituga, miners using a 'karai' for the 'pannage' in Kamituga

Figures 20-21. Miners burning the gold with nitric acid in Kamituga

Figure 22. Schematic representation of an underground conflict

Figures 23-24. Illustrations of the drawbacks of granting credit

Figure 25. Simplified gold value chain

Figures 26-27. Coins and other weight instruments with their unit of measurement and manual balance

Figure 28. Calendar of Établissements Namukaya

Figure 29. Electronic scales used by a Bukavu trader

Figure 30. Sign indicating the prohibition to enter the core area of the mining project

Figure 31. Surveyed shaft managers' statements on employment in artisanal and industrial mining

Figure 32. Surveyed shaft managers' statements on profits in artisanal and industrial mining

Figure 33. Surveyed shaft managers' statements on development and artisanal and industrial mining

PART ONE

"On peut encore, en ce moment, trouver assez facilement des terrains inoccupés, mais cette situation ne durera pas longtemps, en présence de l'affluence toujours croissante des immigrants sur le *placer*" (p.106).

"At this moment one can still find vacant land, but this situation will not last as more and more migrants rush into the mines" (p.106).

The aim of this chapter is to frame the research in the broader literature on mining and development. I start by discussing the contentious and ambiguous relationship between industrial, large-scale mining and development (section 1.1), before moving on to a discussion of artisanal mining (section 1.2). The literature on artisanal and small-scale mining in Sub-Saharan Africa has grown substantially over the last decade and helps us to better understand the dynamics of the sector, the motivations and behaviour of the actors involved and its potential contribution to development. Many researchers and policymakers believe that the 'illegal' (the fact that they take place outside the state regulatory framework) and the 'informal' (the fact that they are unrecorded and take place outside the official economy) character of artisanal mining activities form the main hindrance for its contribution to development. Therefore, in this chapter I will go back to the broader literature on the 'informal sector'. In section 1.3 I will show how the 'informality' concept has evolved and why it is not relevant in the context under study. Yet remarkably, 'informality' is still the key to understanding current policies around artisanal mining, as these policies almost unanimously propose 'formalisation' of the sector as a panacea solution. The 'formalisation' concept should also be critically discussed, as section 1.4 demonstrates. This becomes all the more important when looking at current mineral policies. The 'informal' artisanal activities generate little revenue for national governments, which encourages the latter to promote large-scale industrial operations instead. In section 1.5 I dig deeper into the differences between industrial and artisanal mining. I consider them different modes of production, whereby industrial mining stands for a model which embraces neoliberal capitalism, privatises and commodifies natural resources and substitutes labour for capital, whereas artisanal mining offers ample opportunities for (flexible) employment and local livelihood support and is well-connected to the local economy and society. This first chapter thus presents an overview of the literature on mining and development and analyses the terms in which this discussion is often framed. In chapter three then I will construct my own conceptual framework, which allows for an empirically grounded analysis and, I think, a better understanding of artisanal mining and mineral trade, away from normative assumptions about artisanal mining and development.

Before moving forward I need to clarify my use of the terms 'artisanal', 'small-scale', 'industrial' and 'large-scale'. 'Small-scale' mining is used to denote a mining project that is partially mechanised and mostly manual, requires relatively little capital investment and is labour intensive, as opposed to large-scale mining (LSM), which requires a lot of capital but needs a smaller labour force per unit of production (Hilson, 2002c). Two other antonyms, industrial and artisanal, differentiate between mechanised and non-mechanised production modes. When used in the context of mining, 'artisanal' mining refers to a non-mechanised, manual mode of production, which often involves individual, group and family labour and simple tools and equipment. The difference with 'small-scale' mining is that the latter is, to a

certain extent, mechanised and may involve small companies. This may also be called 'semiindustrial' mining. In the literature however, 'artisanal' and 'small-scale' are often used interchangeably and referred to as ASM (artisanal and small-scale mining). In the absence of a consensus over a workable definition, Hentschel et al (2003: 6) in a report for the International Institute for Environment and Development define a number of common characteristics of ASM, such as limited mechanisation and physically demanding work, low level of occupational safety and health care, poor qualification of personnel, low recovery value, low income, lack of working and investment capital, lack of consideration of environmental issues, low productivity, exploitation of small deposits and seasonality.

1.1. INDUSTRIAL MINING AND DEVELOPMENT: A CONTENTIOUS RELATIONSHIP?

In the words of Bebbington et al (2008: 887) the relationship between large-scale industrial mining and development is characterised by 'contentiousness' and 'ambiguity': "Contentious because mining has so often delivered adverse social, environmental and economic effects for the many, but significant gains only for the few; ambiguous because of the abiding sense [...] that *just maybe* mining could contribute much more". Indeed, revenues from mining have an enormous potential to contribute to government budgets and may account for quite spectacular economic growth in developing countries, as has happened at certain moments in history and more recently for a number of African countries (Africa Progress Panel, 2013: 42-45). Yet there are also many examples of countries where a heavy reliance on mineral resource exploitation has caused underdevelopment. The most outspoken denouncers of the adverse effects on growth were the advocates of the 'resource curse' thesis (Auty, 1993; Sachs and Warner, 1995). The thesis suggested that the abundant presence of natural resources generates a number of economic (Dutch disease, revenue volatility, enclave economies¹) and political effects (bad governance, rent-seeking behaviour, patronage politics, corrupt institutions²) which will eventually undermine a country's development.

Building further on this 'abundance' theory, scholars have also established a link between natural resources and conflict³. On the basis of a statistical analysis of civil wars, Collier and Hoeffler (1998) formulated their 'greed' thesis, according to which the abundant presence of natural resources, and the greed for those, or loot-seeking, increase the probability of civil war. This theory thus connected the motives for civil war to the presence of natural resources. A variation on this theory looked at opportunities, rather than at motives or causes, and argued that rebels may conduct a civil war if the perceived benefits outweigh the costs of rebellion. Violent conflict, in other words, may yield considerable economic benefits for some groups (Ballentine and Sherman, 2003: 4). Especially resources that are easily accessible,

¹ Dutch disease is an economic phenomenon in which the revenues from natural resource exports lead to a high inflow of foreign currency. This causes a higher valuation of the local currency, increasing wages and costs in other economic sectors, which makes these sectors less competitive in the world market. At the same time imports will be boosted to the detriment of local production. This will in return lead to a greater dependence on natural resources and a less diversified economy. Countries that are highly dependent on the export of natural resources are also more vulnerable to revenue volatility because of the fluctuation of commodity prices in the world market (Davis and Tilton, 2005: 236). Moreover, mining projects are often enclave economies, for which the rents flow to the company's home countries and with few trickle down effects on local economies.

² See Woolcock et al (2001); Rosser (2006) for a literature overview.

³ Another theory is the 'resource scarcity' theory, which claims that "people or nations will fight each other to secure access to the resources necessary for their survival" (Le Billon, 2001: 564).

relatively simple to extract and to control and yield large financial returns are attractive for armed groups. Le Billon (2001: 569) called them 'lootable' resources and used this as a basis for making a typology of resource-linked armed conflicts. These 'greed theories' had the merit of drawing attention to the importance of economic factors and the particularities of 'war economies' (Keen, 1998). But the 'greed' argument has been criticised and counterbalanced by a greater emphasis on 'grievances' (Ballentine, 2003). The link between natural resources and conflict may also be more indirect, for example through a mismanagement of resource wealth that creates grievances, or weakened institutions as a result of the resource curse (Malone and Nitzschke, 2005).

Despite the contentious contribution of mineral resources to development, investments in the mining sector are still widely applied as a development strategy, because it does indeed generate government revenues. The World Bank has been encouraging investments in largescale mining for a long time. The general idea that 'growth is good for the poor' was translated into the belief that the positive effects of mining sector growth would automatically trickle down to the poor. The World Bank has also been very active in calling for and supporting regulatory and legal reforms. Bonnie Campbell (2004 and 2009) described how the reform of regulatory and legal frameworks concerning the mining sector in Africa have contributed to a more favourable environment for foreign investment, while at the same time completely redefining the role of the state. The structural adjustment programmes of the 1980s forced African countries to reassess state intervention in the provision of public goods, and privatise the sectors for 'private goods and services'. These tendencies also surfaced in the new mining codes that were introduced, like for example in Ghana (Akabzaa, 2009). While these reforms were very successful in moving towards economic liberalisation, Campbell (2004: 14) argued that "their very conceptualisation, notably the manner in which they redefined the role of the state, made them inadequate to addressing liberalisation's well-known side-effects, including de-industrialisation, unemployment, increasing social inequalities, and environmental degradation." In the mining sector, the reforms of the 1980s did not bring along the development that was hoped for, and 'weak governance' was identified as the key hindrance (Campbell, 2009: 3).

In its 1992 publication 'Strategy for African mining' the World Bank once again stressed that mining activity could provide "important benefits in terms of exports, foreign exchange earnings and tax receipts to support economic recovery in Africa" (World Bank, 1992: x). In order to realise its full potential, the respective governments needed to introduce regulatory and legal reforms aimed at attracting foreign capital. The main message of the report can be summarised as follows (idem: 9-10):

"Mineral development requires governments to focus on the regulation and promotion of the industry and [...] private companies [to] take the lead in operating, managing and owning mineral enterprises. But [...] there are few countries where the domestic private sector is strong enough to take the lead. The future development of the mining sector in Africa will largely depend on attracting new high risk capital from foreign mining companies [...] who have the technical and managerial capabilities to find new deposits and develop new mining operations".

In order to attract these investors a favourable investment climate needed to be created and guaranteed by the government. In practice, this meant establishing a stable legal and fiscal framework, including a mining code, contractual stability, a guaranteed fiscal regime, profit repatriation and access to foreign exchange, and a limitation of political risk. The role of the state became that of a 'regulator' and 'promoter', whereas the private sector was the 'owner' and 'operator' (Campbell, 2004: 20). The report devoted only three pages to artisanal mining, which it acknowledged as being 'important' and recommended to regulate and stimulate in order to produce growth, two key issues being the legal right to mine and satisfactory marketing arrangements (World Bank, 1992: 44).

In the mid-1990s, many African countries rewrote their mining and investment codes along these lines of privatisation and liberalisation (the 'second generation of mining codes': Campbell, 2009; Bebbington et al, 2008: 889). A 'third generation' of mining codes was drafted in the late 1990s, with more consideration for social, environmental and human rights issues, but the main goal of attracting foreign investment was not abandoned. Campbell (2004: 81) demonstrated that all these reforms put a lot of emphasis on technical issues, neglecting the more substantive issues relating to "the determination of to what end, under whose control, and for whose benefit extractive industries operate." According to her this illustrated how the World Bank, which claimed to work towards poverty reduction and sustainable development, was often "caught between contradictory and sometimes incompatible logics" of promoting investment and growth on the one hand and broader social and economic development on the other hand.

Indeed, in 2000 international protests about the negative impact of the World Bank's support to extractive projects provoked an evaluation, the Extractive Industries Review. The Review's final report emphasised the following recommendations: pro-poor policies, social and environmental policies, consideration for human rights and indigenous peoples, transparency and institutional and procedural change. The Review forced the Bank to engage with some of these issues, although the environmental and social policies remained quite underdeveloped (World Bank, 2004). The 'protection' of indigenous peoples was to be guaranteed, for example, but regarding the compensation of landowners no prescriptive guidelines were established.

The mining industry itself also tried to respond to the increasingly negative image of their impact on human rights and environment. In 1998 nine of the largest mining corporation launched the Mining, Minerals and Sustainable Development project (MMSD). They commissioned the International Institute for Environment and Development (IIED) to study the major societal challenges mining companies faced, and to come up with ideas about their potential contribution to sustainable development (IIED, 2002). In the face of weakened state capacity, Corporate Social Responsibility (CSR) has been heralded as the way in which negative environmental, social and human right effects can be mitigated. For companies it may provide a 'social license to operate'. CSR can be defined as "a framework for formulating and implementing the expanded roles and responsibilities of the corporate sector to include incorporation of the expectations and needs of a wider community in the business model" (Campbell, 2012: 139). It attributes state-like responsibilities to private enterprises, but its actions are voluntary and take place over and above compliance with minimal legal requirements. Especially since the mid-1990s a vast 'institutional infrastructure for CSR'

(Waddock, 2008) or a 'transnational legal system' (Szablowski, 2007) has emerged with a multitude of codes of conduct, standards and principles initiated by companies, civil society organisations and multilateral organisations. Again, the critique has been formulated that the technical CSR interventions fail to take into account deeper, structural problems (Campbell, 2012: 141) and that they assume that companies can start 'from scratch', thereby ignoring political realities (Luning, 2011). Besides it may be naïve to think that companies can, will and must fill in governance gaps (Hilson, 2012). Moreover, in the absence of real sanctioning mechanisms, the codes are often vaguely formulated and even minimalist requirements are often simply ignored by companies (Utting, 2008: 964).

In sum, most reforms in the mining sector have been aimed at attracting foreign private capital to the industrial sector, since large-scale mining is considered to be the main engine of growth and development. In this process, two broad domains have been persistently neglected: socioeconomic and community development and environmental protection on the one hand, and artisanal mining on the other. In the next section I sketch out the dynamics of artisanal mining and demonstrate how this sector may be linked to (under)development.

1.2. ARTISANAL MINING AND DEVELOPMENT: A DESPERATE CASE?

Reliable figures on production and employment in ASM are rare. In most overview publications, the rather outdated and conservative estimates of ILO (1999: 3 and 6) have been repeated: ASM accounts for 15 to 20 percent of global mineral production, and at least 13 million people worldwide directly depend on these activities for their livelihoods, with another 80 to 100 million people whose livelihoods are indirectly affected (IIED, 2002: 316; Hentschel et al, 2003: 10 and 12). Although this workforce may not be massive in light of the global workforce – a sector like agriculture for example is much more important in developing countries – it can for example be compared to the number of people in large-scale mining. Large-scale mining employment in developing countries totals about two million (Tibbett, 2009: 12). These figures seem to suggest that the importance of ASM in terms of employment and production can hardly be overestimated. Yet the opinions on how exactly to assess this 'importance' have shifted over time.

In the 1970s and 1980s ASM was considered in policy circles as a "fertile ground for the growth of indigenous entrepreneurship", as Noetstaller (1987: 16) noted in a report for the World Bank. This report underscored the potential for development of small-scale production units and called for improved productivity and efficiency by removing some barriers "which prevent or retard their spontaneous development and self-reliant growth" (idem: ix). The cover of the report was strikingly embellished with the drawing of a factory and dollar bills. Thus, the economic potential of the sector was acknowledged, but little attention was paid to the organisational dynamics or the types of actors involved (Hilson, 2009: 1). In the 1990s there was a change in discourse. The ASM sector had continued to grow, further stimulated by the disastrous effects of structural adjustment programmes and neoliberal policies in many developing countries, which interplayed with a number of internal government policies that often had disastrous effects on the formal economy. Some scholars have actually argued that the neoliberal reforms directly fed into the growth of the artisanal mining sector, as many people who were left unemployed as a result of privatisations in the mining and other key

industries, found employment in artisanal mining (Banchirigah, 2006: 167; Hilson and Potter, 2005). However, the economic crises that struck many African countries were the result of a complex interplay of external and internal, global and national factors (Marysse, 2005).

In the early 1990s more and more negative aspects of the ASM boom were highlighted, such as environmental (mercury pollution⁴, land degradation) and health and safety issues, social problems and issues related to women and child labour. A roundtable on ASM organised by the World Bank in 1995 was the first to explicitly underscore the poverty-driven character of these artisanal mining activities. At the same time it suggested to move away from the conception of a subsistence industry and again called for a "jump [...] to an economically viable small-scale enterprise" (Barry, 1996: 3). In other words, the report again called upon the entrepreneurial potential and recommended a move towards small-scale or semi-industrial mining. The main problem and, consequently, the clue to a solution for all associated problems, was, according to the report, the 'informality' or 'illegality' of most ASM activities. It was argued that "no real solutions are possible unless artisanal miners are given full legal and transferable mining titles to their claims" (idem: 2). In the aftermath of this report, many authors, governments and donors came to the consensual conclusion that in order for ASM to realise its full potential and contribute to development, these activities needed to be 'formalised'⁵. In 2001 the World Bank created a Consultative Group for Communities and Artisanal and Small-Scale Mining (CASM), which would develop policy guidelines and implement projects in the ASM sector. Yet attracting funding proved to be difficult and the project died out because of a lack of attention by donors and governments. At the same time some academic researchers decided to look deeper into the social and economic dynamics around artisanal mining.

Since the early 2000s, the academic literature has thus provided us with a vivid image of socioeconomic realities in artisanal mining. A lot of attention has thereby been paid to individual livelihoods, prompted by the question why people engage in ASM activities. In this respect, researchers have highlighted a number of 'push' and 'pull' factors (Hilson, 2009: 3). The 'demand-pull' view claims that people choose to go into mining in order to generate higher economic returns. This view is informed by accounts of 'rushes' and fortune-seekers and draws attention to possibilities for accumulation and investment (Bush, 2009; Grätz, 2009; Tschakert, 2009) and rational risk/reward calculations (Jønsson and Bryceson, 2009). In Tanzania for example, research has confirmed that incomes from small-scale mining are significantly higher than farmer incomes (Bryceson and Jønsson, 2009: 7) and that working in mining or related services reduces the likeliness of a household to be in poverty (Fisher et al, 2009: 34). The 'distress-push' view argues that people engage in artisanal mining because they are desperate to escape poverty (Heemskerk, 2003; Grätz, 2009; Tschakert, 2009). But this observation seems to be too blunt, since it hardly explains the dynamics of why people shift their livelihood strategies. In some regions ASM emerged as the only viable activity in the wake of structural adjustment, deteriorating employment opportunities and increasing pressure on land. Smallholder farming has become less attractive as a livelihood, and artisanal mining may

⁴ In mercury amalgamation, mercury is applied to a gold-aggregated sediment, resulting in a pasty amalgam, which is then burnt. Mercury is toxic and harmful to human health, plants and aquatic life (Hilson, 2002c: 869; Kitula, 2006). Annually an estimated 1000 tons of mercury are discharged into the ecosystem of developing countries (Spiegel and Veiga, 2005: 362).

⁵ See section 1.4.

substitute for revenues from agriculture, but may also complement them (Andrew, 2003; Hilson, 2010a and $2011)^6$. In the latter case people still subsist from farming, but branch out into mining in order to survive and diversify their income portfolios. Mining may also be a seasonal activity in this instance (Banchirigah, 2008; Banchirigah and Hilson, 2010; Maconachie and Binns, 2007). Indeed, artisanal mining allows people to move in and out of the activity quite flexibly. In some contexts, mining has been considered as a livelihood people turn to because of conflict and insecurity. During wars people are often forced to leave the countryside, and hence their fields, in order to settle either in refugee camps or in more urbanised areas. Farming becomes almost excluded as a livelihood option and artisanal mining may appear as a viable alternative, certainly if entire 'war economies' have been built up around these activities. Typical cases are Sierra Leone (Richards, 1996 and 2005; Zack-Williams, 1999), Liberia (Prkic, 2005) and the eastern Democratic Republic of Congo (Vlassenroot and Raeymaekers, 2004; Jackson, 2002 and 2003), where many, especially young people were displaced from their villages and found employment in artisanal mining. Jackson (2003) in this context spoke about war as a 'transformative economic process', as the on-going violence provoked a shift in livelihoods. This connection with armed conflict and insecurity has also gained prominence in many NGO reports on 'conflict minerals', which concentrate on negative human rights and security impacts. In other regions, artisanal mining has become a permanent segment of the rural economy; a "deeply-rooted industry [...] which offers a range of economic opportunities for people from all walks of life" (Hilson, 2009: 3; see Banchirgah and Hilson, 2010; Bush, 2009; Hilson, 2010a). Indeed, mining not only provides livelihoods for the miners themselves, but also for a range of actors working in related services like transport, catering, leisure, prostitution, tool making, petty trade and so on. This way mining boosts local and rural economies and generates a big economic and social return (Bush, 2009: 61). It is interesting to note, however, that very little in-depth research has been done on these groups of people. Although our knowledge about the socio-economic characteristics of the group of artisanal miners has considerably grown in recent years, the groups of petty traders, cooks or prostitutes in the mining sites are less well known. There is also little research about the mineral traders, who constitute a very heterogeneous group, as will become clear in this dissertation

Following up on the question as to what motivates miners to enter the sector, an inquiry into their reasons to stay or exit is also revealing. Whereas many authors consider miners as 'income diversifiers', for whom mining is in principle a temporary activity, there is also evidence of miners who do not plan to exit the job. Bryceson and Jønsson (2009) for example have exemplified 'career miners' based on their length of occupational engagement, their level of concentration on mining activities and their mobility between mining sites. The authors argue that career paths in ASM emerge from the miners' own organisational constructs and individual decision making which guides them towards labor specialisation. Other authors have identified some barriers impeding an exit from the sector. A first is the lack or low credibility of alternative livelihood opportunities such as agriculture (Banchirigah and Hilson, 2010; Perks, 2011; Tschakert, 2009). For a few years donors, governments and mining companies have promoted and initiated alternative livelihood programmes. In Ghana for example, government-sponsored programmes for fishing, livestock and poultry farming, cassava, cocoa,

⁶ The *Journal of International Development* published a special issue on the linkages between subsistence farming and artisanal mining in 2011 (vol.23 issue 8).

oil palm, pineapple and mushroom cultivation, have turned out to be unpopular because they generate too little income and because the pressure on land is too high (Banchirigah and Hilson, 2010: 170). Second, mining activities have become structurally important for many local economies, as I have said, and they have profoundly altered local economic and power relationships (Perks, 2011). Third, and following up on the previous point, some mining sites have evolved into distinct 'social worlds' with their particular norms (Grätz, 2009), which render it difficult for miners to 'step out of it'. Fourth, the investments they made and debts they incurred make it difficult for miners to give everything up and leave (Banchirigah, 2008: 29; Banchirigah and Hilson, 2010; Perks, 2011: 1122). Some authors argue that they are 'trapped' in a vicious cycle of indebtedness (Hilson, 2009) which makes them vulnerable and dependent upon their financier and which provides a considerable barrier for exiting the sector⁷.

Beyond individual livelihoods, researchers have looked at the communities and local economies surrounding the mines, as indicated earlier. Recently Bryceson et al (2014) have also conceptualised the artisanal mining sector in 'a new era of mineralisation'. In their edited volume on Tanzania, the authors evidenced the emergence of a professionalised artisanal mining sector with low barriers to entry and particular power relations, a sector which has the intrinsic capacity to foster democratic tendencies at the local level with repercussions on the regional and national levels (idem: 185). They argued that mining allows (relatively) easy entry and requires (relatively) little starting capital. The mining camps evolve towards new multiethnic and cosmopolitan centers. Inside the pits there is no social differentiation as everyone is facing the same hardships, so this provides for relatively egalitarian norms. Collegial ties and professionalism are important, and skills, mobility, hard work, discipline, trustworthiness and cooperation are considered important professional qualities. My analysis in part three will fit in nicely with these arguments. However, this is an argument that has so far received little resonance in policy circles. The artisanal mining sector is considered unorganised, chaotic and indeed, 'informal', which means that it does not generate any significant revenues for the public treasury. Only if these activities were to be registered and taxed, so it is argued, would they provide some benefits and contribute to development (Hentschel et al, 2002: 52). Of course, this would mean that the artisanal mining and subsequent trade activities become part of the official, formalised economy. Before discussing the 'formalisation' process in more depth, I will first unfold the concept of 'informality'.

1.3. DEFINING A PROBLEM: THE DEBATE ON 'INFORMALITY' AND DEVELOPMENT

'Informality' basically refers to practices that are not regulated by the state. This section presents an overview of how the concept's interpretation has evolved over time. Although many researchers have proven its uselessness, or at least its redundance, activities, economic sectors and even people are still often framed in terms of their 'informality' and the 'formal/ informal' divide continues to inform policymaking. To be clear, when I use the concept in this dissertation, I aim to draw attention to its use in conventional development thinking and policies and I use inverted commas. I do not accept the normative interpretation of 'informal' as being unregulated, uncontrolled and somewhere inferior to the 'formal'. When there is a

⁷ See chapter eight.

need to highlight the difference between economic activities that are recorded, state regulated and hence 'formal' in the conventional sense of the term, and others that are not, I also use 'official' and 'unofficial' respectively since these terms have less of a normative connotation.

The notion of 'informality' emerged some decades ago to characterise economic activities taking place outside the regulatory framework of the state. In the 1970s Keith Hart was one of the first to draw attention to the unofficial income opportunities for city-dwellers in Accra. He described how people who were excluded from the formal wage economy or whose income was not sufficient searched for alternative job opportunities (Hart, 1973). The 'informal system' was thus considered as a residual or parallel form of socio-economic organisation. Following in his footsteps several authors have come up with original terms to denote similar activities: economy of affection; second economy; black economy; hidden economy; shadow economy; parallel economy (Hyden, 1983; MacGaffey, 1987; Thomas, 1988; Harding and Jenkins, 1989; Reno, 2000; Roitman, 2004). The more research was done, the clearer it became that activities in this parallel, second or shadow universe were not unregulated, but adhered to their own set of norms, which differed from the norms of capitalist, market-driven economies.

In some of the literature of the 1990s the analytical focus for studying forms of economic organisation in Africa thus shifted from 'informality' to 'social networks', or to "the organisational role of social ties that shape economic behaviour outside the state through embedded relations of solidarity and trust" (Meagher, 2010: 11). The specificities of African economies were articulated in terms of personal relations and networks that are central to social and economic life in the absence of efficient economic markets or in weak states (Hart, 1988: 191). In these systems, economic activities are always 'embedded' in social structure (Granovetter, 1985)⁸ and personal relations ('weak ties'⁹, kinship relations and dense solidarity networks) generate the trust that is necessary for economic exchange (Granovetter, 1993; Barber, 1995; Platteau, 2000; Greif, 2006). Trust may then be considered a response to the risk that is inherent to transactions concluded over a period of time (Coleman, 1990: 91). Whereas in capitalist market economies this risk should be mitigated by third-party enforcement (the state typically taking up this role) and various institutions such as the use of formal contracts (Bates, 2001), this is not the case in the African economies under discussion. The latter are characterised by repeated, personalised exchange, a common set of values among parties and a lack of third-party enforcement. In these cases, transaction costs are low, while transformation costs are high (North, 1990: 34). Trust is generated through repeated interaction; hence the importance of information and the effectiveness of the 'reputation mechanism', through which actors can be ostracised if they are not trustworthy (see Hart, 1988). Hyden (1983: 10) called this system the "economy of affection", which in his view

⁸ The concept of 'embeddedness' has been introduced by Karl Polanyi arguing that economic activities in nonmarket societies are embedded in kinship, social relations, religion and politics. Mark Granovetter (1985) extended this argument to market societies and argued that economic action is always embedded in systems of social relations. Yet his analysis provides for a less deterministic account and the interaction of structure and agency.

⁹ Granovetter (1973) in his article on "The strength of weak ties" diferentiated between strong ties, close friends and family, and weak ties, acquaintances. He argued that the latter are more likely to make the 'bridge' between different social networks, and are therefore more strategic in the circulation of information, ideas and innovation. They are thus crucial in a person's mobility, access to the job market and so on. Subsequent studies inspired by these ideas have argued that poor and insecure people rely more on strong ties than do others (Granovetter, 1983: 212).

extends beyond the 'informal economy'. He also argued that the 'peasant mode of production' which nourishes the 'economy of affection' creates opportunities for rural and subsistence production to escape the demands of capitalism and the market economy (idem: 8). As such, these unofficial economic activities and the "networks of support, communication and interaction" (idem) that surround them were praised as an 'exit option'. It was an alternative to wage labour, to which capitalism condemns producers, but which was not available in Africa due to the failures of the market (MacGaffey, 1987: 25; Roitman, 1990: 678). This body of literature thus argued that African entrepreneurial and trade networks constitute an important social capital and development potential and may be efficient promoters of economic development (Hansen and Vaa, 2004; MacGaffey, 1991; MacGaffey and Bazengouissa-Ganga 2000). This stood in contrast to the view propagated by for example Douglass North (1990: 67), who considered 'informal networks' to be second-best solutions in situations of market failure. North argued that despite the mere fact that these networks function, they come at high costs (for example because of the lack of formal property rights), are inefficient and tend to perpetuate underdevelopment.

In an explicitly political sense, the 'informal system' was considered as a viable alternative, a means to 'disengage' from the state in contexts where the latter is weak or fails to perform its basic Weberian functions (Newbury, C., 1986; Azarya and Chazan, 1987¹⁰). This relates to Bayart's concept of 'flight', a formality of action which "turns the state into a political space which is both relative and highly contested, with whole regions or population groups escaping the control of the central authorities without subverting or even destabilizing the central power" (Bayart, 2000: 260). According to Bayart, this does not embody marginalisation; on the contrary, it is a form of (re)insertion in the global world through disengagement from the state. For Catherine Newbury (1986) disengagement as a notion was still too mild. Her analysis of survival strategies in rural Zaire conceived these strategies as "more direct forms of resistance or confrontation, rather than simply disengagement from the state" (idem: 100). People in Zaire, she argued, are not only confronted with what the state fails to do, but also with various extortions from the side of state agents, which prompt them to actively reject state authority and react by engaging in petty trade, substituting export crops by food crops for the local market, brewing alcohol, participating in sects and churches, using witchcraft, and smuggling coffee, gold or diamonds. In her influential work on the 'real' economy of former Zaïre, Janet MacGaffey (1991: 39) argued that engaging in the second economy was not a mere economic survival strategy, but also a means to 'fend for yourself' and compensate for the inability of the state to provide services, infrastructure and protection. In 'Entrepreneurs and parasites' (1987) MacGaffey even described the rise of an indigenous entrepreneurial and capitalist class that, by engaging in capital accumulation through unofficial activities and smuggling, stood up against a political class of 'parasites' in Zaïre. These authors thus analysed unofficial activities and networks as a source of agency, implicitly or explicitly referring to Scott's (1985, 1995) notions of 'weapons of the weak' and 'infrapolitics'.

But 'informal economic activities' became so pervasive and interwoven with formal activities that the distinction became blurred. For Roitman (1990: 685) for example, "the formal and the informal constitute an entire system of production" and so there was no duality to be

¹⁰ Azarya and Chazan (1987) identified four mechanisms to disengage: suffer-manage, escape, parallel systems and self-disclosure.

explained. This is what MacGaffey (1991: 10) called the 'real economy', which involves all economic activity and transactions, 'recorded or unrecorded', 'official or unofficial', 'formal or informal'. Roitman (1990: 691) went a step further in advancing a truly political analysis of the so-called 'informal realm'. She argued that analyses of power, domination, and access to and control over resources were overseen in the dualisation of 'state' versus 'society' and 'formal' versus 'informal': "one can hardly disengage from something without engaging in something else - this involves the cultivation of relationships to access resources, and hence confrontation with bases of power and authority which control these assets" (idem). In other words, seeing the 'informal system' as a site of survival and resistance, a 'weapon of the weak' (Scott, 1985), risks erroneously idealising the situation and closes our eyes to inequality and power relations. This point has been increasingly made in some of the subsequent literature, for example by MacGaffey (1992: 255-257) who argued that the rich and powerful have more opportunities to make profits in the second economy, exactly because of their contacts with political powerholders, and by Meagher (2010: 172) who said that 'informal' networks are vulnerable to being hijacked by elite interests. In this sense, the 'informal sector' may not be "primarily a site of survival for marginalised sections of society, but is rather used by political elites for personal profit, leading to increased corruption and conflict" (Titeca, 2012: 48). For these authors, it is a 'weapon of the strong' (idem), more particularly for political elites, economic elites and military leaders.

This observation countered the 'disengagement' notion since the actors involved in the 'informal economy' are thus not 'divorced from' the state at all. They explicitly engage with the state. And in turn, the state (state agents) engages with them: "in this context, informality exists because of formality: those in charge of the formal rules and control use their position to manipulate these rules for private gain" (Titeca, 2012: 49). This is what Chabal and Daloz (1999) called the 'instrumentalisation of disorder'. In agreement with this view, the literature on the 'criminalisation of the state' placed a strong emphasis on the criminal and predatory nature of 'informal networks' and the involvement of state agents in illegal economic activities (Bayart et al, 1997; Bayart, 2000; Chabal and Daloz, 1999; Reno, 2000; Roitman, 2004). Through this involvement, "political elites are not only able to enrich themselves, they are also able to further strengthen their dominant position" (Titeca, 2012: 49). A more extreme formulation of the 'criminalisation' idea can be found in the literature on 'war economies' (Collier, 2000; Le Billon, 2001). According to David Keen (1998), quite some conflicts persist because the actors participating in it have no interest in ending the war. It generates wealth, power and prestige. For them, the continuation of war is economically beneficial and rational. In such a context, specific economic systems come into place. They are labeled as 'war economies', being "(...) parasitic, because they are dominated by rent-seeking and the extraction and trade of primary products, rather than by value-adding economic activities; they are illicit, insofar as they depend heavily on black and grey markets that operate outside and at the expense of legal and formal economic activity of the state; and they are predatorythat is, they are based on the deliberate and systematic use of violence to acquire assets, control trade and exploit labor. They are also highly dependent on "external financial and commodity networks that provide access to the globalized marketplace" (Ballentine and Sherman, 2003: 3).

Most studies on mineral resources' exploitation and trade in eastern DRC have been in line with this stance in the literature. While Janet MacGaffey (1991) was still able to explain artisanal exploitation of mineral resources and smuggling as a viable exit- and accumulation strategy, the literature since the late 1990s has almost exclusively focused on conflict, state failure, armed groups, plunder and criminal networks¹¹. The stage is set by Bayart (et al, 1997: 114) who stated that "Africa is inserted in the international system through economies of extraction or predation". This is most visible in the extraction and trade in raw mineral resources, hence labelled as 'conflict resources'.

In the more recent literature, however, attention has been paid to the (potentially) transformative, rather than the destructive character of war and violence, and the potential of 'alternative modes of governance' outside of the conventional state structures. The authors described cases of "governance without government" (Doornbos, 2002; Menkhaus, 2007), which extended to economic organisation and service delivery, but also to other functions that ought to be taken up by the state, such as security provision. Menkhaus (2007) and Helander (2005) argued for example that in certain regions in Somalia local non-state orders provided a degree of order and public services to the population. Contributions on among others South Sudan, Ethiopia, DRC and Kenya in Raeymaekers et al (2008: 8) also demonstrated the "high level of creativity and mobility on the part of African populations to cope with the problems of weak government and political violence, especially in zones of so-called 'limited' statehood". In line with the aforementioned views on disengagement, these authors considered networks not only as "informal mechanisms for generating livelihoods or filling gaps in the formal economy, but as a revolutionary alternative to market-based economic organization" (Meagher, 2005: 220). This stance has been criticised by Kate Meagher in a 2012 article on non-state security forces and hybrid governance in Africa, in which she observed a shift from 'Weberian' to 'Tillyan' models of state formation. The latter conceptualise state formation as organised crime and describe "more authentic processes of state formation from locally legitimate systems", not on the basis of ideal-types (idem: 1076). Methodologically, the Tillyan model favours more empirically grounded approaches to public authority (Olivier de Sardan, 2008). Meagher (2012: 1078) however, following the aforementioned critics of the disengagement view, has asked pertinent questions about power relations and outcomes in terms of well-being for the population. She highlighted that locally grounded approaches are not necessarily more legitimate and that these 'governance without government' approaches fail to clearly distinguish between legitimate and illegitimate local orders and obscure the role of powerful non-local actors.

This discussion puts the issue of 'legitimacy' on the table. As will be further discussed in section 3.3, something is legitimate if it is in accordance with the practices, norms and values of a particular group. My interpretation of the concept is thus subjective and grounded in empirical evidence (what actors actually believe or do), as opposed to being normative and prescriptive. Whether something is considered to be legitimate or not lies 'in the eyes of the beholder'. Activities that are technically 'illegal' may be very legitimate in the eyes of certain actors, because they better correspond to social norms and ideas about fairness and justice, or moral norms, which are shared among these actors. In this respect the concept of 'moral economy' has been applied to certain economic activities or sectors. The concept was introduced by

¹¹ See section 2.1.

Thompson (1971) in his work on food riots in 18th century England and was further refined in anthropological studies of peasant economies, such as Scott's *Moral economy of the peasant* (1976). It refers to a just, fair and *legitimate* economy that exists in close knit communities where interactions are based upon reciprocity and reputation, and in a more general sense captures the interplay between social and cultural norms and economic activity. Titeca and De Herdt (2010) for example have used the concept to describe the cross-border trade in northwestern Uganda, which is considered by the actors involved as a legitimate source of survival, contrary to more formalised and state-controlled forms of economic exchange.

Similarly, the notions of 'legality' and 'illegality' are contingent upon context, time and space. Actually the state decides, at a particular moment in time, what is in accordance with the law and what is not. As a consequence, the boundary between legal and illegal is susceptible to quite some political pressures (MacGaffey, 1992: 246-247). It closely reflects power relations, as Luning (2008) demonstrated for the case of the mining sector in Burkina Faso. The state may indeed define illegality in ways that serve the interests of the political and economic power holders, but it may not always put in place the necessary means to enforce or facilitate the right application of the law. In this sense the notion 'a-legal', as a system where it is not possible to act legally because the state either does not facilitate or does not enforce law application, put forward by Garrett and Mitchell (2009) when analysing DRC's mineral sector is more useful. Marysse (2005: 136) also problematised the labelling of Congo's mineral exports during the war as 'illegal' since the regime of Laurent Kabila was highly contested and not 'legitimate' in the eyes of many.

In this dissertation the ambiguity of the concepts 'formal/informal', 'legal/illegal (or criminal)' and 'legitimate/illegitimate' is fully acknowledged. The empirical material will evidence that in artisanal gold mining and the gold trade barely any activities are 'formal' or 'legal' in the sense of recorded and regulated by state law. If there is no such thing as a 'formal sector' or a 'formal state' with a functioning rule of law, effective bureaucracy and institutional checks and balances, it makes little sense to talk about an 'informal sector'. Even less, then, can individual actors be said to be 'formal' or 'informal', 'legal' or 'illegal'. In order to resolve this tension, I will construct a new conceptual framework which facilitates empirically grounded analysis in chapter three. Still, artisanal mining and mineral trade in the DRC have continued to be framed in terms of their 'criminality', 'illegality', 'informality' and 'illegitimacy', resulting in policies that aim to promote a 'shift from illegality towards legality, and from informality towards formality'. In order to analyse this shift, we again need to take a look at some arguments in development thinking. The next section therefore critically analyses the concept and process of formalisation.

1.4. DESIGNING THE SOLUTION: FORMALISATION AS A PANACEA

The solution to the underdevelopment problem, so it is defended, lies in the embodiment of artisanal mining and trade activities in a standardised legal framework that is registered in and governed by a central state system (Siegel and Veiga, 2009: 51). This requires formalisation, which is often defined as the process of registering and organising unregulated mining and

trading activities¹². The basic condition for formalisation is 'property' or the fact that "artisanal miners are given full legal and transferable mining titles to their claims" (Barry, 1996: 2). This whole consensus is based on the formalisation canon, for which I first explain the theoretical assumptions, before summarising some critiques that have been raised in the literature. In chapter eleven I will take this critical analysis further and apply it to the case of the mining sector in South Kivu.

The importance of property rights as exclusive, transferable and legal rights to use, exchange and change resources has been recognised by New Institutional Economists like Demsetz (1967), Alchian and Demsetz (1973) and North (1990). For North (1990: 3) property rights were "the rights individuals appropriate over their own labour and services they possess. Appropriation is a function of legal rules, organizational forms, enforcement, and norms of behavior – that is, the institutional framework". They were considered to be important since they help to reduce transaction costs by providing a system of protection and enforcement, preferably by a third party. The authors distinguished between private property rights, assigned to an individual, and common property rights, assigned either to the community or to the state. Analysing the establishment of private property rights in the gold mines of the USA and Australia in the mid-19th century, authors such as Umbeck (1977), Libecap (1986; 2007) and La Croix (1992) argued that as the value of the resources and the number of miners increased, and technologies changed, it became more efficient to establish private property rights over the mining sites. Umbeck (1977: 215-216) described this as a natural process: as resources grew scarcer and their value rose, competition increased and miners began to feel the need to form explicit contacts for exclusive property rights. This argument conformed to the 'evolutionary theory of land rights', which says that as the scarcity of a resource increases, a point will be reached where the gains from its privatisation exceed the costs, so privatisation will be desirable on efficiency grounds (North 1990: 51 and McDowell, 2002 and Platteau, 2000 for a critique). The property rights in the Californian gold fields needed to be protected and enforced, which first happened through miners' meetings and the establishment of mining codes, and later through the adoption of these codes in state law.

Property economists such as Steiger (2006) and De Soto (2000, 2002) articulated the link between property and economic development very explicitly. The basic condition for economic growth, so it was argued, is to guarantee full property rights, which are transferable and protected by state law. Formal titles would create incentives for investments and development of a resource, they allow access to credit and can be transformed into standardised instruments of exchange and capital. In this way people will be included in the market economy. Eventually, so the argument went, formal titles will increase total wealth and economic growth. Yet in contrast to what the 'evolutionary theory of land rights' said, these economists argued that formal property rights will not emerge naturally. They must be created through legal reforms. In other words, the existing 'informal' titles must be transformed into full formal titles by an externally-induced and legal process of 'formalisation'. This discourse has proved to be extremely prominent in policy circles (Gilbert, 2002: 1). In his influential work, Hernando De Soto identified a clash between what he calls the 'legal economy' and the 'informal', 'extralegal economy', consisting of a bundle of customary rights and 'possessory relationships'. The poor, operating in the 'informal economy' and lacking formal titles, cannot

¹² Based on definition in Siegel and Veiga (2009: 52); Maconachie and Hilson (2011: 294).

transform their assets into collateral and credit, hence their assets are tied up in 'dead capital' (Siegel and Veiga, 2009: 52). What the poor need, so he argued, are secure titles, safeguarded and enforced by the state's legislative framework. For De Soto, formalisation is the key to development, a necessary and sufficient condition for fostering economic growth and productivity for the whole society (De Soto, 2002: 355). These theories have thus relied on the 'efficiency' argument to justify the need for, or to explain the natural evolution towards, formalisation and privatisation of property rights. Yet the efficiency argument itself has been questioned in two main ways.

First, although there are cases in which titling has stimulated investment and growth, this does not seem to be the case everywhere, and the positive relationship is not automatic. Bromley (2008: 23) for example found no general confirmation for a positive relationship between formal tenure security and agricultural investment in Sub-Saharan Africa. Issues that seemed more important to him for stimulating investment were the behaviour of agricultural credit markets and the availability of employment. Second, many case-studies have demonstrated that, in practice, the costs of formalisation policies in ASM have often outweighed the benefits (Banchirigah, 2006 and 2008; Clausen et al, 2011; Hilson and Potter, 2003 and 2005; Lahiri-Dutt, 2004; Siegel and Veiga, 2009). From the perspective of the government, the costs for implementing and monitoring formalisation may rise high, while the benefits can be primarily estimated on the basis of lost tax revenues. For miners and traders, the costs of formalisation are generally high: apart from their limited education and legal knowledge, they also face ineffective policies and bureaucratic inefficiency, a lot of paperwork, long waiting periods and traveling distances for obtaining licenses, high costs for obtaining all kinds of official documents, bribes, limited availability of land on which they can legally work and concerns about ensuing high investment costs in a formal exploitation project. As such, they may have few incentives to join a formalised sector. The same is true incidentally for individual state agents. Many of them personally benefit from all kinds of unofficial taxes and bribes, so is it not clear whether there always is a political will to step into such a formalised framework.

Of course, many of the aforementioned constraints result from weak or inefficient implementation capacities of state services. In such contexts, where the state lacks the necessary capacity to regulate, govern and sanction laws and property rights, where there are few supportive institutional structures and where market linkages are imperfect, there are serious doubts about the desirability, the effectiveness and the impact of integrating people in a formalised framework (Fisher, 2007: 737). Here artisanal mining is rather associated with poverty, mass employment, livelihoods and economic survival, which may matter more than efficiency and profitability (Maconachie and Hilson, 2011: 295). Artisanal mining and trade activities are also closely interwoven with the local economy, including webs of social, trade and power relations, as I will show further on in this dissertation. The socio-economic impact of formalisation policies may thus be far-reaching¹³.

The formalisation discourse assumes that everybody prefers strong property rights, whereas it has been argued that this is not always the case. People may not think of their so-called 'illegal' status as a problem, as long as they have 'perceived' tenure security (Gilbert, 2002: 8). For example, despite their lack of formal titles they may have customary titles, which are just

¹³ See chapter eleven.

as strong in their eyes, and even more legitimate. In 1979 Coldham, writing on land tenure reform in Kenya, already said that "customary controls will continue to be exercised" and that people will not adhere to the new system unless they understand what it is good for, and in many African regions this is still the case today. In the context of mining, the nature of mining activities itself also determines what kinds of property rights are preferred. The history of property rights in the Californian mines of the mid-19th century provides a good illustration. Clay and Wright (2005) showed that by introducing the claim system miners deliberately chose a system of restricted ('weak') property rights with numerous restrictions on claims and protection of the interests of both claim-holders and claim-jumpers. McDowell (2002: 23) attributed this to the specific nature of the gold mining activities, the fact that claim-holders never knew how much their claim would yield, and the resulting mobility of miners. Therefore, it was in everyone's interest to secure their claims, but at the same time facilitate the acquisition of a new claim. The miners feared monopolisation of the diggings and adhered to anti-capitalist and egalitarian norms, which led them to oppose strong private property rights (idem: 48).

Indeed, another argument that is often used in favour of formalisation is that it enhances human and physical security. Formal titles are supposed to protect miners' rights and give them voice in decision making processes. Yet empirical evidence has often shown the opposite (Hilson and Potter, 2005; Siegel and Veiga, 2009). In their article on land grabbing, Borras and Franco (2010) disputed the assumption that formal property rights would protect the poor against dispossession. They said that legal recognition of poor people's land rights "has never alone guaranteed that they will actually be respected and protected in the courts or on the ground" (idem: 517). On the contrary, they have often created opportunities for elite capture. Platteau (2000: 170) and De Schutter (2011: 268) demonstrated that formal titling risks reinforcing inequalities and Gilbert (2002: 16) evidenced that it often benefits the rich and middle class. They dispose of the capital, the knowledge and the connections to have their claims recognised, often at the expense of the poor (Fisher, 2007: 737). Meinzen-Dick and Mwangi (2008: 38) claimed that increasing security of rights for some means that others lose their rights. Fisher (2007: 747) argued that formalisation processes tend to "conceal social and power relations that make people's access to [...] resources highly unequal".

But many governments and policymakers do not ask these fundamental questions. They simply accept that formalisation is desirable and feasible and they define it in a purely procedural manner. Generally they distinguish two possible 'paths' to formalisation. The first possibility is to carry out a top-down enforced formalisation. For miners, this would mean a large-scale land titling programme. Such a programme would give all asset holders an immediate formal title to their assets, but risks being unequal in its outcomes, as richer or more powerful individuals will more likely have their titles officially recognised. It has been argued that massive titling programmes do not help the poor; on the contrary, the poor may face high unexpected costs, for example in the form of taxation or increased competition in the market (Gilbert, 2002: 7). According to Gilbert, massive titling programmes are popular among governments because they are cheap and even generate revenues for governments by levying new taxes. For traders, this would mean that they are forced to make their activities official. Yet this again raises questions about incentives, which are to a large extent related to state performance and control. If the costs of joining a formalised sector are higher than the benefits, and the state is

not able to enforce its own legislation, traders will have little or no incentives to do so. A second way to proceed towards formalisation is to build up a formal framework from the existing 'informal' rules (De Soto, 2002). De Soto (2002: 355) explained that there are many "extralegal property arrangements"; these need to be "woven into a single system from which general principles of law can be drawn". Yet it is not entirely clear how this would function in practice.

A strong critique of these kinds of procedures was formulated by Frances Cleaver (2001). She argued that

"the introduction of 'formal' modern institutions or organisational arrangements may not be the most effective strategy for dealing with conflicts over resource management, relying, as they do, on principles derived from abstracted and universalized 'design principles'. These may result in inadequate institutional solutions, as they fail to recognise the depth of social and cultural embeddedness of decision making and cooperative relations" (idem: 34).

In opposition to the view that institutions can be 'crafted' according to 'design principles' (Ostrom, 1990), Cleaver introduced the notion of 'institutional bricolage' or "a process by which people consciously and unconsciously draw on existing social and cultural arrangements to shape institutions in response to changing situations", resulting in a mix of so-called 'modern' and 'traditional', 'formal' and 'informal' institutions (Cleaver, 2001: 26). In part three of this dissertation some examples of such bricolage processes will be presented.

With respect to the artisanal mining sector, formalisation has been heralded as a panacea for all underdevelopment problems since the mid-1990s (Barry, 1996). Yet two decades down the road, many formalisation policies seem to have failed (Hilson, 2009: 3) because of the reasons mentioned above. Governments have often implemented them as top-down, bureaucratic licensing schemes, not taking into account concerns about efficiency, desirability, impact and effectiveness. In the next section I return to the initial question about mining and development.

1.5. ARTISANAL AND INDUSTRIAL MINING: PROCESSES OF DISPOSSESSION AND DEVELOPMENT

Observers have recently talked about a "new [resource] scramble for Africa" (Southall and Melber, 2009). For resource-poor countries and especially emerging economies, there is a growing need to secure future supplies in mineral and energy resources. As these resources are becoming increasingly scarce, it becomes more and more important to prospect for reserves and to gain and secure access to strategic resources in the future. Bebbington et al (2008) indeed showed how the national and local geographies of mineral extraction have undergone changes. The encroachment of mining companies on communities' territories is of course not new (just think about colonisation), but the geographies of investment, demand and ownership have shifted from developed to developing economies, and from western states to emerging economies, they argued. Global exploration budgets were at USD 12.1 billion in 2011, up from USD 8.4 billion in 2009, with gold and base metals comprising almost 85 percent of the total (PWC, 2011: 32). Sub-Saharan Africa accounted for 13 percent of worldwide exploration budgets in 2010 (Metals Economic Group, 2011: 4). According to Price

Waterhouse Coopers (PWC, 2011: 1), mining projects become "more complex and are typically in more remote, unfamiliar territory" (see also Szablowski, 2002: 247). Conflicts in these 'unfamiliar territories' arise around a number of issues. First, industrial mining often has negative and far-reaching social and environmental impacts. These may include environmental degradation and depletion of community resources, erosion and pollution, property damage and loss, health problems, disruption of the social fabric and of cultural and traditional values (Andrew, 2003: 118-119)¹⁴. Second, in and around these concessions access to land is highly disputed, as local communities and artisanal miners refer to 'traditional', 'ancestral' or 'customary' rights to claim their rights to the land, while large companies base their claims on official titles backed by state law (Aubynn 2009; Bourgouin, 2014; Bush 2009; Hilson 2002a; Mwaipopo, 2014; Nyame and Blocher, 2010). Third, local communities are often excluded from any decision-making processes related to industrial mining activities (Carstens and Hilson, 2009; Fisher, 2007). Chapter twelve discusses these issues in the case of a gold mining company that is operating in South Kivu. Still, this dissertation goes a step further in interpreting the relations between companies and communities (including artisanal miners) in a broader development context.

As section 1.1 demonstrated neoliberal policies introduced since the 1980s aimed at deregulation and private sector investment. This generated growth in some contexts, but redistribution was not guaranteed everywhere. Besides, large-scale mining continued to have devastating social and environmental consequences and cause displacement and livelihood losses for local and indigenous populations. Since the mid-1990s the companies themselves increasingly tried to respond to this negative image, resulting in a whole transnational legal system for CSR. Two important effects of these neoliberal policies can thus be distinguished. First, they caused a governance shift from states to private actors. As states were weakened, the responsibility for mitigating large-scale mining's negative effects was passed on to the mining companies themselves through CSR-like interventions. These companies are now involved in community development, social infrastructure and environmental mitigation, but also in security provision in and around their concessions (Hönke, 2013). Some authors have even argued that for governments this was a way to (re)gain privileged access to rents (Hibou, 1999). Second, neoliberal policies have led to new processes of 'accumulation by dispossession' (Harvey, 2005: 145), through the commodification and privatisation of natural resources and the displacement of populations (Bebbington et al, 2008; Bury, 2004; Bush, 2009; Gordon and Webber, 2008; Heynen and Robbins, 2005).

The same dynamics are at play in large-scale land acquisitions or 'land grabbing' for agriculture. In the wake of the 2008 World Development report on agriculture, an animated debate (re)emerged about what model to use for agricultural development (Deininger and Byerlee, 2011; De Schutter, 2011; Merlet and Bastiaensen, 2012). A first model is based on private investment and a capitalist mode of production (large-scale, mechanised and export-oriented) having a supposed positive effect on growth, but leading to massive displacement for small-scale farmers. A second model relies on small-scale, family-based agriculture with an emphasis on food safety and employment. A third and intermediate position advocates for the

¹⁴ There is a vast literature on social and environmental impacts of both industrial large-scale and artisanal mining for that matter, for example in journals like *Journal of Cleaner Production* and *Resources Policy*. While the social aspect will be addressed in this study, the environmental aspect will not be taken into account because I lack the capacity to assess this.

coexistence of both production modes, but insists that large scale land acquisitions may be good for the poor, provided they give adequate compensation, create employment and are implemented through partnerships between small and large scale production. The risk, however, with this latter scenario is that competition between large-scale and small-scale producers will be unequal because of the former's access to financial capital, technology, information and social relations.

Olivier De Schutter (2011) for example, one of the leading voices in the debate on agriculture and development, argued that the attempts to regulate 'land grabs' are misleading as they give the impression that such investments are desirable, if only certain conditions are met. He explicitly warned against "giving away farmland that is considered 'idle' to promote a type of farming that will have much less powerful poverty-reducing impacts" and "the risk of encouraging a commodification of land in the name of improving security of tenure, as well as a further dependence of agriculture-based countries on international markets in the name of local food security" (idem: 250). Typically, poor agriculture-based economies want to attract foreign investments and therefore give all kinds of advantages to investors, and these contracts are often negotiated in a vacuum. Similar arguments were advanced by Borras and Franco (2010) in their critical assessment of 'codes of conduct' for land grabbing. Land grabbing, they argued, is presented as an opportunity rather than a threat, based on a "certain vision of successful national capitalist economic development" according to which more investments lead to more farm and off-farm jobs, increase incomes, facilitate the transfer of new technologies, increase production of food crops, build infrastructures, open up export opportunities and improve access to basic services in rural areas (idem: 510). Vandergeest et al (2007: 23), in their analysis of development-induced displacement, pointed to the assumption running through many displacement projects, that "often vaguely defined benefits that accrue at larger scales (national, global) trump concrete losses experienced at smaller scales" and they ascribed this to the 'coercive character of neoliberalism'. These authors thus advocated for a repoliticisation of the debate on land grabbing, paying attention to the 'losers' and the 'winners' in such processes (see also Merlet and Bastiaensen, 2012: 8).

In order to understand this, several contemporary authors fall back on Marxist and Neomarxist concepts and arguments. Capitalist markets rest on their relationship with natural resources, which are given value through the application of technology and human labour. These markets expand by competition, which means that costs need to be reduced, and hence the productivity of labour must be increased. Productivity may be enhanced either by technological innovation, economies of scale and capital concentration (which increases productivity of labour per unit of capital but displaces labour), or by expanding the amount of work labour does for a given wage (which retains the labour force, increases productivity per unit of wage but deteriorates work conditions). In order for this process to take place, the state has to free labour for employment and to protect private property rights. As Harriss-White (2010: 3) said: "Private property rights make production possible under capitalism, [but] other kinds of rights have to be destroyed, and people excluded from access, so as to enforce private property". The concept of 'social exclusion', defined as "a process and a state that prevents individuals or groups from full participation in social, economic and political life and from asserting their rights", has been used by Fisher (2007: 738) to study marginalisation in artisanal mining in Tanzania. One of the dimensions of this social exclusion is the miners' limited access to and rights over mineral resources. This again relates to the 'accumulation by dispossession' concept, which was introduced by Harvey (2005) and goes back to Marx' concept of primitive accumulation.

But David Harvey actually described *new* processes of capital accumulation, characterised by dispossession: the commodification of nature in all forms, the depletion of environmental commons and the privatisation of public assets (idem: 149). Dispossession, he argued, is instrumental in solving the overaccumulation problem by releasing assets such as labour, land and natural resources at very low cost. These assets can then be used by capitalist investors to turn them to profitable use and accumulate more capital; whereas the "historical holders of land rights (e.g. family peasants, indigenous communities, pastoralists) [...] lose access and control over natural resources and are transformed in low-paid workers" (Merlet and Bastiaensen, 2012: 22). For Harvey (2005), just like for Marx, privatisation is "the cutting edge of accumulation by dispossession". Natural resources, for example, are public assets and should be held in trust by states for their population to use them: "to snatch these away and sell them as stock to private companies is a process of barbaric dispossession on a scale that has no parallel in history" (idem: 161). Wherever possible labour is substituted by capital and all goods, including natural resources, are commodified and marketised (Heynen and Robbins, 2005). This was also De Schutter's warning when he cited Karl Polanyi on the dangers of treating land, labour and money as mere commodities to be traded on the market (De Schutter, 2011: 274). Borras and Franco (2010: 516) concluded that "what we can expect from this kind of framing of land is more dispossession in the name of transforming 'marginal' land into economically productive spaces".

Yet it has been argued that small-scale farmers may be more productive than large-scalers. De Schutter (2011: 260) for example explained that small-scale producers substitute capital by labour and rely on labour- intensive techniques¹⁵. Their incomes remain low, but they make maximum use of the available land. Large-scale plantations, on the other hand, use machinery and invest a lot of capital, which enables them to produce larger volumes at relatively low costs. Although their productivity per hectare is generally lower, they have a higher productivity per labourer. De Schutter went on to say that "they are competitive, perhaps, but part of their success is attributable to the fact that the price of food does not reflect the social and environmental costs resulting from their operations, and particularly from the impacts on the soils and the climate of their modes of production. In contrast, small-scale farmers are much more resource efficient" (idem). He concluded by pointing to the risk that smallholders will be driven out because large-scale actors play upon their economies of scale, but also provided for some innovations in order to mitigate these risks, such as contracting schemes, cooperatives or a rental market for machinery.

To sum up, the development model being promoted is based on neoliberal capitalism, privatisation and commodification of natural resources and substitutes labour for capital. It is

¹⁵ Another argument in the literature, which has been used to explain why the 'green revolution' has worked in the case of Asia and not in Africa, is that Sub-Saharan Africa traditionally has a large land-to-labour ratio and has developed techniques for optimising the labour input, in contrast to South-East Asia, for example, where land is scarce and output per acre has been optimised. The argument of land abundance still holds for some regions in Africa, but not for all, see for example the work of Ansoms (2010) on Rwanda. Also in the mining sector, competition for the mineral deposits is high and so the argument about a large land-to-labour ratio does not seem to hold.

commonly acknowledged that industrial mining provides few jobs (Campbell, 2004: 28; Hilson and Potter, 2005; Labonne, 2002: 69; Nyame et al, 2009). In Ghana for example, direct employment in large-scale mining decreased from 22,500 in 1995 to 14,300 in 2002, despite impressive increases in foreign direct investments in the industry (Tibbett, 2009: 13). Moreover, the jobs that are created – especially in the production phase – are qualified and high-skilled jobs, which are more often carried out by expatriates than by local staff (idem). In contrast to this, artisanal mining will be conceptualised as a distinct production mode.

1.6. CONCLUSION

This dissertation started with a brief overview of the literature on mining and development. With respect to industrial large-scale mining, the negative link between mining and development is embodied in the 'resource curse', whereas the positive path is supposed to go through taxes and redistribution (if the state performs these functions), or through CSR-like activities (if private companies are involved). In the case of artisanal and small-scale mining, the trajectory towards development is believed to go via formalisation, which enhances security and efficiency. The main hindrance for artisanal mining activities to contribute to development, so it is argued, lies in their 'informality'. This assumption is still predominant in conventional policy discourses, despite the fact that many academic researchers have been critical vis-à-vis the 'informality' and 'formalisation' discourses. My empirical material in parts two and three also evidences that barely any activities in South Kivu's gold mining and trade are 'formal' or 'legal' in the sense of recorded and effectively regulated by state law. In such a context, it makes little sense to analyse activities in terms of their 'formality' or 'informality'. That is why in chapter three I will construct my own conceptual framework based on the concept of 'access'.

This chapter has also demonstrated that policymakers tend to favour industrial, large-scale mining because it potentially produces more revenues for governments and is easier to control. National and international policies therefore aim to attract foreign investment and give large areas in concession to (transnational) mining companies, thereby privatising land and dispossessing local people who do not have private property rights over the land. In this sense, a particular development model is promoted, one that relies on a neoliberal capitalist mode of production that embraces the privatisation and commodification of natural resources and substitutes labour for capital. This model bears similarities with earlier capitalist eras and industrialisation processes, but is, according to some authors, more destructive for the environment. As Heynen and Robbins (2005: 6) asserted,

"over the last few decades, there has been a notable and disturbing shift in the way that morethan-human nature has been conceived, controlled, distributed, managed and produced. Revolutions in law, policy, and markets are accelerating the ongoing commodification of natural things, laying bare the structurally driven and environmentally destructive tendencies of capitalism".

In contrast to this, artisanal mining offers ample opportunities for (flexible) employment and local livelihood support and is well-connected to the local economy and society. Moreover, research by Bryceson et al (2014) has evidenced that the artisanal mining sector is

characterised by relatively egalitarian norms. In their article on "mining and the possibilities for development" Bebbington et al (2008: 901) interpreted artisanal miners' resistance against companies in terms of struggles

"against development oriented towards economic growth, and for development as a process that fosters more inclusive (albeit smaller) economies, respects citizenship rights, demonstrates environmental integrity, and allows for the co-existence of cultures and localized forms of territorial governance".

This dissertation will exemplify some of these aspects in the case of the DRC¹⁶. The question, I think, is not which production mode is preferable, but which one is beneficial to whom, and under which circumstances. In this dissertation I adhere to the term 'artisanal' mining instead of 'small-scale mining' to describe the activities I have studied in South Kivu. This is first of all justified by the fact that most activities are indeed non-mechanised. Although the miners do use small portable water pumps and oxygen compressors to facilitate work in the underground shafts, they do not use any machinery to extract or process the material. Second, the Congolese legislation (Mining Code) differentiates between three production modes: industrial, small-scale ('petites mines') and artisanal, whereby small-scale mining requires an investment in machines for the extraction and processing of minerals, and the creation of small enterprises or cooperatives. The miners I study work in small teams that are not organised as cooperatives or formal enterprises. The miners themselves use the term 'artisanal' as well. Finally, artisanal mining will be conceptualised as a particular production mode. In this sense it is appropriate to use the term 'artisanal' because it refers to the way in which the work is done, rather than to the scale of it. I agree with Bryceson and Jønsson (2014: 6) that the term artisanal "affords more analytical insight by drawing attention to the workers' social interaction and their specialized performance of transformative processes on specified minerals using hand-held tools". In a similar way, 'industrial' is used as a term to characterise the capital intensive, labour extensive form of mining that relies on large-scale extraction, privatisation and neoliberal principles.

¹⁶ The environmental question for example falls beyond the scope of this dissertation.

CHAPTER 2. MINING AND DEVELOPMENT IN THE DRC AND SOUTH KIVU

"Tout en remontant la rivière, j'observe que chaque claim (concession) était marqué par des affiches clouées aux arbres et signés par les concessionnaires. Comment conquérir ce droit ? Nous l'apprîmes en arrivant au camp [...] Les mineurs réunis au camp de Mariposa, le 1er mars, avaient convenu de se donner des lois, car rien jusqu'alors n'était organisé" (p.103).

 "All along the river I observe that every claim is marked by a note nailed down to a Tree and signed by all concession holders. How to acquire this right?
 We would find out in the camp [...] On March 1 the miners in Mariposa agreed to create laws, as nothing had been organised yet until that time" (p.103).

Nowhere in the world has the contentious relationship between mining and development seemed to be as marked as in the DRC. The term 'geological scandal', which was originally (in 1892) used by Belgian geologist Jules Cornet to denote the enormous mineral wealth of Katanga (Cuvelier, 2011: 12), is now more commonly and repetitively used to refer to the 'scandalous' outcomes in terms of conflict and underdevelopment. Yet the links between mining and underdevelopment and between mining and conflict require some nuance, which I will provide in section 2.1. Section 2.2 gives an overview of the political economy of artisanal and industrial mining in the DRC and discusses legal and other initiatives to formalise the artisanal mining sector. Section 2.3 then discusses legal provisions and practices in the province of South Kivu.

2.1. MINING IN THE DRC: A CURSE?

For some authors the DRC currently serves as a textbook example of the resource curse, in the sense that mineral exploitation has impeded long-term economic development (Ross, 2003). It is frequently argued that the revenues generated by the country's mining sector have not contributed (enough) to national development, nor have they improved the livelihoods of the Congolese population (World Bank, 2008). According to World Bank estimates (2008: 27) the gap between officially recorded taxes and potential or expected fiscal receipts, based on hypothetical growth scenarios, was enormous: USD 26.7 million of recorded revenues against USD 185 million of potential revenues for 2008-2012 and USD 619 for 2013-2017. This gap was attributed to bad governance and weak institutional capacities. Countless publications also insisted on the adverse effects of the resource abundance on people's livelihoods, referring to the high incidence of poverty (Herderschee et al, 2012). This statement needs to be nuanced though, both in space and in time. As I will show below, the production and export of mineral resources have significantly contributed to economic growth and development during certain periods, and have done so in recent years as well (Marysse and Tshimanga, 2013). EITI (2012) reported that in 2010 the government's revenues for the top commodities amounted to USD 876 million in taxes, fees and royalties, or 5 percent of its GDP. This already surpasses the World Bank's most optimistic scenario in 2008. There are also considerable regional differences, with very particular dynamics in Katanga province (Marysse and Tshimanga, 2013; Cuvelier, 2011a and b), which are different from what is going on in the eastern part of the country, for example.

In the East (the provinces of North and South Kivu, Maniema and Province Orientale), mineral exploitation and trade became integrated in a 'war economy' during the 1990s, which obviously resulted in disastrous development outcomes. Numerous studies have argued that the hunger for mineral resources motivated both rebel groups and government forces to fight for the control over mines and strategic trade routes, and that the profits this generated enabled them to purchase arms and continue fighting¹⁷. The minerals coming from this region (coltan, cassiterite, gold) have thus been labeled as 'conflict minerals', not only during the war period, but until today, as will be illustrated in chapter eleven. However, the 'conflict minerals' stereotype only captures a minor part of realities in the eastern mines. Although mineral exploitation and trade was indeed an important dynamic of the conflict, this does not mean that it caused the conflict. Economic interests were inseparable from grievances and political interests at the national and the local level¹⁸. Séverine Autesserre (2012: 211) actually noted that only 8 percent of all Congolese conflicts are estimated to be over natural resources. The fact that the mere presence of mineral resources does not explain the violent conflict can also be illustrated by referring to the diamond mines in Kasai, for example. Diamonds are 'lootable' resources as well, but the Kasai province has not witnessed a war like in the East. For Katanga province the dynamics are again different, for this region actually became increasingly violent in 2013 (Johnson D., 2013: 6). Nevertheless, only minerals originating from the East are labelled as being conflict minerals. Second, minerals are not the only source of financing for armed groups. They also rely on taxation of citizens, revenues collected at roadblocks or trade in charcoal, timber and bananas (Seay, 2012: 18; Laudati, 2011). So cutting them off from this source of revenues is unlikely to stop the violence (Johnson D., 2013). Nevertheless this simplistic story on conflict minerals is appealing, especially to journalists and advocacy groups such as Global Witness and Enough Project. In reality, many mines in eastern DRC "have been peaceful for quite some time" (Perks and Vlassenroot, 2010: 64). The mapping exercise carried out by IPIS in collaboration with the Congolese mining administration surveyed approximately 800 sites in North and South Kivu and parts of Maniema, Katanga and Province Orientale (Spittaels and Hilgert, 2013: 8). The research team noted "the presence of" non-state armed groups in 200 and FARDC in 265 sites. The 2014 report by the UN Group of Experts still noted the presence of FARDC in Misisi (UN, 2014: par. 162) and Mukungwe (until September 2013; idem: par. 164) and non-state armed group "involvement" in Shabunda territory (idem: par. 168), a few mines in Fizi territory (idem: par. 169), in Province Orientale, southern Irumu territory (idem: par. 165) and in North Kivu, Walikale territory (idem: par. 166).

While these reports use terms such as 'presence', 'interference', 'involvement' and 'control', the concrete mechanism through which armed actors profit is taxation. This taxation is described as being "illegal" (IPIS, 2013: 8) since it is not provided for under the Mining Code. It is often "periodically collected" (idem), but actual amounts are hardly mentioned (IPIS, 2013; UN, 2014) so it is difficult to estimate what the *level of extortion* really is. Moreover, the *level*

¹⁷ See the different reports by the UN Group of Experts: http://www.un.org/sc/committees/1533/egroup.shtml; reports by national and international organisations such as Enough Project (Prendergast and Lezhnev, 2009); Global Witness (2004; 2005; 2009a and b); GRIP (Mercier, 2009; Renauld, 2005); Human Rights Watch (2005); INICA (Pourtier, 2004); Institute for Environmental Security (2008); International Alert (2009); IPIS (Custers et al, 2009; Danssaert and Johnson, 2005; Raeymaekers, 2002; Spittaels and Hilgert, 2008; 2010); Pole Institute (2002); Pole Institute and International Alert (2004); World Bank (Garrett, 2008) and academic studies by Garrett et al (2009), Jackson (2002 and 2003), Mantz (2008), Marysse (2005), Nest (2011), Nest et al (2006).

¹⁸ This has recently been argued by Lemarchand (2009) and Prunier (2009) and follows a broader argument put forward by Cramer (2002) and Ballentine and Sherman (2003) among others.

of violence involved remains obscure as well. The 'presence of' or 'taxation practices by' armed actors easily lead to a labeling of the production as 'conflict gold' or 'conflict coltan'. But this is based on a mere assumption of a causal relationship between taxation practices by individual actors and financing of war and violence. Such reasoning bluntly ignores the governance realities in the DRC, where 'illegal' taxation practices and coercion are part of day-to-day local governance carried out by state as well as non-state, and armed as well as non-armed actors. 'Coercion' is in fact the use of force to obtain compliance, and may involve varying degrees of violence. It does not necessarily mean that miners are working at gunpoint. In their article on governance in Bisie mine, Garrett et al (2009: 11) described the prevailing governance system as 'coercive governance' where the security provider has set up an "institutionalized taxation system" in exchange for protection. They added that the system was "a hybrid form of state and non-state nature". In Bisie mine, for example, the FARDC generated up to USD 350,000 per month. But other state agents like ('Direction Générale de Migration'), ANR ('Agence Nationale de Renseignements'), the police and the Health Department were involved in 'illegal taxation' at roadblocks too (Garrett et al, 2009). In other mines so-called 'big men', who may derive their power from a variety of domains (business, politics or customary power), control and tax the extractive activities (see Cuvelier, 2013 for the case of Nyabibwe in Kalehe). This dissertation provides more evidence for the involvement of different state and non-state agents in taxation and shows that these practices must not be equated with a narrow interpretation of 'conflict', 'criminality' or 'illegality'. They are instead part of a governance system that is not just functioning in gold mining and trade, but in all sectors of the Congolese economy and society and that is based on the privatisation of public resources (Bayart et al, 1997; Englebert, 2003; Titeca and De Herdt, 2011; Trefon, 2011)¹⁹.

2.2. MINING IN THE DRC: AN OVERVIEW OF THE POLITICAL ECONOMY

This section first of all aims to give a broad historical overview of the political economy of artisanal and industrial mining in the DRC (section 2.2.1). In part two some of these general dynamics will become more concrete, as they have shaped the specific local trajectories of the three selected mines. I will also discuss the Mining Code and the Mining Regulations, as they are the basic legal texts governing the official mining sector (section 2.2.2).

2.2.1. The political economy of industrial and artisanal mining

Since colonisation the mining sector has played an important role in Congo's political economy. Industrial exploitation of mineral resources started in the 1920s and rapidly expanded, thanks to the growing demand for primary commodities on the world market and the increasing interests of Belgian investors. Mining companies such as 'Union Minière du Haut-Katanga' (UMHK) in Katanga, 'Minière de Bakwanga' (Miba) in Kasai, 'Office des Mines d'Or de Kilo-Moto' (OKIMO) in Ituri and 'Minière des Grands Lacs' (MGL) in Kivu worked towards a capitalistic intensification of the production process and a 'stabilisation of manpower' (Bezy et al, 1981: 27). They governed their concessions as private domains, restricting access for outsiders and providing electricity and water, schooling, healthcare and recreational facilities to workers and their families (Hönke, 2010). Gradually, all aspects of the worker's life came to be controlled by the mining companies, which installed a paternalistic

¹⁹ See section 1.3. for some background literature.

system. This meant a crucial step in the colonial system and a significant change in the lives of many Congolese. They entered a 'modern' and 'capitalist' world of which, nevertheless, they could not become a full part (they could only aspire to become 'évolué', not even a full citizen) and which they had not internalized. As such, they were living in "a world of contradictions" (Marysse, 2005: 129).

In 1960 the Belgians granted political independence, but they retained economic power through control of key industrial mining operations. In Katanga they supported the secession movement in order to regain control over the important copper reserves. The supposed communist threat also caused Belgium, France and the US to put in place 'counterrevolutionary' strategies, eliminating politicians like Lumumba and supporting military regimes loyal to the West (Marysse, 2005: 130). The first years of multi-partyism in Congo were also characterised by intense struggles between political elites. Thus, external western interventions and internal power struggles combined to produce a period of instability from 1960–1965, ending in a coup d'état by Mobutu, who was supported by the western states. After his coming to power President Mobutu sought to centralise political and economic power. In an attempt to acquire more autonomy from the former coloniser, the Zairian state became increasingly involved in the productive sectors of the economy (Ndaywel è Nziem, 1998: 729; Bezy et al, 1981: 85-93). This resulted in the nationalisation of a number of sectors and companies, such as Union Minière which became Gécamines, a 100 percent state-owned corporation in 1967. The Bakajika law (1966) nationalised all land and mining rights. The period up to 1974 was characterised by economic growth (Bezy et al, 1981; Marysse, 2005: 130).

In 1973 Mobutu nationalised small and medium-sized wholesale and retail business, small factories and plantations owned by foreigners in the so-called 'Zairianisation' process (Gould, 1979: 98). The 1975 'radicalisation' enhanced the takeover of larger businesses (Gould, 1979; Ndaywel è Nziem, 1998: 729; Young and Turner, 1985). In the mining sector, Zairianisation measures mainly targeted the regime's 'cash cows' in the copper and cobalt sector and some large gold and diamond producers, for which management was handed over to the president's political allies. As such, 'Zairianisation' and 'radicalisation' were effective instruments in Mobutu's neo-patrimonial politics (Young, 2012: 24). His position heavily relied on patronage, appropriating state resources on a massive scale and distributing them through political networks in order to ensure loyalty. This way, the opposition could be divided by buying off individual politicians, co-opting them and stripping them of their power and assets if they risked becoming too powerful. The state thus became an instrument for self-enrichment. However, the use of state resources for feeding into clientelistic power networks diverted resources that were crucial for developing and maintaining the country's productive capacity. Public infrastructure was neglected, services like health and education were no longer provided, and the means of production came in the hands of incapable owners and managers. As a result, industrial production dwindled (Ndaywel è Nziem, 1998: 731-736). The only sector where industrial production levels were still increasing was copper (Katwala, 1979). Yet in 1975 copper prices fell dramatically on the world market. This had a heavy impact, not only on the copper sector, but on the entire Zairian economy, since the state was heavily reliant on copper exports for its foreign exchange earnings. In the mid-1970s about 70 percent of state revenues came from copper, more specifically from Gécamines, and copper accounted for 60 to 66 percent of total exports. Mineral production provided between 80 and 85 percent of total export value and 45 to 50 percent of tax revenues, but only an estimated 13 percent of the gross domestic product and 6 percent of the wage employment (Gran, 1979: 8). Formal employment over the period 1974-1990 varied between 5 and 9 percent of the active population (De Herdt and Marysse, 1996: 58). In response to this financial and economic crisis, many individual Zairians became involved in unofficial economic activities, building up entire production and trade networks outside the official state framework, among others in artisanal production and smuggling of minerals (MacGaffey, 1986 and 1991)²⁰.

One of the measures taken by Mobutu to counter the negative impact of Zairanisation was to alleviate the state's control of the exploitation of mineral resources, hence the law on the 'liberalisation of the exploitation and trade in precious minerals' (gold and diamonds) in 1982. These measures were presented as a way for Congolese nationals to benefit more from the enormous potential their country had. The new law allowed all Congolese citizens to possess and transport diamonds, gold and other precious stones. Besides, they could apply for mining and export licences. The law further specified that all exploiting actors and exporting companies had to be registered, so as to guarantee some control over the sector, and to redirect the trade through official circuits. It indeed provoked an influx of artisanal miners and traders to the mines and stimulated the creation of export offices or 'comptoirs', but in the end it did not help to 'formalise' artisanal mining and trade activities. Vwakyanakazi (1991: 63) noted that in 1983 and 1984 official gold production dropped by 39 percent because of smuggling. However, for diamonds official production increased, at least immediately after the introduction of the liberalisation measures. While in 1982, artisanal diamond production accounted for almost one million carats, in 1983, it had already increased to almost six million carats, and in 1986 to 14 million carats (Dietrich, 2002: 6). Tshibanza and Tshimanga (1985) therefore concluded that the liberalisation measures had a short-term positive effect on official export figures and state revenues. However, the authors already warned of an increase in smuggling and the presence of 'pirate-comptoirs', or illegal export offices, especially in the East. The latter were able to offer better prices and had better access to financial resources than the officially registered export offices. The eastern provinces came to be entirely oriented towards the neighbouring countries, especially Uganda, Burundi and Kenya, where minerals coming from Zaire were smuggled and exported to the world market by Lebanese, Indo-Pakistani and national traders. As MacGaffey (1991) has argued, this economic system was not only a survival strategy, but also a means to compensate for the inability of the state. To some people it offered opportunities for accumulation, creating a class of 'indigenous capitalists' (MacGaffey, 1987)²¹. As a result of the 'rush' on mineral resources, however, local agricultural production declined, which caused scarcity of food and high food prices on some local markets.

It was clear that in the 1980s Mobutu's policies had produced a structural economic and financial crisis. Despite liberalisation and stabilisation measures and a structural adjustment programme, Zaire's financial situation did not improve. Industrial mining production fell close to zero and the Zairian government was bound to privatise some mining companies. The copper giant Gécamines thus concluded a number of joint-venture agreements with private investors (Kennes, 2005: 162). In addition, foreign aid, which had supported Mobutu in power

²⁰ See section 1.3.

²¹ See section 1.3.

for decades, dwindled after the end of the Cold War. As domestic production had almost collapsed, there were no possibilities to generate more state revenues, and the president eventually used the money press to print "real false money" (Marysse, 2005: 132). This resulted in extreme hyperinflation and currency depreciation, by which the poorest segments of the populations were hit hardest (idem). De Herdt and Marysse (1996: 61) stated that the purchasing power of a public agent in 1990 was already 80 to 90 percent lower than in 1970, and hyperinflation still exacerbated this. Also for the military, this meant that their salaries were barely paid anymore. Mobutu thus encouraged them to remunerate themselves through imposing taxes, looting and engaging in trade. Also on the political level, Mobutu's position was being challenged after western pressures had forced him to embark on a process of democratisation and embrace multi-partyism. The president decided to exploit ethnic differences and thereby 'divide and rule' over potential political opponents (Vlassenroot and Raeymaekers, 2004). Especially in the eastern part, the already existing tensions around local power, control over resources and land, came to be wrapped in a discourse of ethnicity. All these processes contained the seeds of the eventual collapse of the Mobutu regime.

In 1997 it was overthrown by Kabila's AFDL ('Alliance des Forces Démocratiques pour la Libération du Congo') with military support from Rwanda and Uganda. The new Kabila regime wanted to reform the mining sector and make it more independent from major Anglo-American companies (Kennes, 2002: 163). Several contracts that were concluded just before the war were renegotiated and agreements for exploration activities were granted to international companies. But the government found itself in a weak negotiation position, as it needed funds quickly and was vulnerable to concluding unbalanced agreements. At the same time the new regime was trying to replace the former neo-patrimonial networks with its own networks. This resulted in conflicting tendencies of reconstruction and criminalisation (Kennes, 2005). On the one hand, foreign companies were eager to invest in the country and concluded many exploration and exploitation agreements. On the other hand, new rent-seeking networks were formed around the new government, so that the benefits of these agreements continued to flow to the politico-military elites, instead of to the Congolese population.

Laurent Kabila, wanting to acquire full military autonomy, soon turned against his former allies, asked his Rwandan advisors and proponents to leave the country and incited the population to hatred against the Rwandophone Congolese and Rwandans. In reaction to this, Rwanda and Uganda engineered a new rebel movement: RCD ('Rassemblement Congolais pour la Démocratie'). Thus, the country came to be divided between a 'government' (with support of Angola and Zimbabwe) and a 'rebel' side. In September 1998, Jean-Pierre Bemba created another rebel group, MLC ('Mouvement pour la Libération du Congo'), based in Equateur. In 1999, Museveni withdrew his support from the RCD after a dispute with Rwanda and sided with MLC. A few months later, there was also a split within the RCD, which resulted in the formation of two groups: RCD-Goma, backed by Rwanda and RCD-Kisangani, supported by Uganda. Until 2003, a multitude of armed groups and militias engaged in fierce fighting, mainly in the area controlled by RCD-G and in Ituri. As numerous authors have evidenced, Uganda and Rwanda were directly involved in the plundering of Congo's resources (see UN reports; Marysse and André, 2001; Marysse, 2005). Existing politico-commercial networks inside the DRC linked up with armed groups and external financiers, and control over the mining sites and trade routes became an important incentive for fighting²².

At the local level, this war situation created 'new local complexes of power, profit and protection', disrupting traditional social and economic structures and leading to social transformation (Vlassenroot, 2004: 40). For the population, the options for survival became very limited as insecurity affected petty trade and agricultural production in the countryside, as well as trade between the interior and the cities. Vlassenroot (2004: 54) argued that especially young men were left with only two options: join an armed group or work in a market controlled by armed groups, such as the mines. The "mobilisation of their labour" was the only way to survive (idem: 55). This way, the scale of artisanal mining and trading activities, which had emerged before, as said earlier, dramatically expanded. Especially after the sharp increase of the coltan price in the early 2000s, many people 'rushed' to the coltan sites in order to become a miner or a trader. These activities were thus a source of income for armed actors and their foreign allies as well as local and foreign businessmen, but also for the local population. In the meantime, industrial production, especially in the eastern part of the country, had come to a complete standstill.

Joseph Kabila, who succeeded his father Laurent Kabila in 2001, wanted to reverse this tendency. Under the guidance of the World Bank and the International Monetary Fund (IMF), his government established a new Mining Code²³ in 2002, giving priority to private sector development and large-scale mining projects (Mazalto, 2009), as had been the case in other African countries as well²⁴. Whereas the mining sector in the DRC was previously dominated by public enterprises, the primary aim now was to attract private investment in exploration and exploitation. Just after the conclusion of the peace agreement in 2003 this new policy did help in attracting foreign investment. A number of companies that had signed contracts in the 1990s resumed their activities (Kennes, 2005). On the other hand, many newcomers were attracted by the enormous potential in the country, and especially in Katanga a series of new joint-venture contracts were concluded. Industrial production of copper and cobalt in the province is now even again at unprecedented levels (Garrett and Lintzer, 2010; Marysse and Tshimanga, 2013). Since 2003 the investment in large-scale mining has indeed led to spectacular growth (an average growth of 6 percent per year) and helped the government to control inflation (Marysse and Tshimanga, 2013). But this growth has not led to broader socioeconomic development and improved wellbeing for the population. Bad governance, incompetent negotiation of mining contracts and corruption impeded the redistribution and productive use of the mining rents (idem)²⁵. And while in Katanga industrial production grew rapidly, the firm establishment of industrial companies was much more difficult in the eastern provinces, given the security and logistical challenges. In provinces like North and South Kivu and Maniema, almost all mineral production continued to occur by artisanal activities until very recently. Drawing on the - limited - available data, the World Bank (2008: 7) estimated

²² See footnote 17.

²³ Loi n° 007/2002 du 11 juillet 2002 portant Code Minier. I will refer to this law as the Mining Code.

²⁴ See section 1.1.

²⁵ Recent developments in large-scale mining have been discussed by academics, policy makers and NGOs (Garrett and Lintzer, 2010; Jansson, 2011; Kabuya Kalala and Tshiunza Mbiye, 2009; Kennes, 2005; Marysse and Geenen, 2009; Marysse and Tshimanga, 2013; World Bank, 2008; and reports of civil society organisations like Global Witness and Fatal Transactions).

the number of people directly or indirectly dependent on artisanal mining activities in the DRC at 10 million, or about 16 percent of the total population. Available estimates for the number of artisanal miners in the Kivu provinces, taken from Pact (2010), put the figure at about 350,000.

2.2.2. The Mining Code

As said above the Mining Code was put in place in 2002, meeting the president's desire to gain control over the economy and attract foreign direct investment on the one hand, and international donors' concerns about liberalising mining sectors in Africa on the other. The Mining Code and the subsequent Mining Regulations²⁶ differentiate between three modes of production, subject to different tax regimes and permit systems: industrial mining, small-scale mining and artisanal mining. The following public services govern the mining sector at the national level²⁷: Ministry of Mines, Directorate of Geology ('Direction de Géologie'), Directorate of Mines ('Direction des Mines'), Directorate for the Protection of the Environment ('Direction chargée de la Protection de l'Environnement Minier') and Mining Registry ('Cadastre Minier')²⁸. At the provincial level there is a Ministry of Mines too, with its administrative service, the Provincial Mining Division ('Division Provinciale des Mines'). Finally there are a number of technical services: CTCPM ('Cellule Technique de Coordination et de Planification Minière' or Technical Coordination and Planning Unit), CEEC ('Centre d'Evaluation, d'Expertise et de Certification des substances minérales précieuses' or Center for Evaluation, Expertise and Certification) and the Service for Assistance to Small-Scale Mining or Saesscam ('Service d'Assistance et d'Encadrement du Small-Scale et Artisanal Mining').

Every individual or company wanting to engage in industrial or small-scale mining can apply for a research permit ('permis de recherches') which is valid for a period of four years²⁹, possibly being renewed up to eight years. The only condition to obtain this permit is an attestation of minimal financial capacity. If the holder of a research permit finds promising deposits, he may apply for an industrial exploitation permit ('permis d'exploitation'), valid for a period of 30 years (renewable). Deposits that are judged not suited for industrial mining may be covered by a small-scale mining permit ('permis d'exploitation des petites mines'). One of the requirements is that exploitation has to be (semi-)industrial and should not exceed ten years. The customs and fiscal regime applicable to industrial and semi-industrial projects is uniform and "based on the principle of maximisation of rents for the Congolese state"³⁰. According to the World Bank (2008: 19), the regime is "internationally competitive and reflects current best practice" with an expected effective rate of taxation of 46 percent³¹. It includes among others royalties, income tax, customs duties, turnover tax, surface rights and so on³². In addition to the taxes foreseen in the Code, there are numerous fees and payments for services required under the Mining Regulations. An inter-ministerial decree (2007) for example identified 46 of those, required for various administrative authorisations (idem). Yet the World Bank (2008: 20)

²⁶ Décret n° 038/2003 du 26 mars 2003 portant Règlement Minier. I will refer to it as the Mining Regulations.

²⁷ Mining Code, T.1, Ch.2, art. 11-15. Mining Regulations, T.1, Ch. 3, art. 7-14.

²⁸ The Mining Registry is a public service acting under tutelage of the Minister of Mines (Mining Code, T.1, Ch.2, art. 12).

²⁹ Five years for non-precious minerals (Mining Code, T. 3, Ch.1.).

³⁰ Mining Code, T.9.

³¹ This puts the DRC in the upper-mid range of all mineral-producing countries.

³² Mining Code, T.9, Ch. 1-4. See also World Bank (2008: 19-20).

also acknowledges that in practice companies often pay much less and are able to negotiate more favourable tax rates and exemptions with the government. Mazalto (2005) also points to clauses in the Mining Regulations that allow companies to apply more liberal fiscal regimes³³. But companies also have obligations under the Code. For example, to retain the validity of their titles, they have to start activities (research or exploitation) within a certain time period, they have to pay 'surface rights', make an environmental impact plan and respect the regulations regarding security and hygiene³⁴. There are also a number of obligations with respect to dispossession and compensation of local populations affected by the mining activities (see Namegabe and Murhula, forthcoming)³⁵.

The law also explicitly recognises artisanal mining. It stipulates that the Minister of Mines may demarcate 'artisanal exploitation zones' (AEZ) in areas where "the technological and economic factors are not suited for the site to be industrially exploited"³⁶. The AEZ are to be determined and proclaimed by ministerial decree upon advice of the Provincial Mining Division. Sites already covered by industrial mining titles cannot be transformed into AEZ. In turn, companies cannot acquire research permits inside the AEZ boundaries, except for demands by artisanal miners' cooperatives ('groupements')³⁷. These cooperatives can thus officially work in these zones, and should ideally evolve into small-scale, semi-industrial operations. Individual miners who want to work in an AEZ need to buy a 'carte d'exploitant artisanal' at the Provincial Mining Division³⁸. The card is an official authorisation to mine and has to be renewed every year. Artisanal miners also need to comply with the regulations on security, hygiene, water use and environmental protection specified in the 'code of conduct for the artisanal miner', published as an annex to the Mining Regulations³⁹. For example, negative impact on the environment should be minimised, the use of explosives and mercury is strictly forbidden, deforestation is prohibited, and shafts should not go deeper than 30 meters underground, while they should have an inclined degree of not more than 15 percent⁴⁰. According to the Code artisanal miners can only sell their production to registered traders ('négociants') holding a 'carte de négociant' issued by the Provincial Governor⁴¹. These traders may sell to registered buyers ('acheteurs des produits miniers artisanaux des comptoirs agréés') who are associated to an export office ('comptoir')⁴².

³³ Mining Regulations, T.20, Ch. 1, Art. 510 for fiscal and customs regimes and art. 543 for loan conditions. According to her analysis, even though the law provides for easy rents and relatively stable taxes, the level of taxation is low.

³⁴ Mining Code, T.8, Ch. 1 and Ch.2., Art. 196-211. Mining Regulations, T.17-18, Art. 385-414.

³⁵ Mining Regulations, T. 19, Ch. 1, Art. 477-480.

³⁶ Mining Code, T. 4, Ch. 1, Art. 109.

³⁷ Mining Regulations, T.9, Ch. 2, Art. 234-237. Artisanal miners who individually hold 'cartes d'exploitant artisanal' may come together in a group ('groupement') and create a cooperative (Mining Regulations, T.9, Ch. 2, Art. 235). This cooperative can apply for a research permit (Mining Regulations, T.4, Ch. 1, Art. 103-110). The validity of a research permit is 4 years (renewable twice) for precious stones and 5 years (renewable twice) for all other minerals. If the cooperative is then transformed into a company, it can apply for an exploitation permit for small-scale mining ('permis d'exploitation de petite mine', Mining Code, T.3, Ch. 4.).

³⁸ Mining Regulations, T.9, Ch. 1, Art. 223-231.

³⁹ Mining Code, T. 4, Ch. 1, Art. 111 and 112. Mining Regulations, T.18, Ch. 2, art. 416.

⁴⁰ Mining Regulations, Annex 5, Art. 1-12.

⁴¹ Mining Regulations, T.10, Ch. 2, Art. 242-250. They may also sell to an 'artist' recognised by the Ministry of Arts and Culture (Mining Code, T.4, Ch.2, Art. 116).

⁴² They need to obtain an authorisation from the Minister of Mines. Mining Code, T.4, Ch.2., Art. 120. Mining Regulations, T.10, Ch. 4, Art. 258-265.

Despite the possibility to create artisanal exploitation zones though, tenure security for artisanal miners is not guaranteed. As a matter of fact the law provides for a possibility to close down the AEZ if "the factors justifying its creation ceased to exist", or if a "new deposit necessitating large-scale exploitation has been discovered"⁴³. This can be done by the Minister upon the advice of the Directorate of Geology. In this case, an artisanal miners' cooperative or an industrial company may apply for a research permit and take over the concession to start a (semi-)industrial exploitation and artisanal miners have to leave the area within 60 days.

The following duties and taxes are applicable in the artisanal mining sector⁴⁴:

| Nature of tax | Beneficiary | Amount in USD |
|--|---|--|
| Artisanal miners | | |
| Remunerative tax on artisanal miner's card | DGRAD (Direction Générale des Recettes Administratives et Domaniales) (= public treasure) | 25/ year |
| Tax on turnover in the import of equipment | OFIDA (Office des Douanes et Accises) | 13% of value |
| Traders | | |
| Remunerative tax on trader's card | DGRAD | 500/ year (gold category A) 150/ year (gold category B) |
| Comptoirs | | |
| Deposit ('caution') | DGRAD | 2500/ year |
| Annual duty ('redevance annuelle') | DGRAD | 5000/ year |
| Common right ('droit | Province via DPMER (Direction Provinciale | 1% of export |
| d'intérêt commun') | de Mobilisation et d'Encadrement des Recettes) | value |
| Exit right ('droit de sortie') | OFIDA | 1% of export value |
| Remunerative taxes | DGRAD: 8% | 1% of export |
| ('taxes rémunératoires') | OGEFREM: 8% | value |
| | OFIDA: 14% | |
| | Technical Mining Services (Saesscam, | |
| | CTPM, Cadastre Minier): 19% | |
| | OCC (Office Congolaise de Contrôle): 23% CEEC: 28% | |
| Comptoirs (other) ⁴⁵ | | |
| Deposit fee | Provincial Mining Division | 200/ export for gold,10USD/tonne for cassiterite10 |
| Administrative fee | Provincial Mining Division | 200 (when |

| Table 1. Taxes and duties applicable to artisan | al mining |
|---|-----------|
|---|-----------|

⁴³ Mining Code, T. 4, Ch. 1, Art. 110.

⁴⁴ Mining Regulations T. 20, Ch. 4, Art. 537-538.

⁴⁵ Taxes and fees not specified in the Mining Regulations. See Provincial Mining Division Annual Reports; Interview at the Provincial Mining Division, Bukavu, 21/03/2008; Interview at CEEC, Bukavu, 29/03/2008.

| | | comptoir is |
|-------------------------|----------------------------|-------------|
| | | opened) |
| Signature Bonus | Provincial Mining Division | 150/ export |
| Authorisation to export | DGRAD | 200/ export |
| Sample analysis fee | OCC: 300 | 450/ export |
| | CEEC: 150 | |
| Origin certificate | CEEC | 150/ export |
| Sticker | CEEC | 100/ export |

Source: Mining Regulations T. 20, Ch. 4, Art. 537. Provincial Mining Division Annual Reports.

After this brief discussion of what the law provides for, I will turn to a study of practices and realities in section 2.3, and point to an immense gap in this respect. Generally, the discrepancies between laws and practices in the DRC are attributed to bad governance (World Bank, 2008) and the weak institutional capacities of the Congolese state, or the lack of political will among its representatives (Pact, 2010: 5). One example with respect to the industrial mining sector is the negotiation of mining contracts. In 2005 and 2007 two special commissions evaluated a series of mining contracts with multinational companies and concluded that the majority should be renegotiated because of the harmful effects on the country's development⁴⁶. But despite this recognition it appeared that the terms of contracts that have very recently been concluded are still highly disadvantageous for the country and only seem to benefit some high-level politicians⁴⁷. In order to improve governance in the Congolese mining sector, several initiatives have been taken, such as the World Bank's 'Growth with Governance in the mining sector' programme (World Bank, 2008 and 2012) and adherence to the EITI (Extractive Industries Transparency Initiative)⁴⁸. With respect to the artisanal mining sector, a multitude of initiatives have been taken in recent years, which will be discussed in chapter eleven.

2.3. MINING IN SOUTH KIVU: LAW VERSUS PRACTICES

In South Kivu the majority of mineral production and trade remains artisanal and unrecorded. This means that it does not contribute to public revenues through taxation, nor is it effectively regulated by the laws evoked above. It is estimated for example that more than half of the cassiterite and coltan production and 98 percent of gold production (UN, 2014: par. 171) in the region is not registered. This becomes apparent when comparing the official production and trade figures and the estimated real production figures, as I will do below.

In this dissertation I focus on gold for different reasons. First, gold is currently the most important subsector in eastern DRC's artisanal mining economy, despite the fact that *official* production and exports are negligible, as I will show later. This is confirmed in IPIS' most recent mapping report, which states that gold production is far more important than tin, tantalum and tungsten combines, both in terms of volumes and in terms of people employed (an estimated 130,000 miners in the East, which is nearly four times higher than that for the 3Ts

⁴⁶ An in-depth analysis of these processes is beyond the scope of this dissertation, but see Kennes (2005); Global Witness (2007); Mazalto (2009: 202-203).

⁴⁷ See Joyce (2011).

⁴⁸ The Congolese government adhered to EITI, which means that they publish what they perceive as taxes, royalties and other duties from the extractive industries, and that companies publish what they pay to governments (EITI, 2012).

(Spittaels and Hilgert, 2013: 8). This shift from 3Ts (which used to be relatively more important until some years ago) can be attributed to recent regulation initiatives discussed in chapter eleven, but also to depleting reserves in some formerly 'big' mines. Second, gold is the only commodity that is currently being industrially exploited in South Kivu. This has a lot to do with the rise of world market prices in the period 2008-2013, which made it profitable for companies to start producing. In addition, some reasons are related to the specificities of the commodity and the commodity chain itself. Due to its high value, low volume character, gold is easy to smuggle, which provides for a particular dynamic. The 3 Ts typically flow from the Kivu region through Kigali, while gold generally transits in Kampala, Bujumbura and, to a smaller extent, Tanzania. Moreover, production modes differ across commodity chains, which calls for a thorough study of the 'micro-dynamics' of gold production and trade. Finally, gold derives its value not only from being a mineral commodity, but also from being a form of hard currency and source of foreign exchange, as I show in chapter ten. All this makes it interesting to concentrate on the gold sector.

Table 2 shows official exports of gold over the period 1998-2011. The high figures for 1998 and the 2000-2002 periods are remarkable. During this period he RCD administration in South Kivu succeeded in better controlling the mineral flows in the region by according export monopolies and reducing taxes for traders (Vlassenroot and Raeymaekers, 2004). In 2003, after the RCD had stopped being a rebel movement and became a political party, we thus see a considerable fall in official export figures. There is another decrease in 2006, when the national army eventually acquired real control over most of the territory in South Kivu (Tegera and Johnson, 2007). The official exports continued to drop ever since. Can the fall in exports be attributed to lower production? Indeed, some deposits have been almost depleted or experienced periods of lower production. But new veins or new deposits are also frequently discovered. Moreover, export figures from neighbouring countries (table 4) show that the exports of Congolese gold at this level are not really declining. Since 2003 Burundian exports of gold have been roughly between 2 and 4.5 tonnes, while this country has a low domestic production (250 to 300 kg per year; Midende, 2010). Especially for 2006 there is a remarkable contrast between the drop in exports from South Kivu and the increase in Burundian exports. The only plausible hypothesis thus seems to be that the level of unrecorded, smuggled exports has increased. This particularly seems to have been the case since the introduction of the mining ban (September 2010-March 2011) which suspended all artisanal activities in the provinces of North and South Kivu and Maniema. During the ban all export offices closed down, for gold (table 3) as well as for coltan, cassiterite and wolframite. But even after the ban had been levied, the export offices did not resume their activities as expected because of the ongoing attempts at regulation and formalisation, including the US Dodd-Frank act which had been voted but for which the implementation remained uncertain. All this created a 'de facto ban' on the export of artisanally produced minerals in the region. In chapter eleven this will be discussed further.

| Year | Quantity (in kg) |
|------|------------------|
| 1998 | 1,260 |
| 1999 | 604 |
| 2000 | 1,400 |
| 2001 | 1,504 |
| 2002 | 1,991 |
| 2003 | 791 |
| 2004 | 656 |
| 2005 | 595 |
| 2006 | 160 |
| 2007 | 105 |
| 2008 | 64 |
| 2009 | 86 |
| 2010 | 33 |
| 2011 | 23 |
| 2012 | 41 |

Table 2. Official gold exports from South Kivu (1998-2012)

Source: Provincial Mining Division, South Kivu

Table 3. Official exports by comptoir (2007-2012)

| Quantity exported (in kg) | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 |
|------------------------------|---------|--------|--------|--------|--------|--------|
| Namukaya | 90.716 | 57.102 | 69.609 | 29.818 | 22.917 | 21.037 |
| Aurex Congo | 7.640 | | | | | |
| Cotracom | 7.505 | 7.531 | 16.764 | | | |
| Intermines | | | | 3.780 | | |
| Mining Congo | | | | | | 20.134 |
| Total | 105.862 | 64.634 | 86.373 | 33.599 | 22.917 | 41.172 |

Source: Provincial Mining Division, South Kivu

Table 4. Official exports from Burundi (2001-2009)

| Year | Quantity (in kg) |
|------------------------|------------------|
| 2001 | 415 |
| 2002 | 483 |
| 2003 | 2,854 |
| 2004 | 3,229 |
| 2005 | 3,905 |
| 2006 | 4313 |
| 2007 | 2,423 |
| 2008 | 2,005 |
| 2009 (1st semester) | 781 |

Source: International Conference on the Great Lakes Region, available online: https://icglr.org/spip.php?article94

In contrast to the *official* figures presented in tables 2-4, *real* production and subsequent exports from South Kivu are difficult to evaluate. A first way to estimate is indirect: based on export figures from neighbouring countries⁴⁹. To the official gold exports from Burundi in the table above, one has to add the volumes that pass through Rwanda and Tanzania. On this basis, Eric Kajemba, who has been a long-standing civil-society observer of the mining sector in South Kivu, and the chief of the Provincial Mining Division both estimated real production in South Kivu at around 400 kg per month, or 4800 kg per year⁵⁰. This figure has actually been reported in many publications (4800 kg from South Kivu and 5200 kg from Ituri, based on Uganda's export figures) (Tegera and Johnson, 2007; De Koning, 2011: 10).

There have also been bottom-up attempts to estimate the volumes of gold produced in South Kivu's mining sites. One partial attempt was made by the Provincial Mining Division in 2011. In a report called 'Cartographie des sites miniers du Sud-Kivu' (2012) the Division registered a monthly production of 89 kg of gold, divided over different mining sites: 34 kg in Shabunda; 26 kg in Fizi; 17 kg in Mwenga; 9 kg in Walungu; 1.15 kg in Kabare and 0.9 kg in Kalehe. As I said earlier donors are currently assisting the mining services in doing better 'mapping exercises' and improving this kind of information. Gabriel Kamundala (Catholic University of Bukavu) has estimated production at several gold sites where he has a longstanding experience (Kamundala, 2012 and 2013a). He has done this on the basis of a sample production in a number of mining shafts. He estimated monthly production in Kamituga, Lugushwa and Mukungwe at 338 kg (228 kg for Lugushwa, 70 kg for Kamituga, 40 kg for Mukungwe: Kamundala, 2013a), and in Misisi mine at about 181 kg (for the year 2012: Kamundala, 2012). This figure already exceeds the 400 kg mentioned above. Kamituga and Lugushwa are situated in Mwenga, whereas Mukungwe is in Walungu territory and Misisi is the most important gold mine in Fizi territory. So his calculations exclude the territory of Shabunda, where we know that more than 100 smaller gold deposits are scattered⁵¹. Kamundala did not estimate production for Twangiza (a concession stretching out over the chiefdoms of Luhwindja, Burhinyi, Kaziba and Ngweshe, named after the small village of Twangiza were gold was found), as a number of important sites there had already been closed down by the gold mining company Banro. Nevertheless, there are estimates from a 2008 study by the local NGO Observatoire Gouvernance et Paix (OGP), which reported that in Mbwega, the most important mine in the Twangiza concession, there were more than 600 shafts with an average number of five to ten miners per shaft and a total daily production of 1.3 to 1.8 kg of gold, or 39 to 54 kg per month (OGP, 2008: 29). My own survey (with Kamundala) in Kamituga also gives an indication, as seen in table 5. During a period of ten months in 2009 (excluding the months of May and June), we asked 19 local buying offices to register the volumes of gold they bought from local miners. The selection of these 19 buying offices was done on the basis of a good knowledge of the most important buying offices in town, which we had acquired during previous field visits⁵². Not all offices submitted their reports every month, but a minimum of 12

⁴⁹ Ellis and MacGaffey (1996) describe such indirect methods to study the macro-aspects of international illegal trade.

⁵⁰ Interviews at Provincial Mining Division, Bukavu, 21/03/2008 and 28/03/2008.

⁵¹ Cartographie des sites miniers du Sud-Kivu par rapport aux centres de négoces, Division des Mines Bukavu, 02/2012.

⁵² From observations I knew that there were 17 large and about 50 small buying offices in town; representative cases from both groups were included in the survey. See chapter ten.

offices always submitted figures we judged reliable. As the table shows, according to our estimates almost 618 kg of gold was purchased in Kamituga that year.

| Month | Total purchases registered (in kg) | Average purchase per buying office (in kg) | Estimate for all buying offices in Kamituga |
|---------------------|---|---|--|
| January | 11.353 | 0.630 | 42.260 |
| February | 10.131 | 0.533 | 35.727 |
| March | 9.395 | 0.626 | 41.968 |
| April | 13.306 | 0.887 | 59.434 |
| July | 15.205 | 1.013 | 67.915 |
| August | 7.467 | 0.746 | 50.034 |
| September | 13.827 | 0.768 | 51.470 |
| October | 9.374 | 0.781 | 52.339 |
| November | 11.604 | 0.790 | 52.952 |
| December | 10.889 | 0.907 | 60.799 |
| May/June (estimate) | | | 102.980 |
| Total | | | 617.882 |

Table 5. Estimate of gold flow in Kamituga

Source: Author's own survey, 2009

From this exercise, comparing official and real production figures in South Kivu, it can be concluded that almost the totality of gold is produced and traded in an unofficial way. This means that the gold sector in South Kivu is not regulated at all by the Mining Code. This substantiates the claim made in the conclusion of chapter one (section 1.6) that it makes little sense to conceptualise the sector, or its actors, in terms of 'legality' and 'illegality'. The remainder of this section will further illustrate this, showing that many legal provisions for artisanal mining discussed in section 2.2.2 have not (yet) been put into practice, so for artisanal miners it is either impossible, or not efficient, to adhere to them.

The most important for artisanal miners is probably the creation of artisanal exploitation zones or spaces where they can legally carry out their activities. These are limited at the moment. Map 1 (in annex) shows the zones that have been created, as well as the research and exploitation permits granted to industrial companies (data as from 2012). Table 6 shows that fourteen zones have been identified at the level of South Kivu's Provincial Mining Division and the Mining Registry. Seven have been officially installed by Ministerial Decree. These are all zones for cassiterite and coltan mining, so at present there are none for gold. But apart from looking at the mere number of zones, it may be worthwhile to give some indications about their viability. First, the surface area of all zones combined is 258 carrés⁵³ or 219 km2. It suffices to compare this with the surface area of Banro's exploitation permits in South Kivu⁵⁴ -

⁵³ 1 carré = 84.955 ha.

⁵⁴ Status on 01/09/2011, Mining Registry, South Kivu.

a total of 3285 carrés or more than 2790 km2⁵⁵ - to see that there is a huge disequilibrium. Besides, Banro acquired research permits on an area that is even larger than this. Second, no geological studies have been undertaken to determine reserves for these concessions, let alone to calculate whether they would be suitable for artisanal mining. Third, some of these zones are very remote and hard to access because of insecurity and the absence of road infrastructure.

| N° | Date | Territory | Carrés | Arrêté Ministériel n°. 0/CAB.MIN/MINES/ |
|---------|------------|---------------------|--------|--|
| 6254 | 13/03/2008 | Kalehe | 50 | 257 |
| 6255 | 13/03/2008 | Kalehe | 12 | 258 |
| 6256 | 13/03/2008 | Mwenga | 102 | 259 |
| 6257 | 13/03/2008 | Mwenga | 22 | 260 |
| ZEA-001 | not yet | Shabunda | | |
| ZEA-002 | not yet | Shabunda | | |
| ZEA-003 | not yet | Shabunda | | |
| ZEA-004 | not yet | Kalehe | | |
| ZEA-005 | 22/09/2009 | Kalehe | 36 | 648 |
| ZEA-012 | not yet | Shabunda | | |
| ZEA-013 | 22/09/2009 | Shabunda | 20 | 649 |
| ZEA-014 | 24/09/2009 | Shabunda | 16 | 651 |
| ZEA-015 | not yet | Kalehe | | |
| ZEA-085 | not yet | Kabare- Shabunda | | |

Table 6. List of artisanal exploitation zones in South Kivu

Source: Provincial Mining Division South Kivu, Annual Reports, Ministerial Decrees

The 'handbook' on certification and traceability that was introduced by the Ministry of Mines⁵⁶ stipulates that all gold needs to be traded in 'centres de négoce'⁵⁷ or centralised trading points. Yet so far only one centralised trading point has been built in Mugogo, 30 kilometers from Bukavu. The equipment is in place, but the trading point is not yet operational, and it is difficult to believe that traders will come here to sell their products if there are no additional incentives to do so. The gold traders have for example serious security concerns about travelling to some central place and 'exposing themselves' with their gold⁵⁸.

The law also requires miners to group together in so-called 'groupements' or cooperatives. These cooperatives may apply for research and exploitation permits within artisanal exploitation zones, and would thus embody the transition to small-scale mining activities. During the 2010-2011 ban on artisanal mining activities the Ministry of Mines in South Kivu

⁵⁵ Divided as follows: 1432 carrés for Twangiza Mining, 748 carrés for Lugushwa Mining, 902 for Kamituga Mining and 203 for Namoya Mining.

⁵⁶ Ministère des Mines, Ministère des Finances (2009) *Manuel des procédures de traçabilité des produits miniers, de l'extraction à l'exportation*. For a more detailed discussion, see Kilosho et al (2013).

⁵⁷ The Provincial Mining Division of South Kivu, for example, listed the different mining sites and specified to which 'centre de négoce' they would be connected. See *Cartographie des sites miniers du Sud-Kivu par rapport aux centres de négoce*, 02/2012.

⁵⁸ This was confirmed by my own research and by Pöyhönen et al, 2010: 19-20.

pushed cooperatives to submit their files to the Provincial Mining Division. But administrative procedures proved to be complicated, slow and, above all, costly. Cooperatives first need to introduce their file at the Provincial Ministry of Mines, which brings along administrative costs, as well as costs for legalising the statutes at the tribunal⁵⁹ and paying members' cards. After a 'favourable opinion' from the Provincial Minister, they must bring the file to Kinshasa. In South Kivu the leader of an umbrella organisation for cooperatives, Gécomiski ('Générale des Coopératives Minières du Sud-Kivu')⁶⁰ told me he usually takes on several files at a time and travels to Kinshasa, where he again has to go through a whole administrative carrousel⁶¹. At the national level cooperatives also pay contributions as decreed by the Minister in 2011: USD 2,500 annual duties, USD 5,000 deposit and USD 500 to introduce the file. On 3 June 2011 46 cooperatives representing almost 60,000 members had submitted their file, while only 16 already received a favourable recommendation from the Provincial Minister of Mines. More recent figures from 2012 indicate that 62 cooperatives already submitted a file⁶². About seven would have obtained their official recognition in mid-2012⁶³.

Next, few artisanal miners have bought a 'carte d'exploitant artisanal'. Table 7 demonstrates that the number of miners having acquired this authorisation from the Provincial Mining Division has nothing to do with real figures, since estimates of the number of miners in South Kivu amount to 100.000 and more.

| | Cassiterite | Coltan | Wolframite | Gold |
|------|-------------|--------|------------|------|
| 2007 | 192 | 24 | 2 | 139 |
| 2009 | 16 | 11 | 10 | 17 |
| 2011 | 89 | | | 69 |
| 2012 | 39 | | 2 | 60 |

 Table 7. Number of 'cartes d'exploitant artisanal' sold by Provincial Mining Division

Source: Provincial Mining Division South Kivu, Annual Reports

The reasons for this low registration are multiple. First, the miners do not consider it to be in their interest to be registered, on the contrary. The public services that should govern the mining sector at the local level, the Provincial Mining Division and Saesscam, hardly deliver any services to the miners. As I will show in chapter eight they are rather considered as extractive than as supportive services, so for miners there are few incentives to register. Second, the administration does not have the capacity to enforce this regulation, and does not penalise artisanal miners who do not hold a card. Third, the costs for the card are unpredictable and can vary (see also Pact, 2010: 47). Whereas the Provincial Mining Division decided that the price should be USD 25 per year, in practice miners pay amounts between USD 25 and 100 to the local branches of the Mining Division, depending on the person and his negotiation skills. This underscores the arbitrariness of the administrators. A final reason for not registering is the fact that miners just do not like to be known. They certainly do not want others to know how much they produce, since this may put them in a vulnerable and insecure position and

⁵⁹ The model statute (*Statuts-type pour une coopérative minière*) is inspired by a colonial example (*Décret du 24 mars 1956 relatif aux coopératives*) and is criticised for not being adapted to current realities.

⁶⁰ An umbrella organisation of 33 cooperatives in South Kivu.

⁶¹ Interview with cooperative leader, Bukavu, 26/05/2012.

⁶² Reports Provincial Mining Division.

⁶³ Interview with cooperative leader, Bukavu, 26/05/2012.

make them subject to theft, extortion or illegal taxation. There is also a sense of secrecy that is very tangible in gold mining, as I will show later on.

| | Cassiterite | Coltan | Wolframite | Diamond | Gold | | | |
|------|-------------|--------|------------|---------|-----------|-----------|----|----------------|
| | | | | | Cat. A | Cat. B | | Not ecified |
| 2007 | 83 | 10 | | 1 | | | 34 | |
| | | | | | 22 | | 12 | 0 |
| 2009 | 28 | 3 | 3 | | | | 42 | |
| 2010 | 50 | | | | | | 41 | |
| | | | | | 29 | | 9 | 3 |
| 2011 | 56 | | | | | | 72 | |
| 2012 | 94 | | | | | | 87 | |
| | | | | | 44 | | 37 | 6 |

Table 8. Number of 'cartes de négociant' sold by Provincial Mining Division⁶⁴

Source: Provincial Mining Division South Kivu, Annual Reports

The same reasons may be advanced to explain why so few traders hold a 'carte de négociant' or a traders' permit, although proportionally more traders than miners hold an official card. These permits are issued for a period of one year under the jurisdiction of the provincial governor. The figures in table 8 count for the entire province of South Kivu, while in Bukavu alone hundreds of traders are known to be active⁶⁵. Nevertheless, despite the fact that they hold an official permit traders may still trade the majority of their gold unofficially. In 2007 a trader's permit for gold cost USD 250, for coltan and cassiterite USD 300. In 2008 rates were changed and differentiated between gold trader category A (resident in Bukavu), gold trader category B (outside Bukavu) and commission agent (ambulant trader working on someone else's account). A permit for category A costs USD 500 + USD 100 administration costs, category B costs USD 150 + USD 100 and commission agent USD 150.

Finally, we can have a look at the laws and the practices with respect to the fiscal regime for artisanal mining and trade. As I said only a very small part of real trade flows is registered. This means that the public treasury and the different mining services miss out on a lot of potential revenues. Table 9 seems to suggest that there are big fluctuations in the level of taxes and duties perceived by the public and provincial treasuries over the years 2007-2011. The data all come from the Annual Reports of the Provincial Mining Division. For 2007, 2008 and 2009, the data were differentiated between duties and different kinds of taxes, whereas in 2010 and 2011 data were reported according to the level to which they contributed: the national or the provincial level. The UN experts estimated the total value of gold smuggled out of the country in 2013 to be between USD 383 million and USD 409 million (US, 2014: par. 171). On the basis of this, the government was expected to have lost between USD 7.7 million and USD 8.2 million in tax revenue during 2013 (idem). In comparison, EITI recorded that the government received about USD 800 million in tax revenues from large-scale companies in the year 2010 (EITI, 2012: 11)⁶⁶. The report also denounced the lack of action by the government against the

⁶⁴ No data available for 2008. Data on Category A or B are not always consistent.

⁶⁵ Interview with president traders' association, Bukavu, 20/10/2011.

⁶⁶ The companies reported having paid to the government USD 773,021,963. The revenues department declared having received USD 875,938, 727.

illegal gold trade: "gold traders work openly, yet government authorities fail to arrest these traders or compel them to trade legally in gold" (UN, 2014: par. 175). It finally made note of three seizures of gold parcels without accompanying documents in October 2013 in South Kivu. After the first two seizures "high-ranking officials intervened to release the gold and the traffickers" (UN, 2014: par. 176).

| Year | Duties | Taxes | Total for public treasure | Total for provincial treasure |
|-----------------------|---------|-----------|------------------------------|-------------------------------------|
| 2007 | 222,000 | 2,097,638 | | |
| 2008 | 188,500 | 1,771,581 | | |
| 2009 | | 926,935 | | |
| 2010 | | | 211,116 | 332,675 |
| 2011 (1 st | | | 25,434 | 132,399 |
| semester) | | | | |

| Table 9. Taxes and duties received by the Provincial Mining Division of South Kivu (in USD | Table 9. Taxes and duties received | by the Provincial Mining D | vivision of South Kivu (in USD) |
|--|------------------------------------|----------------------------|---------------------------------|
|--|------------------------------------|----------------------------|---------------------------------|

Source: Provincial Mining Division, Annual Reports

2.4. CONCLUSION

This chapter follows up on the first one as it discusses the relationship between mining and development in the DRC. It first of all demonstrates that the dominant narrative on mineral resources being a 'curse' to the DRC should be nuanced, both in time and in space. This narrative is based on a number of assumptions which ignore real governance dynamics in the country as well as the sector's internal dynamics. This may explain why, despite several initiatives to regulate the artisanal mining sector, the realities on the ground have not changed in the desired direction, especially not for gold. On the contrary, official production and export figures for gold continue to dwindle. There is indeed a big gap between legal requirements or policies and actual practices, as a comparison of official and real production, but also the ineffective implementation of miners' and traders' registration, creation of artisanal exploitation zones and tax collection demonstrate. In such a context, it makes little sense to analyse the gold sector in terms of its 'informality' or 'formality'. In order to really understand its functioning, we need another conceptualisation, which will be constructed in chapter three.

This chapter serves as a background to my analysis in part two, three and four by providing a historical context (at the national level) and giving a general overview of policies and practices in the gold sector in South Kivu province. Part two of this dissertation will provide a historical analysis of access to gold mining and trade in three selected study sites in South Kivu: Kamituga, Luhwindja and Mukungwe. The sites were chosen because of their importance in terms of gold production and number of people working in the gold sector, because of their divergent historical trajectories and because of the current configuration of artisanal and industrial mining. Part three will then analyse the internal dynamics of the gold sector in depth, from the underground mining shafts up to the regional trade level. Part four finally will exemplify how the *internal* dynamics of the gold sector may come under pressure and change in response to a number of *external* dynamics.

CHAPTER 3. POLITICAL ECONOMY OF ACCESS TO GOLD: A CONCEPTUAL FRAMEWORK

"Nous avons maintenant ce qui nous manquait et nous pouvons poursuivre nos recherches" (p.144).

"We now have what was missing and we can continue our research" (p.144).

This study is woven around the concept of 'access' and combines insights from legal pluralism, political ecology, political economy and actor-oriented sociology. In the next sections I build up my conceptual framework and define the most important concepts. In terms of approach the dissertation looks at the actors in the gold sector and the way in which their practices are enabled or constrained by power relations and by the normative framework in place. As such it is in line with the 'interactionist' approach recommended by Olivier de Sardan (2005: 52), which is explicitly empirical, shows a great awareness of the fragmentation of current social realities and covers two complementary levels:

"First, it is more localized, with a greater focus on the micro and even on the meso levels. (...) Its efforts at theorizing focus on the understanding, partial though it may be, of regional and sectoral phenomena, preferred over general theoretical viewpoints and dogmatic statements made out of context. Second, the emphasis is placed on social actors or groups of social actors, their strategies, and the stakes they vie for. The elbow room available to individuals and groups within the series of constraints determined by structures is now a major object of study".

The 'interaction' thus refers to a combination of the analysis of actors' strategies, behaviour and practices on the one hand, and norms and power relations on the other hand. In terms of scale, I look at how local, national and global processes are interrelated through the 'commodity chain' of gold, a series of interlinked exchanges through which gold passes from extraction up to end use. But the focus lies on artisanal gold production and local gold trade, because the complexities that are found at this level justify a detailed empirically-grounded analysis.

I would like to add a third dimension of 'interaction' though. The conceptual framework is born out of an interaction between the empirical data I gathered and a continued literature study. As I will further explain in chapter four, periods of fieldwork alternated with periods of analysis and conceptual development, resulting in a 'grounded' approach. The concepts that will be unpacked in this chapter have thus been used in the first place as tools for analysis. They have enabled me to make sense of artisanal gold mining and gold trade in South Kivu. Figure 1 first of all gives a schematic overview.

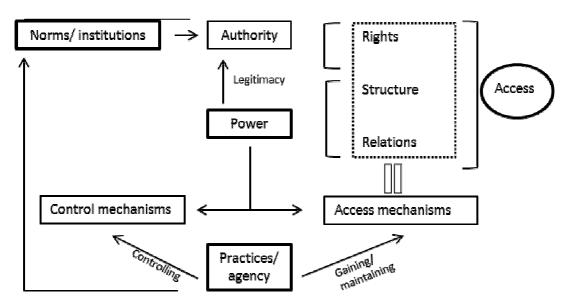


Figure 1. Schematic presentation of the analytical concepts

Source: Author's own representation

3.1. INSTITUTIONS, NORMS AND PRACTICES

In all societies there is coexistence and interaction between different normative orders or 'institutions' (as 'rules of the game')⁶⁷. This situation is often referred to as legal pluralism (Griffiths, 1986). Legal pluralism indeed refers to the co-existence of different normative systems and norm-producing authorities such as the state, customary and religious authorities, economic authorities and local communities, each having their own sources of legitimacy and authority (Von Benda-Beckmann, 2006). Behind these normative orders lies a diversity of social spaces, or what Moore (1978) called 'semi-autonomous social fields'. These social fields all have the capacity to build and enforce norms, but are also constrained in their autonomy by their interaction with other social fields. In the more recent literature on state formation this empirical reality has also been described as a situation of 'hybrid governance' (Boege et al, 2008: 10). Yet 'hybridity' does not only refer to the co-existence of normative orders or institutions (next to each other or in competition with one another). It actually goes a step further in saying that these institutions interact, intertwine and merge into a new mix (Goodfellow and Lindemann, 2013), a process that reflects Frances Cleaver's concept of 'institutional bricolage' (Cleaver, 2001). As will become clear in part three, the institutional context in South Kivu provides ample evidence of pluralism as well as hybridity and bricolage. In this sense South Kivu is probably not different from any other region in the world, for that matter.

In this dissertation I study 'practices', meaning what actors do, how they act and behave. Some of these practices are 'regulated', in the sense of organised, ordered or part of an arrangement. For example, a transaction between two gold traders can be regulated: they may set a price and a delivery term. But this arrangement becomes a norm only when it is adopted

⁶⁷ New Institutional Economists conceptualise 'institutions' as 'rules of the game' and commonly distinguish between 'formal' and 'informal institutions', see North, 1990.

by many traders and when non-compliance has a consequence, for example a damaged reputation⁶⁸. In other words, the concept of 'norm' is used in this study to refer to a practice many people (within a specific group) adopt, for which they develop a common understanding and for which non-compliance has a consequence. This consequence may be of different kinds, and may be weaker or stronger. In the case of an official norm sanctioned by state law, professional state agents punish non-compliers; for customary norms this is done by customary authorities; for moral norms non-compliance leads to guilt and for social norms it leads to contempt by others or shame by the offender; for conventions and equilibria adherence is guaranteed by short and long-term self interest respectively (see Jon Elster's typology in Elster, 1989 and Olivier de Sardan and De Herdt, forthcoming). The term 'norms' clearly has a prescriptive connotation: norms set a standard, and so they constrain the practices of the actors involved. But this automatically implies that deviance from the norm is also possible. In some cases this is done through a negotiation with the norm-producing authority; in other cases norms are transgressed without the authorities knowing about it, or with the latter tolerating it. In this case the transgression of the norm may become part of a normative system itself, such as for example in the case of gold smuggling⁶⁹.

Jean-Pierre Olivier de Sardan has recently argued that researchers should look beyond 'the rules of the game' at 'the way in which the game is played' (Olivier de Sardan, 2011: 16). His research more particularly concerned professional norms, which are formalised through official documents such as laws and decrees, procedures, organisational structures, programmes, trainings, monitoring and so on (Olivier de Sardan, 2008: 8). Yet state agents' practices seem to widely diverge from those explicit professional norms. Nevertheless, Olivier de Sardan argued that these practices are also regulated, albeit implicitly, by what he called 'practical norms'. The practices of African agents are often explained as being regulated by traditional, social or moral norms, yet for Olivier de Sardan the latter are all explicit and part of the public discourse, whereas practical norms are implicit. I find it difficult to make a clear distinction between implicit and explicit norms, as some norms may only be explicit within certain groups or contexts. For example, some of the norms in the professional context of the gold trade, such as those pertaining to debt payments, may be implicit in the eyes of the external observer, yet very explicit in the mining sites. For all the norms regulating practices in the gold sector, I use the term 'professional norms' in this dissertation, since they are known, agreed upon and monitored by the professional actors involved. When used with another adjective, such as moral or social, this refers to the fact that there is an additional underlying sanctioning mechanism as described above.

3.2. ACCESS: RIGHTS, STRUCTURE AND RELATIONS

Access has been defined as "the ability to benefit from things" (Ribot and Peluso, 2003: 153). It encompasses *all manners* in which people can benefit from *any thing*, including material, symbolic and natural resources. Such a definition of course opens up a wide range of research possibilities and first of all requires a definition of *what* the thing is, and *what benefits* can be derived from it. By focusing on *ability*, the attention is also drawn to a wide range of power relations and norms that can constrain or enable actors to benefit from resources. In this sense

⁶⁸ See chapter nine.

⁶⁹ See chapter ten.

the concept refers to legal pluralist theory, which acknowledges that external factors (politicaleconomic, cultural and social) and the wider institutional context determine who can use law, custom and convention, and in what ways. Yet it also goes beyond legal pluralism in its specific view on 'rights'.

In a context that is characterised by legal pluralism, there are multiple and overlapping rights ('bundles of rights'), which in property rights theory are disentangled following a categorisation in use rights, withdrawal rights and decision-making rights (Schlager and Ostrom, 1992). Use rights include the right to physically access the resource, for example to walk on a piece of land; withdrawal rights include the right to benefit, for example to pick wild fruit or to work the land for economic benefits; decision-making rights include a management right (plant a crop), exclusion right (prevent others from accessing the field) and alienation right (cede the rights to others) (Meinzen-Dick and Mwangi, 2008). There is a hierarchy in these bundles of rights, with the alienation right giving most exclusive and 'full' ownership. As has been stated in section 1.4 property economists argued that the more exclusive the rights, the better they will stimulate economic development. Therefore these authors argued for formalised and privatised titling that grants alienation rights and is protected by the state. But as legal pluralists believe that the state is not the only body that can sanction claims, they simply define property as "an enforceable claim to the use or benefit of something" (Sikor and Lund, 2009: 4), whether this claim is socially sanctioned and supported by convention, customary law or state law (Meinzen-Dick and Pradhan, 2002).

But not all claims are socially sanctioned and the fact that people are able to benefit from something does not necessarily imply that they have property rights. Therefore access was introduced as a broader concept. It has been widely used in political ecology in order to study the relations between people and natural resources, and it is used by property theorists to refer to property rights and other ways of benefiting from resources. However, Jesse Ribot and Nancy Peluso (2003) were the first to systematically theorise the concept⁷⁰. I agree with them that access is an empirically useful concept. It "facilitates grounded analyses of who actually benefits from things and through what processes they are able to do so" (idem: 154). Yet it also opens up an important analytical space through the shift it makes from a mere focus on rights to a focus on rights, structures and relations.

In this sense access echoes Amartya Sen's concept of 'capabilities'. In his earlier work on famines, Sen (1981) focused on 'entitlements', or the command a person can have over resources using the totality of rights and opportunities available to him or her (see De Herdt, 2000: 58). The notion of entitlement did pay attention to the way in which (through entitlements based on production and those based on exchange) and the extent to which people can benefit from a resource. But it also counted upon rights (albeit in the case of 'extended entitlements' also on legitimacy resulting from social or moral norms) to translate the entitlements into outcomes and achievements (Pressman and Summerfield, 2002: 430). In his later work, Sen (1999) evolved towards a focus on 'capabilities', meaning what an individual is actually able to be and do. He broadened his perspective to go beyond people's command over resources and include much broader outcomes or 'functionings': states of being and doing a person has reason to value, such as being healthy, being happy, having a

⁷⁰ See also an earlier article by Jesse Ribot (1998).

good job. This approach had the merit of drawing economists' attention to hitherto neglected dimensions of welfare – beyond pure economic and material dimensions – and to various forms of capital, including human and social capital. It inspired the 'livelihood approach' which became the dominant framework for studying poverty in the 1990s. The framework allows for a holistic understanding of livelihoods and the multidimensional character of poverty, which is, as de Haan and Zoomers (2005: 33) argue, its most important merit. Yet for the purpose of my research it may be too broad because I aim to study mining and trading activities, and how people benefit from them. I am not trying to capture all dimensions of individuals' or households' poverty. Indeed, although in the sites under study artisanal mining probably is the most important activity, the individuals – and certainly the households – under study may have differentiated sources of income. They may for example combine mining with agriculture, or a miner's wife may sell vegetables at the market. Although I do use the term livelihoods to refer to people's 'making a living', I assume that mining can be one activity contributing to their livelihoods.

This study takes as a starting point the relation between people and mineral resources – in this case gold, and seeks to find out not only how much, but also how local people benefit from gold. This question implies looking at institutions and power relations that enable or constrain people. And it is precisely this aspect that is sometimes understated in livelihood studies, leading de Haan and Zoomers in their 2005 article to say that "the livelihoods approach should now prepare to face power relations in order to complete its conceptualization" (idem: 36). The issue of power is taken up in access theory by referring back to a much older tradition in political economics. Consider for example Marx's interpretation of property as being a man's relation to his natural conditions of production, but also as social relations. For Marx (1859), property relations or the relations of production determine who owns and controls the material forces of production and the products resulting from them. His view was rather deterministic, as people do not enter into these relations (in social classes) voluntarily. The totality of the relations of production constitutes the economic structure of society at a particular moment in time, into which individuals are compelled. Capitalism, for example, is characterised by private property, wage labour, a ruling bourgeoisie (possessing the means of production) exploiting the proletariat (possessing their own labour power), which they must sell in order to survive.

Access theory is less deterministic and considers material and social factors as being equally important. Just like the livelihoods approach it opens up possibilities for 'agency', a concept that will be further discussed in section 3.5. This is clear in the conceptualisation of 'access mechanisms' as the processes, means and relations through which people gain access. Apart from rights, these are also structures and relations. Ribot and Peluso (2003: 161) therefore provided the following categories to map access mechanisms: rights-based (sanctioned by law, custom, and convention or unsanctioned, by theft, coercion or violence), structural (access to technology, capital, markets, labour, knowledge, authority and information) and relational (access via the negotiation of social relations of friendship, trust, reciprocity, patronage and clientelism, dependence and obligation). As the authors say, these mechanisms are not exhaustive and there may be overlaps between categories. Their categorisation provides for a 'working set', which is also the way I will use it in this dissertation.

Rights-based mechanisms, Ribot and Peluso (2003) argued, can be legal or illegal. Legal rightbased access mechanisms imply that a government, a community or some other legislative body sanctions a claim and declares it to be legitimate, which is in line with a legal pluralist view. So this includes practices that exceed the limits of official state law, but are nevertheless sanctioned by custom or convention. They are then considered to be legitimate⁷¹. Actors may thus play upon the existing normative frameworks and select the types of law they think will be most likely to back their claims. This is the process of 'forum shopping' (Griffiths, 1986; von Benda-Beckmann, 1981). As such, the context of legal pluralism may enable people to manoeuvre, give them room for negotiation and increase their agency. On the other hand, the multiplicity of legal orders may also increase uncertainty, constrain choices and offer opportunities for elite capture, as I argue below. In other words, individual agents can 'use' the legal registers they find appropriate, but their choices are not boundless as their power position and the institutional context they are moving in, determine which registers are available to them. Illegal rights-based access mechanisms on the other hand refer to practices that are not socially sanctioned, such as theft, coercion and criminality. Yet again, as Ribot and Peluso (idem) also acknowledged, "criminality is a matter of perspective, one that depends on the actor's relationship to the law or other form of rules or sanctioned conventional practices"⁷². State agents may, for example, abuse their power in order to personally gain access to resources (corruption). These actions may be considered illegitimate by the population, who adhere to a different moral economy, but legitimate by the agents themselves. The same is true for access mechanisms such as smuggling or trickery as discussed in chapter ten. These are partly rights-based – being part of a moral economy – but they also relate to the second category of access mechanisms.

Structural access mechanisms relate to Marx's forces of production, which are a combination of the means of labour with human labour power. They encompass all the forces that people apply in a production process, including tools, techniques, machinery, infrastructure, land, resources, but also information and knowledge. Having access to these is obviously crucial for the ability to benefit. My analysis in chapters eight, nine and ten includes a diversity of structural access mechanisms. Their relation to rights-based access mechanisms can be particular. Structural access mechanisms may be used to reinforce rights-based access mechanisms. For example, access to financial capital may be critical for having access to private property rights, as the case of industrial exploitation permits illustrates (Bourgouin, 2014; Fisher, 2007). As was said in chapter one some actors, thanks to their better access to information, technology, financial capital and so on, have easier access to the formalised sector. But rights-based mechanisms can also be used to complement or legitimise structural access mechanisms.

Relational access mechanisms, finally, are constituted through the creation of personal ties which generate benefits. Sara Berry, for example, in her work on land in Ghana (2001) stressed the importance of social relations for being included or excluded from certain kinds of benefits. In this dissertation the relational access mechanism is an important tool to study gold mining and trade. It draws attention to the fact that actors instrumentally build and maintain particular relations with the specific goal of obtaining benefits. In chapter ten I distinguish

⁷¹ See section 1.3 and 3.3.

⁷² See section 1.3.

between 'vertical' and 'horizontal' relations, the former being ties to power holders; the latter being relations with friends, family or colleagues. Both are instrumental for the ability to benefit, albeit at different scales. Chapter nine focuses on a very specific type of relationship between miners and traders, while other chapters give a number of examples in which relational access mechanisms are complementary to structural and rights-based access mechanisms.

3.3. POWER, AUTHORITY AND LEGITIMACY

As has become clear from the previous section, a theory of access explicitly brings 'power' into the picture. Power, in a first sense, is the capacity of some actors to modify, use, consume or destroy things (Foucault, 1994b: 337), or to "affect the practices and ideas of others" (Ribot and Peluso, 2003: 155). But power also emerges from people and the relationships between people. Power is not a fixed attribute, but a dynamic product developed within the relational sphere (Foucault, 1994b: 340; Long, 2001). It is shaped through social interactions and sustained by specific normative orders. In turn, an individual's or group's power position determines who obtains access, and to what extent (Ribot and Peluso, 2003: 158). Power has, in other words, both a structural and a relational dimension.

If we then look at rights, the third component in the access analysis, we find that this concept is intrinsically linked to authority (see figure 1). Individual claimants who seek to have their property claims authorised, turn to politico-legal institutions that may grant or deny legitimacy to their property claims. These claims are important for the constitution of authority (Sikor and Lund, 2009). Indeed, these politico-legal institutions also look for claims to authorise. Consequently, the study of "the processes whereby rights over land and other resources are settled and contested" is equally a study of how public authority is constituted, and thus a study of state formation (Lund, 2008: 3). State formation is a patchy process, and not necessarily straightforward. As von Benda-Beckmann and von Benda-Beckmann (2006: 11) observed, the state, state agents and state resources, are "embedded in wider structures in social organisation entangling state law with other types of law". The agents may operate as state representatives as well as in other capacities. The emerging picture, the authors wrote,

"is that of a state which manifests itself – and is treated by the local population - as a fractured, potentially powerful, but also manipulable set of players, sometimes considered useful, rarely considered reliable and always to be treated with suspicion" (idem).

A central concept in the constitution of authority is legitimacy, which was defined in section 1.3 as being in accordance with the practices, norms and values of a particular group. This is an empirical definition, in the sense that it perceives legitimacy through the lense of that particular group. So the group members can grant legitimacy, but they may just as well take it away. As such, legitimacy is constantly (re)established through negotiation and conflict and the notion is historically contingent and fluid. In turn, those who are in power seek to legitimise their activities, and in this sense authority may be conceptualised as "successfully legitimised power" (Sikor and Lund, 2009: 8) or an instance of power that is associated with "at least a minimum voluntary compliance and is thus sought to be legitimated in some way" (Lund,

2008: 3). Sikor and Lund (2009) therefore wrote about 'legitimising practices' instead of legitimacy. These practices may be successful, and thus lead to legitimisation, or not.

These findings are important for example when discussing access to land. All over Sub-Saharan Africa, land has become scarcer as a result of population growth, environmental degradation and slow economic development. This has led to increasing competition, not only over the land itself, but also about who has the legitimate authority to govern the land. As Sara Berry (2001) stated in her book on property and power in Asante, struggles over land are not only about access to land as a factor of production, but also about the control of people, power and authority. Property, she said, "appears as a multidimensional social process in which people debate and negotiate the constitution of authority, the distribution of wealth, and the relationships between them" (idem: xxx). Property is constantly negotiated, she added, but those who participate in these negotiations do not necessarily do so on equal terms. The latter point is important and relates back to the issue of power and, using the access vocabulary, access control.

3.4. ACCESS MAINTENANCE AND ACCESS CONTROL

In order to clarify the 'power' dimension of access relations, Ribot and Peluso (2003: 158) distinguished between access 'control' and access 'maintenance', the former being the ability to mediate other people's access (by people in power positions), while the latter encompasses attempts to keep a particular resource access open (by less powerful actors who need to gain access through someone else). A third process, gaining access, refers to the more general process through which people establish access, and is thus actually the first step in the ability to benefit. Ribot and Peluso drew an explicit parallel between the relationship between control and maintenance on the one hand, and the relationship between those who own capital and those who labour with other people's capital or means of production, in the Marxist sense, on the other hand. In both cases, the authors said, the division of benefits is negotiated in the relation between the two sets of actors. Moreover, those who need to maintain access may transfer some benefits to those who are in control, in an attempt to keep their access open. But Ribot and Peluso did not interpret this relationship as a class difference, as one individual may hold a 'bundle of powers' which both involves mechanisms to control and to maintain access. In other words, "this person will be in a dominant position with respect to some actors and in a subordinate position to others" (idem), so people cannot be divided neatly into classes. And power may not only vary from one relationship to another, it may also vary over time. Changing external, political-economic circumstances may thus change individuals' or groups' ability to benefit. In this sense, access theory offers possibilities for a subtle and contextualised analysis of power and agency.

Through access maintenance actors attempt to keep a particular access open to them, in other words, to continue benefiting from it. To that end they may apply different access mechanisms, categorised earlier as structural, relational or rights-based. Access control is about mediating, facilitating or blocking other people's access. Indeed, those holding the power to mediate or facilitate access for some, per definition also have the power to exclude others (Hall et al, 2011). Exclusion may happen in a very explicit way, by physically blocking access. But more often it is a subtle process which involves a number of 'control mechanisms'.

Peluso and Lund (2011: 668) thus identified four control mechanisms, defined as "practices that fix or consolidate forms of access, claiming, and exclusion for some time", namely privatisation, legalisation, territorialisation and violence. As I will show they partly overlap and in some instances they may compete and contradict each other. There are also clear connections with the abovementioned access mechanisms. Besides, whereas most of the time these mechanisms are used for controlling and blocking people's access, they may just as well serve the purpose of access maintenance as will become clear later.

These mechanisms have been discussed under different names and refer back to a long tradition of political economics and political ecology, which has been touched upon in section 1.5. Throughout the dissertation I will use the concepts as they are presented below. The first mechanism includes "processes of enclosure, primitive accumulation and privatisation" (idem). Enclosing spaces or resources with the aim of securing access for the actors in control is not new (think about the enclosures in medieval England), but the authors argued that the current political-economic context of neoliberalism is. This context has increased the scale of enclosures and enhanced the commodification of all resources, including the privatisation of public spaces. In a similar way, Heynen and Robbins (2005) identified four dominant relations that characterise the neoliberal agenda, namely governance, privatisation, enclosure and valuation (or commodification). This mechanism in other words refers back to the privatisation and formalisation of property rights⁷³. It also relates to structural access mechanisms, in particular access to financial capital, which is of course central to the processes of accumulation and commodification. A second group of mechanisms, albeit closely related to the first group, is 'legalisation and institutionalisation'. While enclosure dispossesses users from their land, legalisation is more subtle in that it dispossesses claimants without 'legal titles', i.e. claimants who cannot revert to the authority of the state or another authority to legitimise their claims. In this sense it can be interpreted as a rights-based access mechanism. The outcome resembles privatisation processes as the poor and powerless usually lack legal titles and are thus more vulnerable to dispossession⁷⁴. 'Territorialisation' is the third mechanism. It refers to the production of bundles of powers for restricting access, to the ability to "draw boundaries around the objects and people within those boundaries" (idem: 673). Territorialisation is a collective claim and may be considered as an explicit move to 'governmentalise' space, in the sense of Foucault (1994a), to govern and control territory. Sikor and Lund (2009: 14) defined territoriality as "the control of spatial ordering and the control of people in space combining different techniques and policies of classification, registration and mapping". This is not only done by government structures, but by a variety of institutions competing for authority (Lund, 2006). The fourth and last mechanism is 'violence and militarisation', which is "a major component in the making of territory, property, and, of course, the state" (Peluso and Lund, 2011: 676). This mechanism echoes some characteristics of Tilly-like perspectives on state formation⁷⁵, as advanced by authors who put forward the 'transformative' power of war and violence and who argue that rebel groups may 'better' protect property rights than the state. The former may thus be conceived as more legitimate in the eyes of the local population (Raeymaekers, 2007; for a critical discussion see Meagher,

⁷³ See section 1.4.

⁷⁴ See section 1.5.

⁷⁵ See section 1.3.

2012). Violence in this sense may be used as a rights-based access mechanism, being 'legal' or 'illegal', depending on the point of view of the observer.

3.5. AGENCY AND ELITE CAPTURE

These control mechanisms involve clear instances of 'elite capture', defined as situations "where elites manipulate the decision-making arena and agenda and obtain most of the benefits" (Wong, 2010: 3). Platteau (2004: 223) suggested four factors that may explain elite domination: disparate access to economic resources, asymmetrical social positions, varying levels of knowledge of political protocols and different education attainment in some cases. These factors mean that elites often tend to 'bend the rules of the game' in their favour. Indeed, the plural institutional landscape and the negotiability of norms frequently reinforce and reproduce social inequality as elites use them for reinforcing their own power position and accumulating economic resources for themselves (Peters, 2004; Cleaver, 2012)⁷⁶. Borras and Franco (2012: 49) described the same process when talking about land grabs:

"We see dominant social classes and groups (e.g. landlords, capitalists, traditional village chiefs) and state bureaucrats who, in various ways, have some pre-existing private access to and/or control over land resources, trying to cash in on revalued land property either by consolidating and expanding landholdings and selling or leasing them out to new investors, or by incorporating themselves in the new food and energy agro-industrial complex in a variety of ways."

In this sense, 'elite capture' may be defined as 'access control by elites'. In acquiring access control, elites rely on rights-based, structural or relational mechanisms: they use their access to financial capital, claims to legitimacy and relations with power holders at higher level. Yet their control position is also challenged at certain moments. They may lose control and be forced (back) into a position of access maintenance, while new elites take over control. In this context the vision of James Scott (1995) needs to be briefly introduced. Scott criticised the 'theory of false consciousness', which asserts that the powerful make the subordinates believe that the social reality in which they live is both natural and inevitable. Scott, however, acknowledged that there are obstacles to resistance, yet these are not to be found in the beliefs of the subordinates. This led him to his theory on 'public' and 'hidden transcripts', the former being norms, discourse and practices that characterise the open interaction between subordinates and those who dominate, the latter being a set of offstage speeches, gestures and practices among subordinates, as a critique of power.

While the hidden transcript is taking place 'offstage', beyond direct observation by power holders, it can sometimes, though rarely, be spoken publicly and directly. When it is thus spoken out for the first time, it "carries the force of a symbolic declaration of war" (Scott, 1995: 8) and it might produce a political breakthrough. Hidden transcripts are specific to a social site and a set of actors, they include not only speech, but a whole set of practices, and the zone between hidden and public is a constant struggle. Scott showed how in many stratified societies, there appears to be a lot of compliance with the hegemonic norms and discourses. At first glance, the 'public transcript' is confirmed over and over again. It seems as

⁷⁶ See section 1.3.

if the subordinates have completely interiorised the norms and discourses of the dominant. But in reality, subordinates wear a 'mask' in the face of power, and engage in "everyday, lowprofile acts of resistance", which Scott calls 'infrapolitics'. In short, Scott places much emphasis on the 'agency' of subordinate groups.

Actor-oriented sociologists view human beings as social agents capable of solving problems, taking decisions and intervening in the social world around them. It also underpins the capabilities-approach advocated for by Sen (1999) and Nussbaum (2003). The notion of agency "attributes to the individual actor a capacity to process social experience and to devise ways of coping with life, even under the most extreme forms of coercion" (Long, 2001: 16). Actors thus have the knowledgeability and the capacity to assess problematic situations and formulate appropriate responses. For example, the mechanism of 'forum shopping' reveals quite some agency, as actors play upon the normative registers that are available to them, in order to address the one that will best serve their interests. In the view of Cleaver (2001: 29) though, this process is less 'conscious' or rational than the above may suggest. Her actors are 'bricoleurs' having multiple social identities and applying their knowledge, power and agency in different ways, consciously and unconsciously acting upon the circumstances that confront them. Thereby they do not 'invent' or 'craft' new institutions, but they "reduce the cognitive effort involved in responding to change by drawing on and adapting existing norms and mechanisms to new purposes" (idem), which brings us back to the concept of bricolage. On the other hand, an individual's agency is also determined by his or her access to resources, by power relations and by the prevailing normative orders. As such, agency is constrained. For example, a 'forum shopping individual' will find that not all normative registers are available to him or her. As I have indicated before, the formalised, state-recognised property rights often favour elites, and are not easily accessible to less powerful actors.

3.6. PUTTING THE FRAME TO WORK

As I have explained in the previous chapter, artisanal gold mining and gold trade in eastern DRC have almost exclusively been analysed in terms of their relation to violent conflict. This view, based on a reality that should nevertheless been nuanced both in time and in space, blurs many of the important micro-dynamics of the sector. It insists upon a characterisation of the sector as being 'informal' and 'illegal', which is not helpful as an analytical device. Certainly, the mining and trading activities under description take place outside of the state's legal framework and are unrecorded, but it is clear that they are benefiting tens if not hundreds of thousands of people in eastern DRC. A first task will thus be to determine what exactly are the 'benefits' here. Since data on artisanal mining production and miners' incomes are very erratic and difficult to obtain, as I will explain later, I will try to make a direct and indirect assessment on the basis of available data. I will also show that profit margins along the commodity chain are relatively small. But both at the production level and at the trade level, it will become clear that the benefits are much broader than just economic profit, which is one of the important arguments this dissertation makes⁷⁷. But the interesting question for me is not only how much these people benefit from the activities, but also how they do it, given the context that is extremely constraining (legislation is not implemented, absence of

⁷⁷ Ribot (1998) for example defined the benefits of the charcoal commodity chain in terms of cash income and profits.

infrastructure, economic crisis, inability of state to provide services, insecurity and so on). This question implies looking at institutions and norms at the structural level, power relations at the societal level and actors' practices and agency. The concepts introduced in this chapter allow for a balanced analysis of all these aspects.

Parts two, three and four of this dissertation thus include an access analysis of artisanal gold mining and the gold trade in South Kivu; the concept of 'access' being used in two ways. First of all it structures the empirical material and guarantees a persistent focus on the main research question: what are the access and control mechanisms for actors in the gold sector and how does access change? In other words: how do artisanal gold miners and traders, but also state agents, chiefs and other elites benefit from gold mining and trade and which norms and power relations shape their ability to benefit?

Second, access is used as a theoretical and analytical tool that allows drawing some conclusions on agency, power and norms in the gold sector. Power is central to my conceptual framework, as shown on figure 1. It is the dimension that helps us understand the difference between the right to benefit from things and the actual ability to benefit. So one should not only look at claims and rights, but also at structures and relations that enable or constrain people in acting upon these claims, or having these claims translated into real access. Inversely, people holding real access can also seek to legitimise their claims, and thereby constitute authority. This is not merely a rhetorical shift; it has real effects in terms of state formation. The means by which people gain, maintain or control access are the access (and control) mechanisms. This chapter has introduced a categorisation for these mechanisms into right-based, structural and relational, and has also defined some specific control mechanisms such as privatisation (often being structural), legalisation (being rights-based), territorialisation and violence. But as this study will show, all these mechanisms are complementary and may overlap. Control – the ability to exclude other people from access – is never definitively established. Control and power can be challenged and taken over by others, while maintenance mechanisms - the ability to keep your own resource access open - may grow very strong (in the sense of being effective) at some moments. Power is again central to understanding the difference between control and maintenance. Although control and maintenance almost always coincide, they are not present in the same degree. The proportion between and the configuration of access and control changes over time. At certain moments, one of the two may take the upper hand - which one, depends on the broader political economy (macroeconomic context, governance context, national and international policies and so on) as well as on the local political economy (socio-economic context, position of local elites and so on). It is this exact process that shows us who the 'winners' and the 'losers' are in the struggles over resources, in this case the gold, and it is this process I aim to analyse in parts two, three and four of this study.

In conclusion, I believe access theory has a number of characteristics that make it well suited to be used in this dissertation. First, access is not a normative concept and allows for an empirically grounded analysis. Second, it says something about the relation between people and resources (the benefits people draw from a resource) and is thus focused enough for this research (as compared to looking at all aspects of an individual's or household's livelihood). Third, it explicitly looks at power relations and sees these as bundles of powers which each

individual holds and which involve both mechanisms to control and to maintain access, varying from one relationship to another as well as over time. Fourth, a focus on 'access mechanisms' or the processes, means and relations through which people gain access, also implies that attention is paid to agency. So in brief, access theory allows for a contextualised analysis of power and agency.

CHAPTER 4. GOING UNDERGROUND: SOME METHODOLOGICAL ASPECTS

"Attendez que vous ayez mené, comme moi, pendant neuf mois, la vie de placers, passant le jour dans une tranchée, la pioche à la main, la nuit sous un chêne vert, faisant vous-même votre pot bouille, pourvoyant vous-même à tous vos besoins... Vous verrez alors ce que seront devenus votre paletot, votre chevelure, votre barbe, votre visage. Vous reconnaîtrez alors que, dans ces conditions, un homme, fût-il Belge, ressemble quelque peu à un sauvage. Je dois avouer que je négligeais entièrement le soin de ma personne, tout absorbé que j'étais par une seule passion: la recherche de l'or" (p.117-118).

"Wait until you have spent here nine months, spending the day in a pit, pickaxe in your hand, spending the night under a green oak, making your own dinner, looking after yourself... You will see what will happen to your coat, your hair, your beard, your face. You will acknowledge that under such circumstances, even a Belgian will start looking like a savage. I had to admit that I completely neglected my appearance, driven as I was by this one passion: the search for gold" (p.117-118).

In this chapter I describe how I approached the field and how I collected and analysed my data. It highlights some emotional, ethical and practical challenges, as well as purely methodological challenges, and the techniques used to deal with these.

4.1. 'FAIRE LE TERRAIN'

'Going into the field' may evoke images of an adventurous undertaking, and bringing heroic stories back home is part of it. And it definitely is an adventure, with unexpected turns, exceptional experiences and memorable contacts. But more often than that, it involves long hours of waiting for an appointment, frustration over things you do not understand and cannot control, disappointment and boredom. Over the years I learned to cope with some of these, to "roll with it", as Thomson et al (2013: 3) say in their introduction to a volume on "the story behind the findings". I found myself surprisingly patient and flexible in some situations, but what remained was the frustration that there is so much you do not understand. So let this be a warning right from the beginning, and let me stress that my interpretation and analysis of actions, behaviour and words is grounded in thorough empirical research, but is inevitably biased too. The empirical data were gathered over a period of about 12 months in the field (in March-April 2008, July-August 2009, March-April 2010, January-February 2011, October-November 2011, May-June 2012 and September-October 2012). But let me first reflect on a few biases that I feel have been present in my study. Reflexivity, as Davies (2008: 4) argues, means a "turning back on oneself" and is necessary since the research process and research results are inevitably affected by the identity, personality and background of the researcher. According to Alvesson and Sköldberg (2000: 5) reflexivity manifests itself first in the consciousness that all data are the result of interpretation⁷⁸, and second in awareness of one's self.

It is impossible to disguise one's identity as a young, white, female PhD student in eastern DRC, and this comes with the expected prejudices, but also with some advantages. Without getting lost in self-analysis, let me say a few words about how these pieces of my identity puzzle

⁷⁸ See section 4.6.

impacted upon my research. Being white in Africa inevitably produces a state of inequality, as it gives access to a range of material and symbolic goods which are normally not available to the people you meet (Jourdan, 2013: 13). In the exchange with miners and traders, the most difficult and tiring aspect was to deal with people's expectations. Everyone has expectations when a white person walks into his place. Miners would ask me whether I had come to buy gold, to start up development projects, or to invest in a mining company, whether I was going to lobby for them or arrange a job. The statement that I was just doing research seemed strange to them, and the argument that I did not have unlimited access to funds, that I did not have a private car and a beautiful house, seemed very unlikely in their eyes.

The French word for researcher, 'chercheur', is also used for someone who searches for gold. So the miners, conceiving themselves as 'chercheurs' too, wondered what the hell I was looking for, if it were not for gold. When I returned to a mine for the second or third time, miners would gently laugh in my face and say: "you are a 'chercheur', but when are you finally going to find what you are looking for?" At least they had the hope of striking a rich gold vein, but I could only answer that I would never stop searching, because I would indeed never find everything I was looking for.

Of course these anecdotes raise questions about the reciprocity of my work, the question as to whether researchers can 'give back'. This is an issue most researchers struggle with (different chapters in Thomson et al, 2013), and we all try to solve in our own way, though we know that it is unsatisfactory most of the time. To be brief, I found that 'coming back' to the research site was already a first and important step in giving back. People showed that they were happy and flattered to see that I had made the effort to come back, although I could give back little more than a scientific article. Indeed, I did take some articles I published in French to the mining sites and shared them with interviewees. They generally were happy to see some tangible result of the research. A few key resource people carefully read the publications and provided helpful comments. I also found that sharing information and contacts was a much appreciated way of giving back. I put people in touch with associations and NGOs, and sometimes circulated information and reports. I participated in a number of seminars organised by local NGOs or by the Catholic University of Bukavu. One of the things that also helped in this process of 'giving back' was the fact that I taught two courses on qualitative methodology and governance of the mining sector in the master programme in Public Administration and Development Studies at the Catholic University of Bukavu. Although this was in the first place giving back to a select public of master students, I also shared the teaching material with many other respondents. Having access to (scientific) literature may be obvious for us, but it is considered one of the greatest riches by many Congolese. When I took up these teaching assignments, I also felt people treated me with more respect. In Congolese society hierarchy is very important, and it was as if I had moved one step up from being a student to being a lecturer. One anecdote stands out here though, as it illustrates how painfully simple it can sometimes be to give back, but it also says a lot about the difficult conditions in which some interviewees must work. In May 2012, during one of my visits to the offices of the Provincial Mining Division in Bukavu, I was talking to the newly appointed Director. He was complaining about the difficult circumstances in which they had to work – and one gaze around his office was enough to convince me - and told me that he did not even have a copy of the Mining Code at his disposal. His predecessor had taken home the only copy of the document in the office. The Director had no laptop either. The next day I gave him an electronic copy and he went to the internet café to print out the document. This very small gesture turned out to be not only positive for him, but for me too, as he now became even more sympathetic to me than before.

Going to the field in my case literally meant going underground. Women are normally not allowed in mining shafts, and this fact is surrounded by a range of rituals: their presence is believed to make the gold disappear, especially when they are having their period, miners have to wash themselves thoroughly if they had sexual intercourse before descending into the pit because their smell has the same effects, and so on (Cuvelier, 2011b: 179). The prohibition of women entering the underground mines is thus partly caused by spiritual beliefs. But it also has to do with the mere pragmatism of working conditions in a mining shaft: the hard physical labour, the dirt and the unhygienic conditions. When I went down into a mining shaft, some people would shout at the shaft manager that his gold would disappear, or on the contrary that now he would strike it rich. People also saw causal relations where there were none, and would tell me that they found a big quantity of gold after my previous visit. Once before I descended, I asked why they let me in, and a man answered that I was not a woman: "look at you, you are wearing trousers and climbing these rocks like a man".

This is where being a white woman turned out to be an advantage. The miners and traders I visited often enjoyed talking to a young white woman. It brought some excitement to their daily life and gave them an occasion to joke and to compete with each other for my attention. Surely, the latter aspect was important, especially in the context of a mining site, which is characterised by a high level of machismo. Marriage requests were legion, and while in the beginning I was somewhat intimidated by this kind of attention, I and my research assistant soon learned to give appropriate answers and make these kinds of remarks the start of a more interesting conversation.

4.2. 'FAIRE LE SOUTERRAIN'

In this section I elaborate on what it means to go 'underground' in the more metaphoric sense. I describe how I tried to 'dig deeper' in assessing and possibly countering the meta-narrative on mining in Congo. In section 2.1 I already said that Congo's minerals have a 'bloody' reputation and, especially since the early 2000s, have been associated with conflict. A meta-narrative on 'conflict gold' had thus been created and the topic was 'claimed' in the public arena by some NGOs, advocacy organisations and the UN Group of Experts. Since 2001 the latter has issued critical reports on the link between the trade in minerals and conflict, based on numerous and detailed pieces of information, and has threatened with sanctions against some traders whom they accused of smuggling, trading conflict resources and arms, and financing the war effort. When I approached some of these traders to interview them, their reaction was, quite understandably, one of suspicion at least and sometimes one of outright refusal. The following quote comes from a trader based in a popular neighbourhood in Bukavu, whose buying office was not explicitly mentioned in the UN report:

"I would like to help you, but I hesitate. I don't know who you are, for whom you work. You know Bukavu yourself. I can open myself up to you, and tomorrow I may be attacked by

bandits, armed robbers... Moreover, according to the international opinion mineral exploitation is the cause of the war in the DRC. Who knows? You could be among those who ask questions on behalf of the international community as wellⁿ⁷⁹.

This kind of suspicion was particularly present in Bukavu and also in Bujumbura. The 'higher up' in the gold 'commodity chain', the more traders have to lose, and the more they are conscious of what the international community thinks of them. Some also referred to instructions they were given by others:

"I am a bit reluctant because our president [of the trader's association] told us that some people are doing political stuff. If they pass we should not let them in. Now I already let you in, but still I want to ask whether you are here for political reasons. [...] He told us that white people ask questions about where the gold passes, so that they can lock those routes, and stop mining activities here, since they say that these activities are financing Hutu"⁸⁰.

It is no coincidence that both these quotes were recorded in July 2009. Just before, Global Witness had published the report "Faced with a gun, what can you do?" on the militarisation of mining sites in the Kivus. While making some valid points about militarisation and human rights abuses in mines, the report tended to generalise the situation and picture all mines in the region as conflict mines, and all traders as criminals. This visibly caused unrest and frustration among the Bukavu traders, most of whom are indeed involved in smuggling activities, but it is difficult to determine the extent to which they are also involved in criminal or military activities. This was not the objective of my study either, as the conceptual framework I used already taught me that interpretation of what is legal, illegal, criminal or illegitimate requires the necessary nuance.

So the way in which the topic had been claimed, written and talked about (the meta-narrative on 'conflict gold') definitely had an effect on the way in which I could approach it. Some respondents were reluctant to talk, especially those with more important economic positions based in Bukavu and Bujumbura. Given the sensitivity of the issue I decided not to insist for example on meeting traders like Mange, Shamamba and Mutoka, two Bukavu-based and one Bujumbura-based traders who are explicitly mentioned in different UN reports. While it is within the mandate of the UN Group of Experts to follow up on the sanctions regime and denounce criminal and illegal practices by individual gold traders, this was not the aim of my study. In the mining sites themselves it was much easier to get people to talk. Miners and traders here may have been less directly affected by what 'the international community' thinks of them. Besides, I always stayed for at least a few days and was careful in first 'making myself known', by just walking around and having informal talks. This way the information about my presence circulated more rapidly and some initial good contacts created trust among other potential respondents. I personally experienced the drawbacks of doing 'half-a-day' visits when I participated in a consultancy assignment on mining in Province Orientale, outside my PhD research. We had little time to visit a large mine, where people welcomed us with hostility. They said they were fed up with all these researchers and journalists coming to ask a few questions and take some pictures, and then leaving and writing negative articles about them.

⁷⁹ Interview with trader, Bukavu, 24/07/2009.

⁸⁰ Interview with trader, Bukavu, 29/07/2009.

But the meta-narrative also had an effect on the way in which I presented my study. Along the way I started to feel that doing this kind of bottom-up research would give me some 'ammunition' to assess the prevailing narrative. This narrative was sustained by the subsequent UN Panels of Experts, acting upon a mandate to monitor sanctions and the arms embargo, but also by a range of NGOs and advocacy groups like Enough Project, Global Witness and Free the Slaves⁸¹. Without disputing the validity of some of their work, I felt that these NGO reports often give blunt accounts. It seems as if they are just looking for cases that confirm or sustain the meta-narrative. Local researchers who had acted as consultants for these kinds of organisations confided to me that "these organisations already have a picture in mind they just want you to confirm. We know what they want to hear, and we give them the stories"82. If this is indeed the case, then more fine-grained and nuanced accounts of what is happening in South Kivu's gold sector are desperately needed. It is true that the analysis I provide in this study is quite ambiguous in the sense that it tries to unravel all the complexities and contradictions in the organisation of artisanal gold mining and trade, and thereby does not allow to make blunt statements about the 'winners' and 'losers' in these activities. In this respect it may be somewhat inconvenient for policymakers. Yet in chapter thirteen I do translate my empirical findings into a number of statements that can hopefully be relevant for policymaking. This is what I can offer and give back to the miners and traders.

These first two sections addressed some ethical and emotional challenges. Apart from that there were obviously practical challenges. The mines were difficult to access. Getting there sometimes involved a whole day on the back of a motorbike, a three hour walk over steep hills, or half a day in an overloaded truck or minibus, and a lot of patience. Housing conditions in the field were not always comfortable, and walking around in the mining sites and going down into the pits was physically challenging as well. I went not only to the field, but also into the underground, 'le terrain et le souterrain' in French, literally and metaphorically: by digging deeper into what people were doing, what they were saying and what they meant to say. As Ellis and MacGaffey (1996: 20) said, 'informal economic activity' is by its nature difficult to study and measure, but the authors argue for a bottom-up approach, studying the activities of individual traders in order to make sense of more general patterns. I actually consider my research as a kind of mining project itself, in which I first had to explore for the best sites and resource persons, follow the richest gold veins, carve out the rocks and then treat them, so as to be left with the gold. For that reason I will proceed in this methodological section by taking up the roles of specialised miners involved in all these phases: the 'prospecteur', the 'conducteur', the 'bout de feu', the 'foreur' and the 'panneur'.

⁸¹ See different reports on their respective websites: http://www.enoughproject.org/,

http://www.globalwitness.org/, https://www.freetheslaves.net/SSLPage.aspx.

⁸² Interview with local researcher, Bukavu, 26/07/2009.

4.3. 'PROSPECTEUR'

The 'prospecteur' is the explorer. He uses specialised techniques to search for the richest gold veins that can be exploited in an artisanal way. He takes soil samples, selects a team, and decides where the team will start to dig.

My first task was to identify a research site. Having arrived in Bukavu for the first time, I visited the public offices dealing with the mining sector, as well as some export offices and mineral traders. It occurred to me that the commodity chain for cassiterite, coltan and wolframite, and the gold commodity chain were very different, mainly because of the nature of the commodities. In terms of export (value), cassiterite seemed to be the most important mineral in South Kivu when looking at official export figures. Yet interviews quickly revealed that gold might be much more important, but that almost all gold produced in South Kivu is smuggled out. Gold has also a symbolic value, and a value as hard currency and source of foreign exchange. All this triggered my interest in focusing on the gold sector. In the course of the research two other reasons surfaced: I discovered that production modes and organisation at the level of extraction also vary between commodity chains, and I observed a multinational gold mining company entering the stage, which engendered a whole new dynamic in the sector.

Map 1 indicates the location of my research sites. I first chose Kamituga, which is historically the most important gold mining town in South Kivu. Vlassenroot and Raeymaekers (2004) already described the militarisation of artisanal mining and trade during the second war. Following up on their research, it seemed interesting to me to visit this site again and look at what had happened since, and to study the organisation of production and trade more indepth. Still Kamituga was obviously not to be understood in isolation, but in connection to other geographical spaces, and to its own history. Later I also selected the Twangiza concession, stretching out over Luhwindja, Burhinyi, Kaziba and Ngweshe chiefdoms. In this site industrial production was limited in the past, but the Canadian gold mining company Banro has now proceeded into the exploitation phase and is concentrating its activities in Luhwindja. The nature of customary power here also differs from Kamituga, as will become clear. Finally I sampled the site of Mukungwe, where gold has been extracted artisanally since the 1970s and violent conflicts over these mines have persisted until today.

The divergent historical trajectories and structural characteristics are thus a first justification for the choice of these case studies. I agree with Gillian Hart (2002: 9) that "histories of place are never just a straightforward accounting of 'the facts'. [...] They are always multiple, contested, deeply politicised, produced in specific contexts, and made to serve the needs of the present." But this is precisely their relevance. They help us to understand current events and relations by showing that "places are always formed through relations with wider arenas and other places; boundaries are always socially constructed and contested; and the specificity of place – however defined – arises from the particularity of interrelations with what lies beyond it, that come into conjuncture in specific ways" (Hart, 2006: 995). Based on Lefebvre's conception of place as "nodal points of connection on socially produced space", Gillian Hart

(2006: 996) argued that a case study can move beyond very local and particular observations to make broader claims:

"In this conception, particularities or specificities arise through *interrelations* between objects, events, places, and identities; and it is through clarifying how these relations are produced and changed in practice that close study of a particular part can generate broader claims and understandings."

The assumption that case studies would not be generalisable and can only generate hypotheses which then need to be tested using different methods that are more suited for theory building, was radically refuted by Flyvbjerg (2006). In his article "Five misunderstanding about case-study research" he thoroughly deconstructed the usual arguments against case-study research – apart from non-generalisability and hypothesis building instead of theory building, there is the claim that theoretical knowledge is more valuable than practical knowledge, that case-study research contains a bias towards verification and that it is difficult to summarise specific case studies -. Instead, he argued that large numbers of well-executed case studies are necessary for the systematic production of exemplars and that context-dependent knowledge is more valuable than the search for predictive and universal theories. In a similar way Olivier de Sardan (2005: 31) argued that specific analyses of local realities are needed, but that does not exclude the fact that 'typologies' can be constituted on the basis of common characteristics.

When wandering around the empirical details of my case-study sites, I interpret their particularities as outcomes of historical, institutional and political processes that are grounded in local, national and global realities. One of the dimensions of these realities is the relation between artisanal and industrial actors and modes of production. The second reason for choosing these three case-study sites was indeed the fact that they occupy a particular position in the current 'artisanal versus industrial' landscape in South Kivu. Twangiza (Luhwindja chiefdom) was the first mine where Banro entered into production. The struggles between the company and the artisanal miners here may serve as an example and possibly a warning for the other parts of the concession, in the first place Kamituga and Lugushwa. In the latter two sites, however, the institutional and power landscapes are quite different and industrial exploitation historically occupied a much more important place. Mukungwe, finally, is highly contested between different customary, political and military power holders and also opposes the artisanal miners and Banro. The case studies nicely illustrate how one 'external event', namely the arrival of Banro, may play out differently in three different places and may thus contribute to a more general understanding of artisanal and industrial mining. According to Flyvbjerg (2006: 229) generalisability can be obtained in case-study research by a careful selection of the cases, which is often based on prior knowledge or experience. The cases I have selected are 'critical cases' in his terminology, or cases "having strategic importance in relation to the general problem" (idem). I first selected Kamituga, which had drawn my attention through the research done by Koen Vlassenroot and Timothy Raeymaekers. After two fieldwork periods in Kamituga and Bukavu, I also selected Luhwindja, because I had learned about its past and about the fact that Banro had started its activities there. The third case I selected was Mukungwe because people used to refer to it a lot and describe the site as conflict-ridden.

A third reason for choosing these particular mining sites was their importance in terms of volumes of gold produced and numbers of people working in gold mining and related services. On the basis of the figures I have for production in Twangiza, Kamituga and Mukungwe, with all the limitations they present and that have been discussed in section 2.3 I come to the following estimations. Total artisanal gold production in South Kivu province has been estimated at 4800 kg (yearly average). The best estimate we have for production in Twangiza is 628 kg, for Kamituga 618 kg and for Mukungwe 480 kg. This means that the sites I selected cover at least 1746 kg, or more than one third of artisanal gold production. Kamituga is also the largest mining town in the province, with somewhere between 100,000 and 150,000 inhabitants now, up from about 56,000 before the war.

With this site sample, I do not want to claim representativeness, nor generalisability over the entire province. Still I am convinced that these three case studies teach us something about artisanal mining and about the articulation between artisanal and industrial mining, something that has broader relevance in the context of the DRC, at least. The three main selection criteria are clear, and show that the cases I selected are exemplary cases of the access relations I aim to study, in all their diversity. They also account for a considerable share in the total artisanal gold production. Other choices could have been made, for example for sites in Shabunda (which are different, because more remote and more scattered over a vaster territory) or in Fizi (where there are also very large sites and at some places production has been mechanised to a limited extent). But these have been left out of this study, also because I wanted to go more in-depth, and so I had to limit the number of sites.

Following the gold trade up to the provincial and regional level, I also conducted research in Bukavu and in Bujumbura, where most gold from South Kivu transits before being exported to Dubai, East Asia or Europe. Bukavu was actually the operating base where I met traders, people from the mining services and civil society and other researchers. Miners and traders from the interior also frequently travel to Bukavu, either to do business or because their family lives there. Besides it was the place where I was institutionally embedded, as I will show later. In Bujumbura I spent about four weeks in total to study the cross-border flows of gold.

As a 'prospecteur', I also needed to sample interviewees. Upon arrival at a site I first contacted the relevant state and non-state agents in place, and then started with convenience sampling. I found that the most useful method was to 'hang around' a bit and pay a visit to the different shafts, have some informal conversations, and then ask the people who seemed most interesting and open to me to grant me an interview. This is how I approached most miners in and around the gold sites. I did the same for traders, although they were typically more reluctant to talk to me in the first instance. In Kamituga my assistant and I made countless walks up and down the main street, where all the shops are located, and chatted with the gold traders. During our second stay in Kamituga we had won their trust and were able to interview most traders in town, which resulted in a very rich account of local transactions and interactions. The stories of these individual miners and traders enabled me to grasp the microstories and fine grains of practices and norms in gold mining and trade.

When I wanted to go deeper into a particular aspect I selected specific individuals on purpose, or asked my respondents whether they knew someone else who could give me more

information about this. These purposeful and snowball sampling techniques were rather applied in Bukavu than in the mining sites themselves. Since I spent a lot of time in Bukavu, I frequently visited the offices of the mining services, the export houses, and all kinds of conferences and seminars on the mining sector. Here I also established very good contacts with a few key persons. These people, with whom I built up a confidential relationship over the years, with whom I exchanged and followed up on recent events and who invited me to their houses, have been crucial to my general understanding of events and characteristics of the gold sector in South Kivu.

I interviewed (in-depth) 101 artisanal miners and 145 traders in total. I also interviewed 18 community members not involved in mining (in Luhwindja) and organised 20 group interviews with miners and members of the local communities. I talked to 35 respondents who had worked in or currently work in industrial mining. I conducted 30 interviews with respondents in the mining and public services, some of whom I interviewed several times. This also holds true for the interviews with people from civil society, with whom I conducted 25 interviews.

In 2011 I set up a survey, which was carried out by students and researchers of the Catholic University of Bukavu. For this survey we selected 258 male individuals in four mines (47 in Kamituga, 127 in Lugushwa, 18 in Mukungwe and 66 in Luhwindja)⁸³. With respect to the nature of the mining operations, 40 alluvial, 5 open pits and 213 underground shafts were selected. The targeted population consisted of shaft managers, because they are known to have the best 'overview knowledge' about the production and the organisation at the level of the mining site or shaft. Questions were geared towards their work activities and mining projects, instead of towards their personal background, so that we have collected little personal information (socio-demographic characteristics). Whereas the latter may have enabled me to refine some aspects of my analysis, it would also have implied a risk. On the basis of my previous qualitative research, and the fact that the respondents were all in a more or less direct way threatened by displacement, I considered that asking personal details would scare them off, seeing the research team as surveyors working for the company or for the state and collecting this census information with the aim of controlling and displacing them. Given the absence of a sample frame for the population of shaft managers – the public services in charge of mining do not dispose of sufficient means and human resources to keep reliable records of all miners and miners are reluctant to officially register – a randomised sample was not possible. Still on the basis of previous qualitative research in the same sites and data collected through initial informal contacts, the team tried to achieve a certain degree of stratification, in the sense that a fairly representative share of 'big' and 'small' production units (shafts) would be covered. Apart from that guidance respondents were selected on the basis of availability and willingness to participate, or on the basis of 'snowball sampling'. All respondents were found at the work place itself or in the immediate surroundings of the mining site or shaft. Structured interviews however were as much as possible conducted in private, either inside the mining shaft - to hide away the respondents and researcher from curious spectators - or at a quiet place nearby.

⁸³ In the context of this research project the same survey was carried out in Ituri. The results from both the South Kivu and Ituri surveys have been analysed in Geenen et al, 2013.

4.4. 'CONDUCTEUR'

The 'conducteur' is an experienced and knowledgeable miner who uses geological indications to orient the work of the team underground.

My institutional affiliation and collaboration with a number of Congolese researchers has substantially oriented my research. It has not only facilitated the research in a financial⁸⁴ and practical (housing, work space, contacts and research permits) sense, but has also left an intellectual mark. From the beginning I have collaborated with Gabriel Kamundala from the Catholic University of Bukavu. He was acquainted with the sector (having been a coltan trader himself) and his main qualities were his analytical capacity, his curiosity and his ability to quickly gain the trust of our respondents. While in the beginning he tended to translate the respondent's words in summary form, he gradually initiated me into the rich language of the miners, and into the things they said outside the context of the interviews, which were often even more telling. He also assured a thorough follow-up of the field visit by regularly going back and staying in touch with the interviewees. Through the institutional collaboration and a research and training project on mining governance in South Kivu, I also had the opportunity to collaborate with many other researchers and students from Bukavu, who all oriented and influenced my research in their particular ways.

As can be expected when dealing with such a topical issue, the course of the research has also been shaped by developments on the ground. In recent years a multitude of traceability, certification and formalisation initiatives have popped up in eastern DRC. I have always dealt with these developments by using a bottom-up approach, starting with the situation I observed on the ground. This compelled me to be critical about these initiatives, an attitude I have also translated into my contacts with policymakers. To give one example, when I was planning my fourth visit to the field in late 2010 the temporary ban on artisanal mining activities was proclaimed. The ban held both disadvantages and opportunities for my research. On the one hand, it did not allow me to directly observe artisanal mining and trade in Lugushwa and Luhwindja which I had programmed to do. On the other hand, it added a new dimension to my research: a government intervention, and the way this intervention impacted on, and was moulded in, the local context. My field research obliged me to intervene in some of the policy discussions that were going on at that point as well.

4.5. 'BOUT DE FEU'

The 'bouts de feu' open up new shafts and galleries by blowing up hard rocks with dynamite.

These people are in the first place the 'gatekeepers', those who grant permission to have (physical) access to field (Hammersley and Atkinson, 1995: 63-64). They are considered by others as having the authority to grant or block access. They may also attempt to exercise some degree of control or surveillance over the researcher's activities, where he/she goes and whom he/she talks to. Upon arrival in a village or chiefdom in eastern DRC the visitor is always

⁸⁴ Funding for field research was available from a Flemish Interuniversity Council (VLIR) project: an institutional collaboration with the Catholic University of Bukavu.

expected to 'declare his civilities' to the different state, customary and military power holders. It was remarkable and almost entertaining to see how agents of these services time and time again disputed which was the right order to visit them, and how they all claimed "you should see my service first". I felt that the research permits issued by the Catholic University in Bukavu facilitated my access. In any case, apart from the usual 'tracasseries' (harassments) and attempts at making money, I never encountered major problems with state or military agents or customary chiefs. As authors like Englebert (2003) and Trefon (2011) have shown, public services in the DRC have been privatised and are used to secure the personal survival of their agents, resulting in endless negotiations with civilians for all kinds of services (Trefon, 2011: 89). In this sense, I endorse Hammersley and Atkinson (1995: 54) who noted that negotiating access in itself is already a rich source of information, since the way in which people grant or block access and respond to the researcher's presence provides good insights into the research setting's social organisation. In Mukungwe for example, the procedure to gain access was to see the customary chief first, who would then bring us to the military commander in place. The latter was suspicious at first, and had to call his superiors in Bukavu. There were no state representatives to be visited when we first arrived in Mukungwe. This already made clear who the power holders were, and how unstable the security situation was.

There may also be power struggles between researchers and gatekeepers, as the following anecdote shows. In January 2011 I arrived in Kamituga for the third time. Since September 2010 President Kabila had declared a ban on all artisanal mining activities, which had a profoundly negative impact on the entire local economy. Upon arrival, we went to see the local administrator, the 'chef de poste'. The man who occupied this position was a different one than the man I knew from my previous visits. He did not give me a warm welcome and after some complaints about the negative consequences of the ban and the crisis in town, he started to talk about my previous visits. I had talked to all the miners and traders, hadn't I? And I had written reports about it, which I had communicated to national and international policymakers, hadn't I? Did I think it was a coincidence that after my two previous visits the president had decided to stop all artisanal mining activities? From there he suggested that the population in Kamituga blamed me for the ban. He said he did not think people would still be willing to talk to me, since they knew that my work had caused this crisis. He was willing to sign my official letter, but warned me that nobody would want to talk to me anymore. Heavily discouraged I left the town hall and anxiously went to visit some old acquaintances. My research assistant reassured me and said that he could not believe people would have this idea about me, but he would verify. And so in all conversations he asked whether people thought there was someone behind the ban. To my relief, people said it was the president's decision and that he may have been influenced by the United States, but nobody referred to a Belgian academic researcher, even when my assistant talked to them in private and in Swahili. But I could not help wondering whether they kept their 'hidden transcripts' (Scott, 1995) for themselves.

The 'chef de poste' knew he was in a powerful position since he had to officially authorise us to work in Kamituga. He knew that it would be difficult to refuse, given the connections we had with the university, with other people in the local administration, with customary chiefs and so on, but he decided to use the power that was at his disposal to make us uncomfortable, and to let us know that he was in charge. I was in a very dependent position. I obviously feared that I

would not be able to collect my data. But more importantly, I was also personally affected. If there was one thing the articles I had written did not recommend, it was an immediate halt of artisanal mining activities. And yet this was what he accused me of. Wouldn't people understand that the fact of me being here, now, and showing my sympathy, meant that I had not wanted this situation? Wouldn't people see that my engagement was different than those journalists and consultants who make a one-day visit to a mine and then write a report? I was afraid the answer was no, and that people I had talked to two years before would now be disappointed and angry. I felt powerless because I had not been able to counter the metanarrative. Even more, I was perceived as a mouthpiece of that meta-narrative, while my research tried to deconstruct it.

Another kind of 'gatekeepers' are those people who open up new research opportunities and who give access to new information and resources. In my research they have been embodied by some key resource people with whom I have established quite close and personal relationships and who have accepted me as 'part of the family'. These people have given me deeper insights, in the first place in their personal stories, but they have also pointed to aspects that had hitherto remained unnoticed, or they put me into contact with a number of other interviewees. One gold trader in Bukavu taught me almost everything I needed to know on commercialising gold and put me into contact with other traders. A trader in Bujumbura was very honest about his commercial strategies. The president of a traders' association kept me up-to-date about evolutions in South Kivu's mineral trade and thereby showed that he trusted me. A Belgian and a Congolese man who had worked for a mining company from the 1970s until the 1990s provided me with extremely rich historical accounts. The staff of the local NGO OGP in Bukavu facilitated many contacts in the field and their own fieldwork and reports proved to be a rich source of information. Also in Kamituga, Lugushwa, Luhwindja and Mukungwe, there were people who served as gatekeepers to the group of miners, traders, or to the wider community. Obviously it may be dangerous to rely too much on a limited number of people. But my repeated visits promoted, in my view, a relationship of trust, a better comprehension of the entire context from my side, and hence more reliable information. This contributed to a 'thick' description.

4.6. 'FOREUR'

The 'foreur' uses a hammer and chisel to carve out the rocks from the gallery walls. He is the man who gets out the raw material, the empirical data that form the basis of the analysis.

The first data collection method I used was observation. Participant observation is usually considered as the archetypical method in ethnographic research and involves a researcher spending an extended period of time living among the research subjects and participating in their daily activities (Hammersley and Atkinson, 1995: 2). For anthropologists it became the basis for their "claim to special cognitive authority", a legitimisation based on the fact of "having been there" (Davies, 2008: 78; see also Ingelaere, 2012: 68). I certainly cannot claim to have done this kind of participant observation, or to have done ethnographic research, although I have used some ethnographic techniques (Hammersley and Atkinson, 1995). I have also been more than a mere observer, as I already highlighted how the interaction between

me and the interviewees has shaped the research in certain ways, and so considered myself as an "observer-as-participant" (Davies, 2008: 82). Of course I also had many informal conversations, most of the time translated by my assistants. In this role of observer-asparticipant I had no clear strategies. Observation seemed like the most 'natural' method to apply when first arriving in the gold sites, trying to make sense of all these different activities people were carrying out. Over time, it became increasingly clear 'what and how to observe', something that is often an unconscious process (Gobo, 2008: 148). The same goes for 'what and how to write down', and I experimented with different forms of fieldnotes, from jottings to more elaborate personal, analytical and methodological reflections (Emerson et al, 1995). I kept my notes in notebooks, and later transcribed them on the computer and added them to my NVivo project⁸⁵.

Second, I carried out the semi-structured interviews I enumerated above. Interview guides were more structured in the beginning of the research, and became more and more open as I proceeded, because both I and my assistants knew better what questions to ask. When miners and traders were interviewed, their 'personal stories' in the form of – limited – life histories, usually formed the starting point of a discussion of their current living and work conditions, and the way they organise their work (see Ellis and MacGaffey, 1996). It also needs to be mentioned that a number of interviews were carried out with the specific aim of collecting historical data. This resulted in extremely rich interviews with people who were knowledgeable about the history of one of the case-study sites. Almost all the interviews were audio recorded and the research assistants made literal transcriptions and translations of the interviews.

Third, I carried out a number of group interviews and focus groups. Whereas some authors do not make a strict distinction, others distinguish between focus groups, adhering to strict rules about group size, sampling and interaction, and group interviews, where the setting may be more informal and the sampling of participants more ad-hoc (Morgan, 1996). In my case then most of these interviews were group interviews. This was primarily due to practical circumstances in the field: sampling and inviting a fixed number of people to show up at a particular place and time was a major challenge. Most of the time more people would show up, or people would spontaneously join the group out of curiosity or eagerness to raise their voice. Yet these interviews were always semi-structured around a topic list, and provided for interesting interaction between participants.

Fourth, I carried out some quantitative work in collaboration with my partners from the Catholic University of Bukavu. In 2009 we did a small survey with gold traders in Kamituga. We asked them to keep a record of the quantities of gold they bought during the year 2009 in order to assess the total gold production in and around this town. In 2011-2012 we did a survey which included mainly quantitative but also some qualitative questions, all structured. As I mentioned above the survey was carried out among 258 shaft managers in the different gold mines and asked questions about the production of their shafts, their personal revenues and motivations to engage in the sector, and the changes induced by big industrial

⁸⁵ See section 4.6.

companies⁸⁶. The increasing presence of industrial companies – in this case Banro – was the main focus of this study. The collection of quantitative data on artisanal mining is challenging, given the reluctance of miners to provide information and the fact that these activities are unrecorded. For that reason the survey also presents some limitations. It was a survey and not a primary observation over a longer time period, so some costs and profits of the mining project may have been over- or underestimated. In the cleaning and the interpretation of the data we have tried to take this into account as much as possible though, not including the obviously incorrect extremes. It was not a classical impact study, in the sense that we did not intend to measure the impact of industrial mining on artisanal mining or to do an economic cost/benefit analysis of both production modes. We used a variety of parameters to assess the impact the industrial presence has on artisanal activities and we tried to triangulate this information. But we focused on the miners' perceptions of this impact.

Fifth, I collected numerous documents: letters, decrees, reports of seminars and meetings, personal accounts, maps, photographs, statements, statistics, court judgments, newspaper articles. I need to acknowledge all the individuals who have put their personal archives at my disposal. They have been extremely useful, especially in the interpretation of historical events. In this context I particularly want to mention the personal archive of Serge Lammens, former Director of Sominki ('Société Minière et Industrielle du Kivu-Maniema'), which contains personal reflections as well as reports of Sominki's Board meetings and lists of historical events. I also did some research in the MGL archives that can be consulted in the Royal Museum of Central Africa in Tervuren, Belgium. They provide an interesting account of events in the MGL concession in Kamituga in the 1960s and 1970s. Official reports and statistics were – often painstakingly – collected at the various public and technical services. Although official statistic are known to be unreliable and not conform reality, they have their importance since they can be cross-checked and put together with other data (Ellis and MacGaffey, 1996: 28), as I do in section 2.3.

4.7. 'PANNEUR'

The 'panneur' washes the gold-containing sand in an iron plate called 'karai'. By slowly turning the plate around, the heavy gold particles will converge on one side.

The survey data have been analysed by Francine Iragi, who used them for her master's dissertation "Artisanal and small-scale gold mining in South Kivu: a threatened livelihood?" (Institute of Development Policy and Management, University of Antwerp). She analysed the data using Stata software. I have organised and analysed my qualitative data using NVivo software (Bazeley, 2007). NVivo is founded on the principle of 'grounded theory' (Glaser and Strauss, 1967) and enables us to organise data in a systematic way, code them and then seek for linkages and patterns in these codes, so as to let concepts emerge, and eventually generate theories. The most important step, the coding, is still based on the personal interpretation of the researcher, but the software systematises this process and makes it much easier to call up specific information and to search for patterns and relations. Some of the 'codes' or 'categories' I used have effectively emerged from the empirical data. Others were constructed

⁸⁶ See survey questions in annex. They were formulated on the basis of my previous qualitative work and tested in the field.

on the basis of existing theories and concepts, since as the founders of grounded theory already recognised the researcher can never approach reality as a theoretical tabula rasa (Kelle, 2007). Coding in any case is a dynamic process characterised by interaction and comparison, both among data and between data and theories (Richards, 2005).

This interaction and comparison has been a defining aspect of my research project: a constant moving back and forward between research questions, data, and theory, which Ingelaere (2012: 86) called 'iteration'. First, the variety of data collection methods and resulting information enabled me to confront, combine and compare qualitative (mainly) and quantitative data. The rationale for such a combination of methods, or a 'mixed methods' approach may be triangulation or complementarity (Morgan, 2013). Triangulation is the use of different methods to test one hypothesis or study one and the same aspect with the aim of increasing validity. I have used this strategy in my interpretation of production and trade data, as exposed in section 2.3. Complementarity is the use of different methods to study different aspects of the problem or different research questions with the aim of getting a more comprehensive view, a strategy I have applied during the entire research process. Second, the focus of the research and the sharpening of the research questions have also evolved over the years. My initial aim was to study 'the gold commodity chain' in South Kivu, as I wrote in my very first research proposal in 2008. It was only through the processes of data collection and data analysis that some crucial research questions, concepts or angles became apparent. Conversely, the theoretical and conceptual frameworks with which I became acquainted also shaped the collection, analysis and interpretation of the primary data.

I quickly moved beyond a 'value chain analysis' in the sense of Kaplinsky and Morris (2002). The advantage of such a value chain approach is that it is not limited to one sector or one stage in the production or transformation process. It analyses all activities necessary to bring the commodity, in this case the gold, from the digger to the final consumer. In this sense, it offers a structured approach and takes into account all actors involved in the gold chain. Nevertheless, value chain analysis according to me does not provide sufficient instruments to say something about social interaction between the actors, nor about the institutional environment they are acting in, or the broader power relations (although a lot of work has been done on 'governance' in the context of value chains [Gereffi et al, 2005]). My empirically-driven approach caused me to focus more on actors, their practices and their relations, as well as on power and norms, starting from the local level.

I explained the selection of the research sites earlier, and emphasised that it does not claim representativeness for the entire gold sector in South Kivu. Rather than the internal and external validity required in quantitative research, this research adheres to validity criteria used in qualitative research, such as inter-subject comprehensibility (by documentation of and transparency in the research) and empirical foundation (Steinke, 2004: 187).

4.8. SILENCE IS GOLDEN

In my opinion this approach may create more enabling spaces in which to counter the dominant narrative on gold in eastern DRC. In this final section I reflect on the issues of silence, spuriousness and secrecy. Sometimes what is hidden, what is not said, or what is distorted, is more important for the interpretation than what is actually said.

Over the years it became clear to me that the Congolese I met did not disclose all information. They would perhaps lie or be silent on their family or personal background, but especially on their economic activities. For example, in the Congolese context, where everyone fends for himself⁸⁷, it has become natural to be involved in different revenue-generating activities at the same time, and it is strategic not to display too much information on those. You should not 'lay all your cards on the table'. I actually first became aware of it when working with research assistants who, despite having signed a full-time contract with me for a specific time period, also had other jobs and duties, about which they did not inform me, nor their other employer. This point deserves further attention. It relates to 'small and big lies' being told by respondents. Berckmoes (2013: 135), in writing about her experience in Burundi, argued that lying is often a matter of protection (lying for personal safety, or for protection against people's bad intentions) and that people do not always morally judge it themselves. In Burundi parents teach their children to lie in particular circumstances, and in other contexts people lie 'automatically' (idem: 136). Although the Burundese culture is more 'secretive' in general than the Congolese culture, the 'small and big lies' also occur in the Congolese context. As a researcher it is important to go beyond these lies, and find out what this attitude actually means.

For example, miners and traders are extremely reluctant to provide precise information on their production and revenues. In my interaction with them, it was sometimes clear to me that they bluntly over- or undervalued their production when they answered a direct question about it. How to deal with this? One manner would be to try to get to the data in an indirect way. That is why I combined different research techniques (qualitative interviews, observation, documentary research and quantitative survey) and conducted follow-up research. Another way to deal with this issue of disclosing erroneous information on production is to look at what it unveils, rather than at what it conceals. More particularly, the practice of under- and overvaluation of production and revenues sheds some light on miners' and traders' motivations to do so. My argument is that miners overvalue their revenues in order to underscore how important this activity is to them. They especially did so in areas where they were threatened with eviction by industrial mining, and in periods in which artisanal mines were forced to close, such as during the mining ban. That in itself is an interesting finding. Some miners and traders also undervalued their revenues. I argue that this has to do with them hoping to get some kind of assistance from my side in the first place. But it also has to do with broader issues of silence and secrecy. These are very important in gold mining and trade and according to some more generally in Congolese society. Théodore Trefon (2011: 113), for example, said that secrecy is "a powerful cultural reality and political strategy".

⁸⁷ See section 1.4.

In any case, stories on gold and gold mines are surrounded with secrecy and mysteries. As I explain in chapter five, during the colonial period Congolese workers or villagers were not allowed to touch gold. The Belgian coloniser made them believe that this was a white men's commodity and that Congolese, if they touched it, would become ill or cursed. Later, stories started to circulate about 'hidden treasures'. A very popular narrative talks about white employees of the mining company who fled the area in 1996, hid gold in their houses or buried it in places they carefully marked. During my research I was approached more than once by Congolese who claimed to have maps indicating where these kinds of treasures were buried. All they needed, they said, was some money to invest in the digging project. In 2009, a Pakistani regiment of Monusco was based in Kamituga. Soon rumours started to spread about gold that was hidden under the floor of the building where they were staying, in the former Catholic parish. This apparently prompted Colonel Heshima to order their departure (UN, 2010a).

In a more pragmatic fashion, making production too visible may provoke envy and thus bring insecurity. Traders fear thefts, pillage and intimidation by armed groups or other 'bandits'. But they also fear that envy may lead some people to adopt witchcraft-like activities ('sorcellerie') like for example poisoning, or mysterious disappearances of the gold. Also, as I have already said, almost all these economic activities take place outside the formal, official economy. While the miners and traders usually do not conceive their activities as illegitimate, they are conscious of the fact that they are operating in a blurred zone between official and unofficial. Therefore they do not want their activities to be registered. In their mind, registration is also equal to (over)taxation. A final reason for the importance of secrecy is the criminalisation of these activities. This meta-narrative on conflict gold, I argue, pushes people to be silent, to hide, and to smuggle. Ironically, it was meant to do exactly the opposite.

PART TWO

"Mariposa se transformait en ville. Elle comptait bien des maisons en briques et tout le commerce des environs s'y concentrait" (p.156).

> "Mariposa was transforming into a town. There were bricked houses and all commercial activities were concentrated there" (p.156).

This chapter explores the history of industrial and artisanal gold mining in Kamituga. Some references are also made to Lugushwa, a town that has many similar structural characteristics (industrial history, artisanal mining, and same chiefdom). The approach taken in this and the following two chapters is a chronological description of historical events with a focus on industrial mining actors, artisanal miners and local elites, addressing first the colonial period in 5.1; then the 1960s with its political troubles in 5.2; the 1970s with Zairianisation and the emergence of artisanal mining in 5.3; the intensification of the crisis in the 1980s in 5.4; the decline of the gold mining company and the first war in 5.5; the second war in 5.6; the postwar period in 5.7 and finally 5.8 provides a brief conclusion. In addition, the chapter provides an access analysis. Table 10 thereby serves as guidance, summarising the access maintenance and access control strategies employed by different groups of actors (roughly distinguished) over the different time periods. The 'elite' category is here a loosely defined group including local and national politicians, state agents, military leaders, customary chiefs and other local leaders, but excluding the economic elite formed by well-off miners and traders. From the description below it will become clear who exactly used these access mechanisms, and so the conflated elite category in table only serves the purpose of making the table clearer, and must not be taken as an indication that this group is considered to be homogenous. It should also be noted that the mechanisms presented in table are not exhaustive, but just serve to illustrate the most important historical dynamics as described in the remainder of the chapter. Finally, the table immediately shows that mechanisms like violence and legalisation, which were identified in chapter three as control mechanisms (Peluso and Lund, 2011), may just as well serve to gain and maintain access.

In terms of administrative divisions (Utshudi and Ansoms, 2011: 42), the province of South Kivu is divided into eight 'territories' and the capital, Bukavu, as a separate entity consisting of four communes. The subdivisions of a territory may be of three different kinds: in urban areas there are towns ('cité'); in rural areas there are sectors ('secteur') or chiefdoms ('chefferie'). The latter two are considered as the same administrative layer, but chiefdoms more or less coincide with existing ethnic boundaries, whereas sectors do not. Chiefdoms and sectors consist of 'groupements'. Within these 'groupements' there are villages. At the head of a territory there is a territorial administrator; a sector is governed by a sector chief ('chef de secteur'); a chiefdom by a king ('mwami'). Every 'groupement' also has a chief ('chef de groupement'), as well as every village. According to the law these chiefs at the local level may interpret formal laws and procedures "in line with the particular requirements of the local setting" (idem). The chief of the sector or chiefdom presides over a council, for which the members are elected, and may appoint the chiefs of the 'groupements' and villages. Although this is what the new legal framework provides for, particular aspects of it, like the election of decentralised structures, have not been implemented yet to date (idem).

| Actors | Miners and traders | | Com | Company | | Elites | |
|-----------------------|--------------------|--|-----|-----------------------|-----|---------------------------------------|--|
| Access maintenance | C ol | Labour, social services | Col | | Col | | |
| | 60 | Start AM Resistance/ rights | 60 | | 60 | | |
| | 70 | Professionalisation AM Relations | 70 | | 70 | | |
| | 80 | Expansion AM Relations | 80 | Tolerance AM | 80 | Taxation | |
| | 90 | Professionalisation AM Violence Expansion AM Cooperation/ relations | 90 | Negotiation AM | 90 | Taxation Violence | |
| | 00 | Resistance/ rights | 00 | Legalisation | 00 | | |
| Access control | C ol | | Col | Territorialisation | Col | Labour | |
| | 60 | | 60 | Violence Relations | 60 | Relations Violence | |
| | 70 | | 70 | Violence | 70 | | |
| | 80 | | 80 | | 80 | Taxation Cooperation/ relations | |
| | 90 | Violence Financial capital | 90 | Flooding the mine | 90 | Violence Cooperation/ relations | |
| | 00 | | 00 | Privatisation | 00 | | |

Source : Author's own representation

Kamituga is one of South Kivu's towns or 'cités'. It currently has about 100,000 inhabitants⁸⁹, compared to about 56,000 in 1999, 45,000 in 1994 and about 33,000 in 1992⁹⁰, which makes it eligible for being promoted to the status of 'ville' or city. It located at about 120 kilometres southwest of Bukavu in Wamuzimu chiefdom, Mwenga territory, and extends over Buse and Baligi groupements. Traditionally there were no customary chiefs this forest area, which was being inhabited by the Balega people. They only knew village heads and they had a complex lineage system for social hierarchy or 'bwami association' (Biebuyck, 1973). But in the early 20th century the colonial administration created chiefdoms and customary chiefs in order to

⁸⁸ AM in this table = artisanal mining.

⁸⁹ The 'health zone' of Kamituga has figures for Kamituga and a whole range of surrounding villages: in 2012 there were 146,395 inhabitants. For Kamituga town itself, I estimate the number of inhabitants at around 100,000.

⁹⁰ Sanganyi Nyassa (2003); Bulambo Katambu (2002); DSRP (2004) Rapport final des consultations participatives de la base pour l'élaboration du Document de Stratégie de Réduction de la pauvreté (DSRP) territoire de Mwenga, Sud-Kivu, Bukavu.

establish a tighter control over the population (Ndaywel è Nziem, 1998: 360). Initially land in the Balega region was abundant as well. A person wanting to settle somewhere could just do so and start to work the soil. Contrary to what existed in other regions, occupants did not need to ask for the chief's permission before settling (Dupriez, 10987: 17)⁹¹. The growth of Kamituga as a mining town during the colonial period shaped the ethnic mix of Balega, Bashi, who came from the wider Bukavu area, and other ethnicities from South Kivu, North Kivu, Maniema, Katanga and beyond. Lugushwa currently has approximately 30,000 inhabitants and historically has evolved in a parallel way. The local police commander explained to me that the place is "a crossroads, where unemployed from Maniema, from Bukavu, from Lubumbashi and even from Kinshasa meet"⁹². Kamituga is now a vibrant commercial center and is the third most important town in South Kivu, after Bukavu and Uvira. Most economic activities here are concentrated on the mining sector. According to estimates by the local Mining Division in 2008 there were between 120 and 150 underground shafts in the town and its immediate surroundings and dozens of places where alluvial placer mining was being done⁹³. The town is now relatively accessible by road (the RN2 or national road, which has been repaired by a private Chinese enterprise under a World-Bank sponsored programme), although security incidents, heavy rains and poor road maintenance may render the journey quite risky and painful at certain times. Lugushwa, about 105 km further inland, is only accessible on a motorbike from Kitutu.

5.1. TERRITORIALISATION AND LABOUR (PRE-1960s)

There are no indications of precolonial gold extraction or use in Maniema and South Kivu⁹⁴. The colonisers discovered the alluvial gold deposits in the 1920s⁹⁵. At the time, the principal economic actor in this region was Baron Empain, who possessed an enormous territory granted to him by King Leopold II. In 1923 Empain created the 'Compagnie Minière des Grands Lacs Africains' (MGL), which became the owner of all the mining concessions within his territory. MGL started to commercially exploit gold in Kamituga (alluvial and underground, since 1937), Twangiza (alluvial, since 1957) and Lugushwa (alluvial and underground, since 1959), cassiterite in Mwenga territory (Nzombe, Mwana and Miki) and in Kadubu (since the 1960s), beryl in Kobokobo and wolfram in Etaetu (North Kivu). The administrative seat of its southern division was Kamituga⁹⁶. As MGL needed a big labour force, they set up an extensive recruitment campaign, mainly in the Bushi area (around Bukavu) and even as far as Rwanda and Burundi. In these areas they often relied on contacts with local chiefs who sent them labourers. The mining town of Kamituga thus evolved into an 'extra-customary'⁹⁷ locality.

⁹¹ See chapter six.

⁹² Interview with police commander, Lugushwa, 26/01/2011.

⁹³ Interview with mining administration, Kamituga, 10/04/2008. This is confirmed by a local miners' association: interview, Kamituga, 09/04/2008.

⁹⁴ Vwakyanakazi (1992: 377) wrote that in North Kivu gold was being extracted on a very small scale to make jewelry or royal attributes for the chiefs.

⁹⁵ This section is based on the personal archives of Serge Lammens, former Administrator-General Director at the mining company Sominki. The archives contain historical overviews, personal reflections, letters, minutes of meetings and so on.

⁹⁶ Actually there were three divisions: MGL North around Butembo, MGL Central around Kabunga (Walikale) and MGL South around Kamituga. These were three relatively independent entities. At the end of the 1950s, the northern and central divisions were closed down.

⁹⁷ This term is used to refer to a locality that is not ethnically homogeneous and where customary law does not apply. See interview with former Sominki employee, Bukavu, 31/07/2009.

According to some, the local Balega population was reluctant to work in the mines⁹⁸ although the anthropologist Biebuyck (1973: 14) found that some Balega men did welcome the opportunity to work in their homeland and accumulate money for marriage or initiation rituals. But the development of the mining camps also "put heavy strains on the Balega labor force, on the traditional rhythm of their lives and on their traditional occupations" (idem). Balega villages were put under heavy pressure to produce food crops for the mines, although the Balega traditionally were no cultivators, but lived on hunting, food gathering, and occasionally slash-and-burn agriculture in the tropical forest.

In this way, the presence of MGL to a great extent influenced the socio-economic as well as the physical landscape in the area. All this related to their strategy of controlling and governing the people within the boundaries of their concession, a strategy earlier referred to as territorialisation⁹⁹. A first instrument was the setting of clear access restrictions for particular categories of people. From the 1940s onwards the Kamituga area was divided into different zones. Zone A, the core of the concession, encompassed the main mine of Mobale and its surroundings¹⁰⁰. Mobale was a large underground mine for which construction works had started in the late 1940s. In principle only the original inhabitants of local villages and the personnel of the mining company had access to this zone. Nobody could enter, construct, or do business in Zone A without the consent of the company. Zone B covered a larger area of 40 kilometres in diameter around Mobale. Although Zone B was still part of the concession, there was no active industrial mining within it. However, the local population was not allowed to mine here either. The area was meant for agriculture and provisioning of the workers, whose number was around 2000 to 3000¹⁰¹. The spatial organisation within Zone A was also based on segregation, with different neighbourhoods for different categories of workers¹⁰². The miners and their families lived in Kitemba and in Kalingi. They occupied modest houses and had access to basic health services and to the shops or 'cantines'. The administrative and technical staff (mechanics, lab assistants, secretaries, employees in the shops) lived in another neighbourhood, Kele (to the east, next to the Catholic mission). The medical staff lived in a separate area too, 'Service Médical', near Kele. The neighbourhood of Sawasawa, finally, was located next to the company's offices. During colonial times, this part was inhabited by the 'évolués' who had obtained a 'carte de mérite civique'¹⁰³. The infrastructure in the latter neighbourhoods was better than in Kitemba and Kalingi, with buildings in durable material and better roads (Bulambo Katambu, 2002: 52). The European expats lived in Tshanda, close to Mobale mine. They had access to various sports and leisure facilities. The General Director of the southern division, finally, was living on top of a hill, as a clear visualisation of the hierarchy.

Another important instrument in the territorialisation was a paternalistic policy, combining a number of welfare benefits for the workers with a 'project of social engineering', as Cuvelier

¹⁰² Various interviews in Bukavu and Kamituga.

⁹⁸ Personal communication with Serge Lammens and interview with former Sominki employee, Bukavu, 31/07/2009.

⁹⁹ See chapter three.

¹⁰⁰ Zone A was bordered by the Lubyala river in the North to the Luliba river in the South, and from the Zalya river in the East to Migamba forest In the West. Interview with former Sominki employee, Bukavu, 31/07/2009.

¹⁰¹ Interview with Serge Lammens, Ottignies, 05/09/2008. In Lugushwa there were about 600 workers.

¹⁰³ The card for 'civic merit' was attributed to Congolese who were literate, adhered to a 'European' lifestyle and according values, lived in a westernised environment and could show proof of decent behaviour (Ndaywel è Nziem, 1998: 460).

(2011b: 73) asserted for Katanga. Workers and their families enjoyed free health care¹⁰⁴, cheap food in the 'cantines'¹⁰⁵ and schooling¹⁰⁶. But at the same time they were also coerced into a new 'social model' of traditional western family values and lifestyle and a capitalist work ethos. Paternalism was thus used as an instrument for controlling and disciplining the workers, stabilising them in nuclear families, making them dependent upon their employer and minimising protest (Hönke, 2010: 113). This 'stabilisation policy' was implemented in various African colonies (Cuvelier, 2011b: 74) and was based on disciplinary power, which filtered through all layers of society, as Foucault (1994a) described for 19th century Europe.

The creation of these mining 'enclaves' transformed the lifes of many Congolese as they moved from their home villages to mining towns and gained access to social services and regular salaries. For some it created a distinctive identity. As Cuvelier (2011: 73) explained, the workers in Katanga "started considering their job as an instrument to achieve higher social status, to gain power, prestige and respectability, to accumulate wealth and to obtain access to Western consumer goods" and took pride in it. The same was true in Kamituga, where many children grew up in a relatively protected environment, went to school, had the possibility to pursue higher studies and started their careers. A group of young men called themselves 'les garcons de Kaga' (the boys from Kamituga) and cherished their identity as 'sons' of the company¹⁰⁷:

"Everyone was relying on the company, so it was in their interest that its structure remained as it was. You could not touch the company, since it was like a parent to all of us. There was a degree of paternalism, yes. But it was difficult to step out of this logic. One could not imagine living without the company, without this structure. People did not even leave Kamituga, because they didn't know where to go. Going to the village? That meant you were going to die, because you would be bewitched. People also spent their holidays in town"¹⁰⁸.

Obviously the current socio-economic situation of my interviewees, which is often precarious, may lead them to stress the positive aspects. But even those who were most critical about the company, acknowledged some of the benefits it brought along:

"I wouldn't say it was good, no, but at least there was a good balance. There was a balance because the company took care of its workers. There were functioning 'cantines', where you could buy everything on credit: salted fish, sardines, soap, cloth and so on. This made life easier. And there was a constant supply of these goods. This made us think less about our situation. But still our salaries were low. The company made sure, with this system of credit, that we could make ends meet. But it was also a way to distract us, I can say that. The salary, it wasn't really a salary"¹⁰⁹.

¹⁰⁴ The colonial legislation required that a company with at least 1000 workers should operate a hospital and pay medical doctors.

¹⁰⁵ Shops where food and some basic commodities could be bought at lower rates.

¹⁰⁶ MGL did not operate schools itself, but paid school fees for the workers' children.

¹⁰⁷ Interview with former Sominki employee, Bukavu, 31/07/2009.

¹⁰⁸ Interview with former Sominki technician, Bukavu, 24/07/2009.

¹⁰⁹ Interview with former Sominki worker, Bukavu, 27/07/2009.

A third instrument for controlling and disciplining the workers and the broader population, was the alienation from the commodity they were producing. The population was being told that gold could only be handled by white men, for it was dangerous. If Congolese touched it, they would become ill. As one trader said, it was "une politique de faire dormir les gens", a policy aimed at keeping the people asleep¹¹⁰. A former worker recalled for example how one day, a colleague of his had found a large gold nugget, which he immediately handed over to his boss, fearing that he would be contaminated by it¹¹¹. The same man told me about the taboo on merely saying the word 'gold', because people feared they would be accused or targeted. When he was visiting a friend of his as a child, he was admiring a pen, saying that "the point, it looks a bit like gold". The father of this friend immediately came out of the adjacent room and yelled at them never to say that word out loud. Another former worker remembered that in the 1960s, trucks regularly transported gold ore from Kalingi (a mining site to the north of Kamituga) to the factory near Mobale:

"Well these trucks frequently broke down, and stood in the middle of the road for three, four days. Nobody came to grab some of these stones, whereas the gold was there! We thought that no, this was reserved for the company; we cannot touch it"¹¹².

According to my interviewees the Congolese at the time were not able to assess the value of this commodity: "A worker who found a gold ore handed it over to his Director, and received a package of cigarettes in return"¹¹³.

5.2. RESISTANCE, START OF ARTISANAL MINING, REPRESSION AND RELATIONS (1960S)

But very soon, people came to realise what the real value of this gold was. The local population started to mine in abandoned MGL deposits, which marked the start of artisanal mining. Some deposits were mined secretly but in others people worked openly, often with the complicity of local chiefs. As will be explained local chiefs played an ambivalent role, allying with the local population and with the company alternately in an attempt to gain control over the gold.

Already in August 1960, just a few weeks after independence, Congolese were signalled panning gold in Lulimbohwe river¹¹⁴. The report written by an MGL agent asked for a patrol from the Mining Police to take action against this, as the area fell within the concession. A letter addressed to the administrator of Mwenga territory talked about "thieves who are exploiting gold in Kadubu. When we arrived, they started to insult us. Given the fact that they were all armed, we called upon the mwami of Luhwindja, who came with his policemen to arrest them"¹¹⁵. A letter from December, written by Mr. Burnotte (MGL) reported on a number of incidents of 'gold theft' in the southern Division: two in June, four in August, three in September, seven in October and seven in November¹¹⁶. A report from 1963 estimated the

¹¹⁰ Interview with trader, Kamituga, 21/01/2011.

¹¹¹ Interview with former Sominki technician, Bukavu, 24/07/2009.

¹¹² Interview with former Sominki technician, Bukavu, 24/07/2009.

¹¹³ Interview with local NGO leader, Kamituga, 11/04/2008.

¹¹⁴ *Report of a 'patrol'*, 04/08/1960, MGL archives KMMA.

¹¹⁵ Letter to Administrator of Mwenga, 16/08/1960, MGL archives KMMA.

¹¹⁶ Letter by Mr. Burnotte to Mr. Lalou concerning gold theft, 06/12/1960, MGL archives KMMA.

volume of thefts at 30 to 40 percent of MGL's total gold production¹¹⁷. There were also complaints about the complicity and corruptibility of police and magistrates¹¹⁸. This production was sold to traders who travelled between Bukavu, Kamituga and Uganda. An article in 'Nouvelles d'Afrique'¹¹⁹ described them as "audacious men, without scruples and of indefinite nationalities". In their four-wheel drives they arrived in Kamituga, transported the gold to Bukavu and by plane to Uganda, where it was sold to the banks. According to the journalist, these traders made a lot of money and bought villas, buildings, shops, and ships which the Belgians who were leaving the province happily disposed of. Trading gold in an 'illegal' way was much more profitable than official trade, as the following data show: for one gram of officially exported gold, the producer received USD 1, which was converted into 65 Congolese francs at the official exchange rate. On the black market though the same US dollar was worth 250 to 300 Congolese francs (FC)¹²⁰. Moreover, for the local people the activity was not considered to be illegitimate, for it was not the trade patterns that had changed, but rather the laws. Historians have documented long traditions of migration and exchange in the Great Lakes Region, notably between the Kivu region and neighbouring Rwanda and Burundi (Newbury, D., 1986; Chrétien, 2006). It is only with the creation of boundaries, border posts, and laws against smuggling that activities which had been perfectly normal before, were now defined as 'illegal' and 'criminal' (Newbury, D., 1986: 91; MacGaffey, 1986).

So the start of artisanal mining and the gold trade can be interpreted as resistance against the former colonisers who still controlled the country's economy, just like MacGaffey (1987) argued about artisanal mining in the 1980s being an accusation against an ineffective state. But this resistance seemed to take different forms just after independence and people claimed and enforced their access in various ways. In the course of 1961 the number of 'incidents' in Kamituga was on the rise. Congolese workers refused to obey European agents, youngsters refused to pay for their drinks in MGL's club, and the Congolese who had been appointed to responsible positions, behaved "in an arrogant and threatening way", as company agents argued¹²¹. According to the reports, "the Africanisation has become a purely political and extremist issue, and the people that are appointed are certainly not the most competent"¹²². In this Africanisation process ethnic tensions also surged, since different groups (Balega, Babembe, Bashi) claimed the most important positions¹²³. Some workers at MGL also started to openly protest against the working conditions. They demanded higher salaries, denounced the differences between European and Congolese workers, and put it in terms of racial discrimination and persistence of colonialism, as the following excerpts from a declaration by a clerk in the name of the Congolese workers show:

"You probably ignore that the company that had most difficulties with its workers, is MGL. This is due to the exaggerated avarice of the company's direction. We hoped that after our independence, these poor workers, who had suffered that much under the colonial system,

¹¹⁷ Memorandum addressed to Procureur d'Etat by Mr. Bourge, 04/09/1963, MGL archives KMMA.

¹¹⁸ Idem and Letter of Kindu Drake, detective at Police Judiciaire, to M. Piron, which was sent to M. Piron by M. Bourge, 10/8/1962, MGL archives KMMA.

¹¹⁹ Belga, 07/08/1960, MGL archives KMMA.

¹²⁰ Memorandum addressed to Procureur d'Etat by Mr. Bourge, 04/09/1963, MGL archives KMMA.

¹²¹ Report on the situation in MGL South, 08/03/1961, MGL archives KMMA.

¹²² Idem.

¹²³ Note for Mr. Burnotte from Mr. Galliez and Mr. Malengreaux, 25/05/1961, MGL archives KMMA. Letter by Safiannikof, 9/2/1962, MGL archives KMMA.

would profit from this national freedom and good salaries. Nevertheless, due to this colonial spirit, our direction continues racial discrimination, distinguishing white and black men and ignoring the value of the black man and the needs he has like every man in this modern world. [...] If we look at these [production] figures and then at our salaries, we find that we are considered as nothing more than machines that have to work from dawn till dusk, but that are not entitled to any advantages because of the good work they do for their boss. Our salaries remain minimal and our persons without dignity. We find that only Europeans are treated as people, as agents who are worth a salary. Our Congolese agents are considered as donkeys that have to pull the tractor to cultivate the fields. All other workers are considered as machines or tractors that only work on gasoline. The tiny salary of the Congolese agents makes us cry. [...] In order to let a machine work, one needs gasoline, so the company pays us 920 francs, just enough to buy food. They suppose that we do not need the advantages that Europeans get. [...] The black man is only considered as a human being during the working hours, when he can yield a good return to the European agent who controls him. European agents are automatically considered as chiefs, even if they do nothing all day long. The colour of his skin alone makes the difference, when he sits in his office with a pen in his hand. He only has to drive his small truck at 6 in the morning and at 4 in the afternoon, to give the impression that he did some work. The black man works and the white man gets the salary. The colonial period is not over in the southern mines"¹²⁴.

The author of this statement worked as a clerk for MGL and was also the leader of a youth movement, which was qualified by the MGL directors as 'extremist'. Regardless of this fact, reports increasingly showed that tensions were rising, both publicly, but also in the 'hidden transcripts' (Scott, 1995). A technician in charge of the laboratory in Kamituga put it this way:

"You [addressing an MGL agent] were surprised to hear that Congolese workers have negative sentiments towards European technicians, but there are many things you don't know, as Congolese are often hypocrite, but we know what they think. Congolese who listen to the radio and read newspapers are determined to stand up against any foreign domination. European agents have no authority anymore; Congolese do not obey them anymore. It is in the interest of company to hire Congolese agents; there are Congolese who are at least as capable"¹²⁵.

In August 1962 the Minister of Mines of the central government tried to persuade MGL to put the deposits that were not being exploited in 1960 at the disposal of the "unemployed peasants", without further conditions¹²⁶. MGL though only wanted to do this if the government were to compensate them for the loss, which did not happen. Also the prohibition to settle in Zone A remained in place, in theory. Yet it was impossible for MGL to continue to enforce this, especially since local political and customary elites authorised and even encouraged people to settle here¹²⁷. Many people from neighbouring villages came to Kamituga, hoping to get access to job opportunities and social services. Small traders set up their businesses in town; vibrant neighbourhoods like Kabukungu emerged. The 'cité minière' grew and attracted people of all kinds who came to mine or to trade in gold.

¹²⁴ Declaration of W. Norbert in name of the Congolese MGL workers, 01/09/1962, MGL archives KMMA.

¹²⁵ Letter by M. Kyalangilwa, technician in charge of laboratory in Kamituga, to Mr. Van Landewyck, 24/01/1968, MGL archives KMMA.

¹²⁶ Note concerning non-exploited concessions in June 1960, 10/8/1962, MGL archives KMMA.

¹²⁷ Memorandum addressed to Procureur d'Etat by Mr. Bourge, 04/09/1963, MGL archives KMMA.

As has been said, the company had an ambivalent relationship with the local elites. On the one hand, complaints about their 'arrogant', 'corrupt' and 'demanding' attitudes were legion¹²⁸. Local elites, for example, encouraged people to settle in the concession, and often offered protection for the artisanal miners and traders. Also the National Mining Police, which was deployed in the concessions, was frequently accused of corruption and complicity in gold thefts: they "do not have such high moral standards", as one report euphemistically stated¹²⁹. A note from 1965 reported that there were 70 policemen in Kamituga and Lugushwa and another 40 in Twangiza (at about 70 kilometres south-west of Bukavu), for which MGL was supposed to provide housing, transport and food supplies, and if the central mining services did not pay the salaries, the company was also expected to supplement those¹³⁰. On the other hand, the security forces and local elites were strategic partners in the 'stabilisation' of tense situations. Some customary chiefs were instrumentalised in this respect. The company maintained for example a good relation with chief Longangi Mpaga Munyatangoyi of Wamuzimu, where Kamituga and Lugushwa are situated. He actively recruited people to work for MGL and prohibited his subjects to mine artisanally¹³¹. But of course the chiefs also had expectations from the company, as this letter written by a MGL administrator showed:

"Chief Biemba told me that his father, chief Longangi, was very mad at MGL because they always promised him a car, which he never got. I explained to him how difficult this is, given the crisis situation we are in. But anyway, I think it is time to give him a car. I assume a Ford model 1958 in relatively good state would be suitable. I also asked him: what should MGL do to satisfy the chiefdom? He answered that the company has to leave a 'souvenir' (this is the word he used) that would remain even after the gold deposits would be exhausted. He would like to see a school in Kitutu offering professional trainings: mechanics, carpentry and masonry. I think this is a good idea. In the eyes of the customary chiefs, after all, the company is exploiting *their* gold and hence it is logical that the company gives something in return"¹³².

At this time the whole of Congo was being plagued by political troubles and a weakening of the administrative apparatus. In 1964, the Mulelist insurgents were fighting in the forests surrounding Kamituga¹³³. Reports from June until October 1964 frequently mentioned fighting in the area. Although the town had not been seized by the rebels, gold production was seriously disrupted because of the general insecurity¹³⁴. This Mulelist rebellion also provoked the formation of other local rebel groups in the Kivus, which were generally called 'Simba'

¹²⁸ Note on the incidents of 6 June by M. Musombwa, Administrative Director, 09/06/1965, MGL archives KMMA. Report by Mr. De Taeye, Ingénieur, on events in Kamituga July-September 1967, 13/09/1967, MGL archives KMMA. ¹²⁹ Note to Mr. Galliez, 17/08/1965, MGL archives KMMA.

¹³⁰ Idem.

¹³¹ Interview with old man, Luhwindja, 01/2011; interview with Serge Lammens, 05/09/2008; personal archives Serge Lammens.

¹³² Letter of Prigogine to Burnotte, recalling a conversation Prigogine had with the chief Biemba in his residence in *Kitutu*, 8/7/1962, MGL archives KMMA.

¹³³ Pierre Mulele initiated a revolutionary movement against the Adoula government, which they accused of being 'neocolonial'. They launched military attacks in Bandundu and in the East (current Uvira-Fizi, Northern Katanga, Maniema, Province Orientale). The leaders of the movement in the East were Gaston Soumaliot, Laurent Désiré Kabila and General Olenga. Magical forces were ascribed to the fighters, called Simba. The rebellion finally fell prey to internal divisions and an external intervention by the Congolese army with Belgian and mercenary support (Operation Red Dragon in November 1964) (Ndaywel è Nziem, 1998: 612-630; Vlassenroot, 2013: 22-26).

¹³⁴ Letter by F.E.C. concerning MGL, 10/12/1964, MGL archives KMMA.

(lions). In 1965 they were threatening to seize Kamituga¹³⁵ and in September 1965 Mwenga, the chief town of the territory, was attacked¹³⁶.

5.3. PROFESSIONALISATION OF ARTISANAL MINING AND REPRESSION (1970S)

In 1965 Mobutu took power in a coup d'Etat, which suddenly altered the political situation, but also the economic policies, as explained in section 2.2.1. The gold and cassiterite sector in South Kivu to a large extent escaped Zairianisation and radicalisation measures. Still, the regime put the companies in Kivu and Maniema under pressure to merge, which happened with the Cobelmin mines (Miluba, Minerga, Kinoretain, Kundamines), Kivumines, Phibraki and MGL. They all became a single entity under the name of Cobelmin¹³⁷. But Zairianisation and radicalisation proved to be disastrous in their implementation, as was said before. The new owners and managers were ill-prepared for their tasks and production in most enterprises dramatically fell. In the mid-1970s the new policies, combined with commodity price instability on the world market, forced a number of mining companies to restructure. In 1976 Cobelmin and Symétain merged into the newly created Sominki ('Société Minière et Industrielle du Kivu'). The Zairian state held 28 percent of the shares; private shareholders 72 percent. Sominki owned 47 gold and cassiterite concessions, encompassing an area of 10,271km² in South Kivu and Maniema¹³⁸. Its most important gold mine remained Kamituga, where approximately 2000 to 3000 workers were employed¹³⁹.

The emerging economic crisis during this period intensified the artisanal mining and trade activities, as did the rising gold prices and the profits that could be made by smuggling gold¹⁴⁰. For the local population, this was a strategy for maintaining access¹⁴¹. The mechanisms they applied continued to expand in scale, and they became ever more diversified and creative. Some Sominki workers stole the richest ores during their shift, in an attempt to supplement their low incomes. These thefts represented a considerable loss to the company, estimated at 100 to 200 grammes of gold per working shift¹⁴². Given three shifts a day and 20 working days a month, this would represent a loss of between 72 kg and 144 kg per year. This was a considerable volume, given that Sominki's annual gold production between 1976 and 1990 varied between 400 and 600 kg. The following story shows a creative way of stealing ore:

"That was not his real name, but he was called Fujo, which means 'disorder', 'noise' in Swahili. In 1973 or 1974 he started bringing ore from Mobale mine to his house in Kitemba. In public he told everyone that he wanted to renew the pavement in his house, and that he needed rocks. The best quality could be found in the mine, so Fujo went in, did some prospecting, and came out with bags full of ore. At the time, the gold veins were less exhausted than they are now, so gold could often be seen with the naked eye. As Fujo was a smart speaker, he even convinced his Belgian superior to put a truck at his disposal, and to deliver the bags at his house. There,

¹³⁵ Note on situation in Kamituga, 19/05/1965, MGL archives KMMA.

¹³⁶ Note by M. Malengreaux concerning the situation in Kamituga, 07/09/1965, MGL archives KMMA.

¹³⁷ Personal archives Serge Lammens.

¹³⁸ Personal archives Serge Lammens.

¹³⁹ Interview with Serge Lammens, 05/09/2008.

¹⁴⁰ Personal communication with Serge Lammens, 16/06/2009.

¹⁴¹ See also Mwaipopo (2014). In her analysis of 'ubeshi', the practice of illegally mining diamonds inside the Williamson Diamond Mine in Tanzania, Mwaipopo also used the concept of 'access'.

¹⁴² Interview with Serge Lammens, 05/09/2008.

his entire family helped him to crush the rocks and extract the gold. They sold the gold to the small traders in town. But you wouldn't tell that he had money, no, he was always bare foot"¹⁴³.

For the company, these activities posed a threat, and they reacted with repression and violence, as testified by one interviewee:

"[When have you started this activity of digging gold?]
Digging? I started back in 1969.
[In 1969? MGL was still there?]
Yes, they were there. And they shot at me.
[They shot?]
They shot at me while I was working near a source.
[Ok, so you were mining illegally?]
Yes indeed, I was doing it in secret"¹⁴⁴.

Workers were searched at the exit gates of Mobale mine and the big gate in Kimandu was barred in 1978. But the workers circumvented these measures by hiding the ores underground and picking them up at night, for example, or by having others pick them up¹⁴⁵. The thefts that occurred in the factory were even worse. When gold was stolen here, all processing costs had already been incurred¹⁴⁶. Therefore, stringent security measures were put in place: the factory was walled, a double door protected the amalgamation room, a metal detector was installed, and all three working shifts were supervised by an expat. But from 1976 onwards, a second group of miners began to infiltrate Mobale to steal gold. Some of them had worked for Sominki before, "but when they were fired, they had to continue mining, since they were not capable of doing anything else", as one informant said¹⁴⁷. Others had never been employed by the company. These diggers quickly gained quite a lot of money and started to buy manufactured goods and wear fancy clothes, which inevitably attracted other, mostly young, people. The group called themselves 'malaika' or angels (Bulambo Katambu, 2002: 95). Their production was smuggled out of the town and the country. According to one of my informants they hid away the gold, for example inside the frame of a chair, in order to be able to pass the roadblocks¹⁴⁸.

By the late 1970s it had become almost impossible to halt these 'illegal mining' activities, as Kasele and Kasongo (1979: 135) confirmed: "At this particular moment, Sominki is being rattled by an evil they cannot stop anymore". According to their estimates, about 60 percent of the population in Kamituga would have been mining and/or trading gold in an 'illegal' way in 1979. The authors also described the emerging trade system, which has many parallels with the current system, as chapter ten will demonstrate. A miner sold his production to an 'exchange agent'. At regular times this agent travelled to Bukavu to sell the gold to a master trader, who also acted as his sponsor and granted him credit. The Bukavu-based master

¹⁴³ Interview with former Sominki technician, Bukavu, 24/07/2009.

¹⁴⁴ Interview with miner, Lugushwa, 26/01/2011.

¹⁴⁵ Personal communication with Serge Lammens, 16/06/2009

¹⁴⁶ Personal communication with Serge Lammens, 16/06/2009.

¹⁴⁷ Interview with former Sominki employee, Bukavu, 31/07/2009.

¹⁴⁸ Interview with former miner, Lugushwa, 26/01/2011.

traders were organised in small groups. They regularly assembled their goods and sent a transporter to Bujumbura, where the latter sold the gold to a white or a Hindu trader who exported to the world market. One informant, a former master trader in Bujumbura, explained that as a result of Zairianisation the local currency quickly devalued, which created a problem for Congolese who wanted to do business abroad¹⁴⁹. In order to get access to foreign currency they sold gold in Bujumbura, where they were paid in US dollars. This money was immediately used to buy consumer goods, which they could bring to the mines again. This trade system attracted many traders from the Bukavu region to the mines further inland, where some of them stayed and became active in the gold business¹⁵⁰. Dupriez (1987: 101) observed that small, intermediary and big traders traveled to the mines with goods, from foodstuff to more expensive manufactured goods. They were able to at least double or triple their starting capital in a single journey.

The emergence of this system of artisanal mining and trade, which included theft and smuggling, marked the start of the professionalisation of the sector¹⁵¹. As will be explained in part three, current artisanal mining and trade are characterised by a series of professional norms. This chapter demonstrates how and in which context these emerged. Yet at some points in history we observe intensification, acceleration and scaling-up, which can be related to the broader governance context, as the next section demonstrates.

5.4. EXPANSION OF ARTISANAL MINING, TOLERANCE AND TAXATION (1980s)

At the national level the persistent economic crisis forced Mobutu to take some drastic measures. One was to alleviate the state's control over the exploitation of mineral resources, hence the liberalisation of the exploitation and trade in precious minerals (gold, diamonds) in 1982¹⁵². This policy had an immediate effect. By 1983, artisanal production of gold was four times higher than industrial production by Kilo-Moto and Sominki (Tshibanza and Tshimanga, 1985: 339). By 1987, it was estimated that 30 percent of young men in the Bushi area had left their villages and fields to go to the mines (Dupriez, 1987: 104)¹⁵³. In these villages, there was an increasing pressure on land, which encouraged mostly young men to look for economic opportunities elsewhere. This obviously had a negative impact on local food production: the fields were abandoned, food had to be imported and prices rose (idem). In their reports state agents complained about agriculturalists abandoning their fields and thereby escaping imposed cultivation (Newbury, C. 1986: 103). But the gold panning and digging in which these young men got involved also nourished the local economy: it increased the demand for food and boosted local consumption, while some of the money earned in gold digging was invested in small stores, as Vwakyanakazi (1992: 384-385) observed in North Kivu.

¹⁴⁹ Interview with former master trader, Bujumbura, 23/03/2010.

¹⁵⁰ Interview with trader, Nyamurhale, 02/06/2012. This trader explained that he went from Ngweshe to Kamituga and Lugushwa to sell cows – which he could sell at least at a double price – and buy gold. See also interview with miner, Mukungwe, 02/06/2012.

¹⁵¹ Mwaipopo (2014) described a very similar system called 'ubeshi' in a diamond mine in Tanzania. The practice of ubeshi emerged there in the 1970s and still exists today.

¹⁵² See section 2.1.1.

¹⁵³ The same thing happened in other mining areas, for North Kivu see Vwakyanakazi (1992).

Many miners and traders settled in Kamituga, which expanded in size and became an important commercial centre. The miners who 'illegally' worked in Sominki's underground galleries came to be even better organised and were called 'Ninja', referring to stock characters in Kung-Fu movies (Bulambo Katambu, 2002)¹⁵⁴. Ninja mostly worked in the more remote galleries of Mobale mine: the dangerous tunnels and the collapsed parts, where company personnel was not allowed to enter. Ninja would hide and sleep there during the day and come out at night to work. Normally there would be no oxygen circulation during the night, but the Ninja made arrangements with workers who operated the compressor to continue ventilating the shafts. Sominki workers also smuggled in batteries, tools and food for the Ninja. In the beginning the latter went in and out on a daily basis and brought in cooked food. Towards the late 1980s however, their underground stays became longer and they brought salted fish, meat and rice and so on, which they traded and cooked underground. They also brought in mortars and pillars to crush the rocks underground. Dupriez (1987: 99) observed the expansion of the Ninja phenomenon and found it understandable because it offers much higher income opportunities:

"Sominki complains that they cannot keep their workers and that all workers start to dig for their own account. And for a reason! In 1985 miners in Kamituga earned 1000 zaires per month. They had access to free health care as well. In the rivers and shafts were they work artisanally, they can earn 5000 to 50,000, depending on their luck. That is why many men in Kamituga hedge their bets: their employment gives them access to health services, while their artisanal work provides them with money. 'How can you expect us to pay more? They all steal', is what Sominki's director responds."

The Ninja movement also flourished because of the complicity of the ill-paid guards at the main entrance and the Mining Police¹⁵⁵. The Mining Police ('Brigade Minière'¹⁵⁶) had been sent by the government in 1981, after repeated requests by Sominki, which also had its own security guards ('Gardes Privés de Sécurité'). At a certain day in 1981 the Police had shot an artisanal miner. A crowd of angry and excited miners carried his corpse to the center of town, where they dropped it at the Director's office. In the chaos, someone else was shot by a policeman. That night, workers cut off the electricity and started looting, hence that night was afterwards called 'black Monday'¹⁵⁷. The Mining Police was sent to town shortly after. But ironically the Mining Police quickly became involved in theft and 'illegal mining' itself. In July 1982 for example, 80 kg of gold was stolen from a safe in the laboratory. The theft appeared to have been well planned by the commander of the Mining Police and one of his adjutants. They stole the entire production of May and part of the production of June¹⁵⁸. The commander also supervised a whole system to cover thefts in Mobale¹⁵⁹. He issued 'entrance permits' to

¹⁵⁴ Interview with former Sominki worker, Bukavu, 27/07/2009. Films and video, especially war and fighting films, are very influential, especially among African youth, and are re-interpreted by youngsters to match their own social needs, as Richards (1996) found in Sierra Leone.

¹⁵⁵ Interview with former Sominki employee, Bukavu, 31/07/2009; interview with former Sominki technician, Bukavu, 24/07/2009. The same was true for Lugushwa: interview with former Sominki worker, Lugushwa, 25/01/2011.

¹⁵⁶ The 'Brigade Minière' was a section of the 'Gendarmerie Nationale' and was created to protect the means of production and the personnel of the mining companies in Zaïre. I will translate it here as Mining Police.

¹⁵⁷ Interview with former Sominki employee, Bukavu, 04/01/2011.

¹⁵⁸ Interview with former Sominki employee, Bukavu, 31/07/2009.

¹⁵⁹ Interview with former Sominki employee, Bukavu, 31/07/2009.

Mobale underground, costing 1 g of gold. With an entrance permit, you were allowed to carry stones to the surface, but each parcel would be taxed with an additional 5 g. Also goods that were smuggled in were taxed in this way. One interviewee remembered that he paid 2 g to let a bag full of batteries, salted fish and sugar in. After a while, the Sominki team leaders ('capita'), observing this well-functioning system, also imposed a tax on their team members, which they called a 'weekly report' (Bulambo, 2002). These 'taxation practices' can be analysed as access control mechanisms since they facilitated or opened access for those who paid, while blocking access for the rest. Yet from the point of view of the guards and team leaders themselves, they were just as well about access maintenance, since they needed these payments in order to supplement their meagre incomes. Their 'fending for themselves' was considered to be legitimate¹⁶⁰, as a former miner acknowledged: "The guards had to oversee us, but they were not paid either. They had to survive just like us"¹⁶¹.

In February 1989, Captain Mushitu became head of the Mining Police. He openly offered protection and support to the Ninja and even defended them in court. In return, the entrance fee to Mobale was raised to 2 g of gold, plus 1 g for the guards and an additional 2.5 g per week for Captain Mushitu. The number of Ninja rose to 300-800 people (Bulambo, 2002: 101)¹⁶² and they chose a few leaders amidst them. These were former Sominki workers who knew the underground labyrinth perfectly. They sometimes stayed underground for more than a month¹⁶³. On the trading side, the system of sponsorship was refined and expanded (Bulambo, 2002: 76). The local buyers sponsored the Ninja by providing them with food and other necessary equipment for entering the underground shafts, and giving daily rations to their families (Dupriez, 1987).

All these activities were threatening the performance of a company that was already facing a crisis of production and financial shortages. Soon after liberalisation, Sominki realised that harsh repression would not solve the problem of artisanal mining. Therefore the General Director opened up some parts of the concession for artisanal exploitation in 1983 (Bulambo, 2002: 75)¹⁶⁴. This way, some miners, more specifically technically unemployed ex-workers, were allowed to dig in abandoned parts of the concession, while there was still a technical and security control by the company¹⁶⁵. In 1983 the Zairian government insisted that Sominki would open a 'comptoir' to buy the artisanal production, in order to stop smuggling to Bujumbura¹⁶⁶. In 1984 the company did open a comptoir, they paid a tax of USD 50,000 to the government, but the comptoir bought only 25 kg of gold that year¹⁶⁷ (see figure 2). It was forced to close because the prices they offered could not compete with the prices on the black market. Besides, all Ninja were closely tied to their respective sponsors, to whom they were supposed to sell.

¹⁶⁰ See section 1.3.

¹⁶¹ Interview with former miner, Lugushwa, 25/01/2012.

¹⁶² Estimates in Bulambo (2002: 101). A former syndical delegate estimated the total number of Ninja at 800 (Personal communication, Bukavu, 18/06/2009).

¹⁶³ In 1992, seven Ninja stayed underground for a period of three months (Interview with former Sominki worker, Bukavu, 27/07/2009).

¹⁶⁴ These parts were Matenende, Calvaire, Nyakarangwa, G15, G22, Meno ya Nguruwe, Zalya and Mabeti.

¹⁶⁵ Personal communication with Serge Lammens, 20/10/2008.

¹⁶⁶ Personal communication with Serge Lammens, 11/07/2009.

¹⁶⁷ Personal archives Serge Lammens. For cassiterite though the same system did work rather well.

Industrial production completely declined from the mid-1980s onwards (figure 2). This was due to poor economic policies at the national level and a decaying of the physical infrastructure. It had disastrous effects on the company and its workers. From 1976 until 1984, cassiterite production had been more profitable than gold, because the price of cassiterite on the world market was steadily rising. But in October 1985, the price of tin on the world market suddenly crashed. Sominki was confronted with serious financial problems. In 1986 and 1987 drastic measures were taken. First of all, the number of expatriates working in the company was reduced from 100 to 20. Secondly, the Congolese personnel, more than 12,000 before the crisis (of which 2000 to 3000 in Kamituga), was reduced by one third, before falling to a number of less than 4000 employees during the 1990s. In 1989, the world tin price crashed again, urging the private shareholders to look for a buyer. Several candidates were interested in the Twangiza gold deposits¹⁶⁸, but recoiled at the idea of having to buy the totality of Sominki.

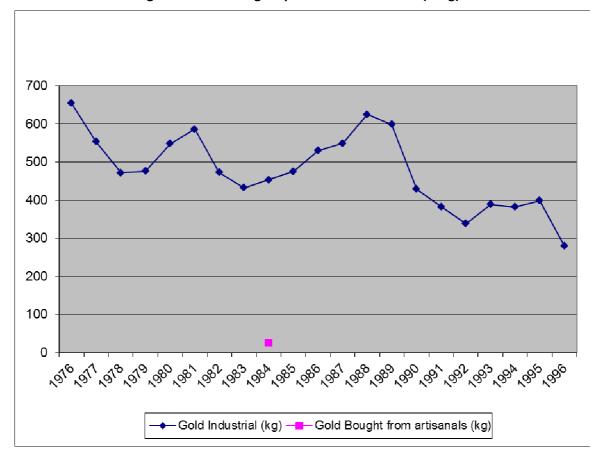


Figure 2. Sominki's gold production 1976-1996 (in kg)

Source: Personal archives Serge Lammens

¹⁶⁸ At the end of the 1980s, gold represented 30 percent of Sominki's profits, although there were just two sites: Kamituga and Lugushwa. In Kamituga, the production reached about 30 kg per month, in Lugushwa 10, which is about 500 kg per year in total. Twangiza was still largely unexploited and contained important reserves.

5.5. PROFESSIONALISATION OF ARTISANAL MINING, NEGOTIATION AND VIOLENCE (1990s AND FIRST WAR)

In the early 1990s the Ninja movement became increasingly professionalised and hierarchically organised in 13 groups of about 20 permanent members spread over different neighbourhoods (Bulambo Katambu, 2002: 123). One of their leaders was K¹⁶⁹, who had previously been a union leader for Sominki. In 1990 he took the lead in a strike for better salaries. During one of their actions they symbolically buried the General Director in front of the laboratory. When management found out that it was his idea, they fired K. He immediately decided to join the Ninja movement, partly out of revenge, partly because he had friends and brothers who were Ninja, and saw that they were well off:

"I liked women, beer and all those pleasures. Well those who had the beer, the women, who had a status in our community, were the Ninja. I thought: why not? I will be better off than working for Sominki"¹⁷⁰.

K. and some partisans usually spent several weeks, even up to three months, underground. According to him, at that moment there were about 700 Ninja who were regularly underground. The ever expanding scale of their operations was worrying the company. In 1991 Sominki hermetically closed all shafts leading to the principal underground gallery and transferred Captain Mushitu to Goma. According to some the decision to close the tunnels was one of the reasons for a severe workers' strike in 1992, apart from the more important salary claims¹⁷¹. After 52 days this strike was put down by the Zairian army (Bulambo Katambu, 2002: 50). An agreement was made to pay a special bonus to the workers in the gold concession and a compromise was made with the Ninja leaders, many of whom were eventually hired by Sominki¹⁷². Besides, a 'high security zone' was established in a diameter of 2 km around Mobale. Beyond this zone artisanal mining was tolerated¹⁷³. But the artisanal miners continued their resistance. In 1993 for example they infiltrated the 'high security zone' with the complicity of the Mining Police. After the local Director Mupepele had signalled this at the General Direction in Kinshasa and those who were responsible had been punished, the miners held a protest march¹⁷⁴.

The final deathblow for Sominki was the war. In October 1996 Rwandan RPF (Rwandan Patriotic Front) forces had taken over Bukavu. One of the divisions of the national army, the FAZ ('Forces Armées Zaïroises'), repositioned itself in Kamituga. Apart from FAZ troops, there were also soldiers from the Rwandan national army (FAR, 'Forces Armées du Rwanda') soldiers and 30 to 40 well-armed FDD members (FDD-Nyangoma, Burundian Hutu opposition). A small detachment of the Mining Police remained in Kamituga as well¹⁷⁵. According to UN reports (2010a and b) the FDD forces publicly executed between 12 and 20 Banyamulenge in the centre of Kamituga in October-November 1996. In the same period, "FDD and FAZ units killed

¹⁶⁹ This paragraph and the following are based on an interview with former Ninja, Bukavu, 27/07/2009; interview with former Sominki technician, Bukavu, 24/07/2009.

¹⁷⁰ Interview with former Ninja, Bukavu, 27/07/2009.

¹⁷¹ Personal communication with union leader, Bukavu, 08/2009.

¹⁷² Personal communication with Serge Lammens, 16/06/2009.

¹⁷³ Interview with former Sominki employee, Bukavu, 04/01/2011.

¹⁷⁴ Interview with former Sominki employee, Bukavu, 04/01/2011.

¹⁷⁵ Personal archives Serge Lammens.

around 50 Tutsi civilians by the Zalya River, a few kilometres from Kamituga (...)". According to a former Sominki employee, FDD had asked the company to hand over all Tutsi workers, but they had refused to do so¹⁷⁶. In the night of 22 November 1996, the Zairian army and their Rwandese allies withdrew from Kamituga. The small FDD group however was left behind. In an attempt to get access to the safe with the gold production, FDD kidnapped three expats, but they were soon liberated¹⁷⁷. About fifteen days after the withdrawal of the Zairian army, RPF troops arrived in Kamituga¹⁷⁸. Only later were they joined by AFDL of Laurent Kabila. In the meantime houses, offices, shops and mechanical installations had been plundered by a part of the local population. They also managed to lay their hands on the recent production, about 20 kg of gold¹⁷⁹. Some interpreted these pillages as a reaction by the population against a paternalistic company, suppressing all initiative on the part of the local population:

"MGL and its successors adhered to a very paternalistic social policy, suppressing every initiative aimed at developing the local environment and every attempt at participation by the local population. After the company had left, all its installations were destroyed because the people were not prepared to protect or manage them. In fact, the people did not identify themselves with this infrastructure"¹⁸⁰.

In this sense it can be interpreted as an access maintenance strategy turned violent. The General Director, in an attempt to control access and secure Mobale's underground levels for possible industrial exploitation in the future, ordered that the mine be flooded. This very visible and tangible act of blocking access still has consequences today. The lower levels of the mine cannot be artisanally exploited because the artisanal miners do not dispose of pumps powerful enough to evacuate the water.

Two days after the arrival of the AFDL troops in Kamituga, all mines were declared open to artisanal exploitation and the activities of the Ninja were affirmed to be legal. The new power holders thus immediately granted access. Yet at the same time they put in place a system of access control from which they benefited themselves, as miners had to pay a USD 100 entrance fee in order to work in the mine. In Lugushwa, the Mining Police itself stole 4 kg of Sominki's gold production during the night of 23 November, an act that was followed by generalised pillages. The infrastructure in Lugushwa was more badly destroyed than in Kamituga and all the workers were chased away¹⁸¹. Many of them ended up in Kamituga.

After these chaotic days, the Administrator-General Director and some colleagues tried to reorganise what was left of the company from Kalima in Maniema. On 20 February 1997, however, they were summoned to return to Kinshasa, where they were immediately fired. Three days later, the AFDL forces seized Kalima, without plundering it. At that time Mario Fiocchi, Sominki's CEO was already negotiating with a Canadian junior company, Banro, which

¹⁷⁶ Interview with former Sominki employee, Bukavu, 31/07/2009.

¹⁷⁷ Interview with former Sominki employee, Bukavu, 31/07/2009.

¹⁷⁸ Personal archives Serge Lammens.

¹⁷⁹ Procès-verbal de la cinquante et unième réunion du Conseil d'Administration tenue à Kinshasa le samedi 29 mars 1997.

¹⁸⁰ CPACAM letter, Kamituga, 10/04/2007.

¹⁸¹ Interview with former miner, Lugushwa, 25/01/2011

had shown an interest in Sominki's gold concessions. The full account of Banro's negotiations and the subsequent conflicts over Sominki's concessions will be given in chapter six.

5.6. VIOLENCE, COOPERATION AND EXPANSION OF ARTISANAL MINING (SECOND WAR)

During the second war Kamituga's hinterland was the scene of various armed confrontations between RCD, Mayi-Mayi groups and FDLR ('Forces Démocratiques pour la Libération du Rwanda'). The UN has documented the atrocities, and in particular the cruel rapes, whereby "the militia cut off women's breasts and forced them to eat them before executing them as punishment for their alleged support of the RCD-G or their refusal to undertake forced labour" (UN, 2010a). In 1999 more than 100 people were killed in the center of the town (UN, 2010b: 179). Yet the center of Kamituga was generally believed to be more secure than the surrounding countryside. Besides, the work in the mines offered much needed economic opportunities. These two factors attracted many people from the neighbouring villages (Vlassenroot and Raeymaekers, 2004a: 223). After liberalisation in the 1980s this marked a second era of expansion of artisanal mining, especially in terms of number of people involved. The rural exodus had severe consequences as well. Peasants abandoned their fields, so that they could not stand in for their own subsistence anymore, nor could they sell their products on the market. Because of the fact that Kamituga was physically completely disconnected from regional markets such as Bukavu (the only possible connection was by plane), food prices on the local market soared (idem: 213). The town evolved from a "rural peripheral mining town" to an "urbanised centre of (informal) accumulation and survival" (idem: 225). This is also reflected in the population numbers, which had more than doubled after the war.

In Mobale mine RCD installed the commander of the 6th military Brigade of South Kivu, Lieutenant Colonel Thierry Ilunga (idem: 220). Ilunga, who was locally known as 'Divisé-pardeux' (divided-in-two), demanded the miners to hand over half of their production to him. One of my respondents told me that in this period he "collaborated with him. He was very demanding. If he gave you USD 1000 to invest and you had a production of 3000, you had to give him the 1000 first, and then another 1000"182. According to people in Kamituga it was a productive period, since some rich new deposits had been discovered¹⁸³. But despite the fact that RCD was able to control the entrance to Mobale, mining sites outside Mobale remained beyond their control. As Vlassenroot and Raeymaekers (2004a) said, RCD was never able to fully control the trade system either, neither locally nor regionally. From the hinterland, which remained largely under the control of Mayi-Mayi and FDLR groups, long-established traders, mainly of Bashi origin, continued to smuggle gold and coltan to neighbouring countries without the knowledge of the RCD administration, thanks to their long-standing commercial relationships and networks (idem: 221). But in Kamituga RCD also collaborated with local traders. The resultant "private protection mechanism" that was set up, led, according to Vlassenroot and Raeymaekers (2004b: 141) to a situation of mutual benefit and a very close relation between traders and military. The access control mechanisms set in place by RCD thus relied on violence and coercion. Nevertheless, they also left some room for negotiating access maintenance by local miners and traders. The 'cooperation' system (taxation in exchange for protection) between miners and security forces is a mechanism that manifests itself at several

¹⁸² Interview with shaft manager, Kamituga, 22/01/2011.

¹⁸³ Interview with miner, Kamituga, 17/08/2009.

points in history (see the Ninja in this chapter and the discussion about the mining ban in chapter eleven). It can therefore be considered part of the governance system, not only in mining but also in other sectors of the Congolese economy (see Raeymaekers, 2007; 2010). For the traders, the situation significantly changed during the war as the road between Kamituga and Bukavu became dangerous and inaccessible. Therefore, Kamituga came to rely on air transport, and on traders having sufficient financial capital in order to operate airplanes. Aviation companies such as Zalya Express and Delta Force thus became key actors in the local access control. They worked with local commission agents sending 'colis de valeur', or parcels of gold, via air to Bukavu, and importing consumer goods from the capital city, in order to sell them locally¹⁸⁴ (see Vlassenroot and Raeymaekers, 2004b : 134; Tegera and Johnson, 2007: 85). These commission agents cashed in on the price difference in gold and the exchange rate and on the air transport costs, which could run up quite substantially¹⁸⁵. Vlassenroot and Raeymaekers (idem) gave the example that to freight 100 kg of merchandise from Kamituga to Bukavu, the military commonly charged between USD 25 and 50. A trader told me that at the time he paid these commission agents USD 1.20 per transported kg, the real cost being only USD 0.80; so the agents profited USD 0.40 per kg¹⁸⁶.

RCD left Kamituga after the signing of the Sun City Peace Agreement in April 2003. In November 2003 the 107th Infantry Brigade arrived in Kamituga and took control of the town centre. According to the customary chief they retaliated against the population, using extreme violence¹⁸⁷. In the years that followed, the system of taxation by armed groups continued, although the RCD had been replaced by branches of the Congolese national army¹⁸⁸. In the wider surroundings of Kamituga FDLR groups remained active too¹⁸⁹. They continued to be involved in gold exploitation in sites like Itabi, Kigalama and Lukatu. The announcement of a military operation against FDLR (Kimia II) in 2009 incited people to flee from these villages, which had a direct effect on production and supply in Kamituga. One local entrepreneur had started a semi-industrial exploitation in Itabi, about 30 km from Kamituga¹⁹⁰. According to one account, he was caught with an FDLR commander with whom he collaborated in early 2009, and arrested¹⁹¹. The entrepreneur himself said: "When we are there, we have to follow the orders of the FDLR; they force us to do what they want"¹⁹². Kimia II also provoked a number of FDLR attacks in Mwenga territory and along the RN2 between Bukavu and Kamituga. In June 2009 163 houses were burnt down and 354 others destroyed in villages near the RN2 (IRIN, 2009). In July and August 2009, a number of buses and cars on their way from Kamituga to Bukavu were attacked. At first, the attackers were said to be FDLR, but according to many local people, they were FARDC ('Forces Armées de la RDC'), looking for an opportunity to plunder.

¹⁸⁴ Interview with NGO leader, Bukavu, 28/03/2008.

¹⁸⁵ Interview with trader, Bukavu, 24/07/2009.

¹⁸⁶ Interview with trader, Bukavu, 24/07/2009.

¹⁸⁷ Esquisse du cahier de charge de la collectivité-chefferie des Wamuzimu (entité territoriale décentralisée), 2005.

¹⁸⁸ See the documentary 'L'or noyé de Kamituga' by Yvon Lammens and Colette Braeckman (2005). The 107th Brigade controlled pits in Kaseti, for example. The 122nd was present in the main pit in Mobale. (Personal communication, Kamituga).

¹⁸⁹ There are also Mayi-Mayi groups, for example in Lugushwa, where they attacked the airstrip in November 2009. This prompted Banro to evacuate their workers. Three weeks later the FARDC (14th brigade, composed of ex-CNDP) re-established control over the area.

¹⁹⁰ Interview with shaft manager, Kamituga, 21/08/2009.

¹⁹¹ Personal communication, 06/2009.

¹⁹² Interview with shaft manager, Kamituga, 21/08/2009.

Moreover, it was said that the attackers were informed about the passage of gold traders and particularly targeted those buses¹⁹³.

5.7. PRIVATISATION, LEGALISATION AND RESISTANCE (2003-2012)

So while the security situation in Kamituga's hinterland remained uncertain and volatile, the safety in the town centre was restored. This stimulated economic activity and also attracted new actors: industrial and semi-industrial companies, who positioned themselves on the 'battlefield' of the mineral rights. As said before the new Mining Code favoured industrial mining and foreign direct investment, so privatisation is applied as a strategy for access control, granting companies research and exploitation permits to large concession areas and excluding access for artisanal miners. Just before the first war, research permits in this area had been granted to Banro, but the war situation prevented this company from doing actual research, and national, international and local power struggles further complicated the situation, as well be recounted in chapter six. Interestingly though, this confusion also gave opportunities to other structures – claiming to be companies – for claiming and controlling access. As this section will demonstrate they used legalisation, but also references to ethnic discourse and pure coercion in order to control access for artisanal miners and maintain access for themselves.

SOMICO ('Société Minière du Congo') was created by Laurent Kabila in 1998, after he had deprived Banro of its mining titles. Despite a continuing conflict with Banro over the legality of this act, SOMICO physically occupied the former Sominki offices in the centre of Kamituga. In fact, the 'company structure' in place consisted of a handful of people who took up the function of a direction, but the company never secured the necessary capital, nor the technology or machines to start up industrial production. There were also internal tensions, mainly political and ethnic-based, because the Balega had not accepted that the mwami of Luhwindja, a Mushi, had been appointed as the director¹⁹⁴. SOMICO initially closed down Mobale mine, chased away the artisanal miners and halted all production. This led to protests by the local population¹⁹⁵. Only after a visit by the Provincial Governor late 2007 a temporary agreement was concluded. In 2008 the direction in Kamituga told me they employed 263 workers¹⁹⁶, but according to the latter their salary was fixed at only USD 50 per three months and not paid regularly. Artisanal miners who were not hired by SOMICO had to pay about USD 1 for each and every entrance to Mobale¹⁹⁷, which recalled the 'taxation' systems put in place by the previous 'guards' of Mobale (be it the 'Brigade Minière' or the RCD). The SOMICO structure in place thus attempted to finance itself by taxing artisanal miners. In addition, they claimed to control the hydraulic power plant in Mungombe, and thus the electricity supply, for which they made people pay. They also demanded rent from people living in Sominki's former workers' houses. Yet the only 'authority' they could refer to, was a presidential decree that has created the company in 1998, but which had been invalidated in the meantime. So the local population in Kamituga did not think of SOMICO as a proper company and did not support

¹⁹³ Personal communication, Kamituga, 08/2009.

¹⁹⁴ Interview with former Sominki employee, 13/02/2011.

¹⁹⁵ Interviews, Kamituga, 03 and 04/2008.

¹⁹⁶ Interview at SOMICO, Kamituga, 05/04/2008.

¹⁹⁷ In April 2008 they paid FC 550. In August 2009 they paid FC 700. Considering the exchange rate, this was somewhat less than USD 1.

them in their claims¹⁹⁸. Moreover the tensions related to political alliances and ethnic divisions quickly rose. The Administrator-General of SOMICO, Itesha, was a Mushimwenda, an ethnic minority in Mwenga. Other factions within SOMICO did not agree with him hiring only people from his own ethnic group, and accused him of corruption. The management in Kinshasa also came into conflict with the Kamituga-based group.

But in August 2007 another actor had entered the scene. At that moment SOMICO concluded a partnership with Aurex Congo, a 'comptoir' that halted its export activities in Bukavu mid-2007¹⁹⁹. Beltrade Magazine (November-December 2007) reported that "Aurex International is going to transfer 50,000,000 dollars to SOMICO in order to relaunch its activities in Kamituga". The actual terms of the agreement were never made public. According to a local source, it was brokered by Jean-Marie Bulambo Kilosho, former Minister of Economy (2010-2011) and Director at the 'Direction Générale des Impôts' (DGI)²⁰⁰, who is from South Kivu and was said to be an ally of SOMICO²⁰¹. In April 2008 Aurex' representative in Kamituga told me that "SOMICO provides the concession, we do the rest: we provide the funding and the mechanical equipment"²⁰². But this good entente soon began to crack down. In the spring of 2009 Aurex exercised some pressure to replace the local SOMICO director, with whom they could not collaborate anymore. At the same time Aurex was clearly doing efforts to win the goodwill of the population. They set up about six crushing mills (to crush the ore into a fine powder) in the former Sominki workplace²⁰³. Artisanal miners came here to process their gold, which was then sold to Aurex, although they officially no longer had an export license. In September or October 2009 Aurex also installed two transformers in Mungombe's power plant, thus bringing constant electricity supply to some parts of town. According to their manager they already invested about USD 1 million²⁰⁴. But they still had no legal guarantees about the concession. That is why they left shortly afterwards.

The company Banro had been reluctant to start working in the Kamituga concession because of these contestations and was giving priority to developing its Twangiza concession. They were also faced with resistance from a group of former Sominki workers who, after more than 10 years, still demanded the redundancy payment to which they were entitled, but which had never been granted²⁰⁵. In the 2010 Agreement between Banro and the government it was agreed that Banro would put USD 200,000 at the disposal of the 'liquidation committee' for the payment of 4,904 ex-workers²⁰⁶. Yet the actual process of payment took a lot of time, because it had to start with an identification of all former workers and a detailed calculation of their seniority, as well as the medical care to which they were entitled, but of which they have

¹⁹⁸ Interviews, Kamituga, 03-04/2008 and 08/2009.

¹⁹⁹ Aurex Congo is said to be a branch of Aurex International/ Aurex Management and Investment, a Swiss-based company trading in precious metals and producing gold in Ghana, Mexico, Sierra Leone and Suriname. But their website did not mention a Congo branch:

http://www.aurex.ch/AUREXCMS/index.php?option=com_content&task=view&id=19&Itemid=36&lang=en (consulted 20/10/2010).

²⁰⁰ Interview with former Sominki employee, Bukavu, 04/01/2011.

²⁰¹ Interview with former Sominki employee, Bukavu, 04/01/2011.

²⁰² Interview at Aurex, Bukavu, 04/2008.

²⁰³ Interviews and observations at Aurex, Kamituga, 08/2009.

²⁰⁴ Interview at Aurex, Kamituga, 18/08/2009.

²⁰⁵ Interview with former Sominki employee, Bukavu, 04/01/2011.

²⁰⁶ Avenant n.2 à la convention minière du 17 février 1997, 13 juillet 2010. The committee was installed on 18/01/2010.

been deprived²⁰⁷. As this chapter started with a description of Sominki's paternalistic policies and the impact these had on Kamituga's socio-economic landscape, it is easy to see that the 'image' of an industrial company is still very present in the minds of both former workers and the broader population. The physical legacy of MGL and Sominki in the forms of workers' houses, different neighbourhoods and a number of public buildings is also very visible, as figure 3 shows. Despite the fact that former workers are critical about some aspects of the company's policies, such as the explicit access control, the coercion and the low salaries, their current socio-economic condition causes many of them to talk in nostalgic terms about other aspects, such as access to social services, cheap food and good infrastructure. They have not been able to maintain access to the latter and artisanal mining, as will be argued in chapter eight, is a way of (re)claiming their access to the benefits of gold mining.

In early 2011 Banro finally deployed a permanent team of geologists and started exploration in Kamituga. It should also be noted that physical access to Kamituga town considerably improved in 2007 thanks to the rehabilitation of parts of the 'Route Nationale 2' linking Bukavu via Mwenga and Kamituga with Kasongo. While during the rainy season traveling was still difficult, in the dry season the trip from Bukavu to Kamituga could relatively easily be made in one day, and prices to transport goods were reduced from about USD 1.20 to USD 0.40 per kg²⁰⁸. Also for small traders and miners, it became cheaper to travel to Bukavu. As I further demonstrate in chapter ten this obviously had an impact on their access.

5.8. CONCLUSION

The access analysis in this chapter allows drawing some conclusions on the changing configuration of access and control mechanisms, and consequently on power relations. As table 10 made clear, control and maintenance have always coexisted in Kamituga. Local people, including company workers, have been trying to gain and maintain access to the gold, especially by engaging in artisanal mining and trade from independence onwards. While at many points in history (harsh repression in the 1960s and 1970s, violence in the 1990s and privatisation in the most recent period) people's ability to benefit has been constrained because more effective control mechanisms were put in place by companies or national and local elites, their access maintenance strategies have sometimes been effective, even to the extent that they were able to exclude others from the ability to benefit. Sominki for example lost out a considerable amount of money as a consequence of thefts, and during the 1980s and 1990s artisanal miners were able to compel the company into a strategy of tolerance and negotiation. This was based on a combination of rights-based (claiming the ancestors' land, surviving after state retreat, resisting the foreign company), structural (financial capital and an unofficial market for gold) and relational (with traders and security forces) mechanisms, but also on instances of violence (pillaging company assets and joining armed groups). More recently SOMICO – a company in theory but actually a structure of local and provincial elites – pursued a legalisation strategy in order to maintain access to Mobale mine. They were not able to acquire the control though, and eventually they would lose all access, because the legal base on which they based their claims disappeared as well (rights-based mechanism), and because they did not have access to financial capital to make investments (structural access

²⁰⁷ Interview with former Sominki employee, Bukavu, 04/01/2011.

²⁰⁸ Interview with trader, Bukavu, 24/07/2009.

mechanism). I have also pointed to two instances in which artisanal mining activities expanded in scale (after liberalisation and during the war), providing opportunities to different segments of the local population. The expansion in the 1980s followed a period in which artisanal mining and trade had already been professionalised, which in this case means that a distinct production mode had emerged with its proper dynamics and its own professional norms, as will be discussed in part three.

The particular configuration of access mechanisms was shaped by local realities, but also by the broader political economy (at the national and the international level). For example, the neo-patrimonial politics put in place by President Mobutu shaped a local governance system that encourages individual state agents to 'fend for themselves' and levy taxes and payments in order to provide for or supplement their income. These payments are exchanged for protection, and thus constitute the 'cooperation system' that has been discussed in this chapter. The paternalistic nature of the company and the segregation put in place by MGL played a crucial role in shaping the local physical and socio-economic landscape. But also events such as the crash of the tin price in 1985 had tangible effects on people's livelihoods, even when the latter were not directly integrated in the tin commodity chain. For my analysis in part three, it is important to remember that the roots of today's artisanal mining and trade system can be traced back for many decades and that historically, access has always changed.

"Ceux-ci se considèrent comme propriétaires du terrain aurifère, et se crurent en droit de réclamer aux ouvriers, puis aux mineurs qui étaient accourus, dix pour cent de l'or qu'ils récoltaient. Ceux-ci ne voulurent pas l'accepter" (p.305).

"They considered themselves as owners of the gold site and appropriated themselves the right to claim 10 percent of production from the miners. The latter refused to accept" (p.305).

In this chapter I dig into the history of Luhwindja. Historical events related to artisanal and industrial gold mining will be discussed in chronological order, giving a description of the colonial period in 6.1; the emergence and consolidation of artisanal mining from the 1960s until the 1990s in 6.2; the appearance of Banro Corporation in 1996-97 in 6.3; and the disputes over the concession during the war and post-war period in 6.4 and 6.5; and a conclusion in 6.6. This chapter also provides an access analysis, focusing on the most important mechanisms adopted by artisanal miners and traders, industrial companies and national and local elites²⁰⁹. As represented in table 11, attention will be paid to access control by companies and elites, but also to access maintenance by artisanal miners and traders²¹⁰.

| Actors | Miners and traders | | Company | | Elites | |
|-----------------------|--------------------|------------------------|---------|---------------------------------|--------|---|
| Access maintenance | Col | | Col | | Col | |
| | 60-90 | Start and expansion AM | 60-90 | Tolerance AM Relations | 60-90 | Legitimisation Relations |
| | 96-97 | | 96-97 | | 96-97 | |
| | 98-04 | Relations Violence | 98-04 | | 98-04 | Legitimisation |
| | 05-12 | Resistance/ rights | 05-12 | | 05-12 | |
| Access control | Col | | Col | Labour Coercion/ violence | Col | Labour |
| | 60-90 | | 60-90 | Tolerance AM | 60-90 | Taxation |
| | 96-97 | | 96-97 | Legalisation | 96-97 | Privatisation |
| | 98-04 | | 98-04 | Violence Legalisation | 98-04 | Relations Violence Legitimisation Territorialisation |
| | 05-12 | | 05-12 | Relations | 05-12 | Privatisation Legitimisation Territorialisation |

Table 11. Access analysis of Luhwindja's mining history

Source: Author's own representation

²⁰⁹ The same remarks as in chapter five apply with respect to the definition of the 'elite' category and the fact that the mechanisms presented in the table are not exhaustive.

²¹⁰ Access maintenance by artisanal miners and traders will be more extensively discussed in part three.

Luhwindja is a chiefdom located about 60 kilometres south-west of Bukavu in Mwenga territory. It consists of nine 'groupements': Bujiri, Burhembo, Chibanda II, Idudwe, Kabalole, Karhundu, Luchiga, Luduha and Mulama. The region is mountainous, with the highest point reaching 2500 metres (OGP, 2008: 5). The number of inhabitants is estimated at about 65,000²¹¹. Most of them are dependent on agriculture. Cattle rearing is also an important economic activity, as well as mining. Whereas currently the multinational company Banro is exploiting gold, artisanal mining was practised on a large scale until very recently. The alluvial mining sites were mainly situated in Mwana and Lulimbohwe rivers. The water in these rivers was diverted into little muddy currents so as to allow for gold panning. Underground shaft mining was concentrated in Mbwega, Lukunguri and Kaduma. In Mbwega, there were reportedly more than 600 shafts. According to Observatoire Gouvernance et Paix (OGP, 2008: 29) more than 5000 households were dependent upon the gold exploitation in Mbwega. With respect to the total number of miners in Luhwindja, estimates go from 6000 to 12,000. These were mostly local people (about 70 percent), but there were also miners from other areas, primarily from the neighbouring chiefdoms of Burhinyi, Ngweshe and Kaziba (OGP 2008: 27). Luhwindja is one of the seven chiefdoms of the Bushi, an area stretching out roughly over the north-east of South Kivu province, inhabited by the Bashi people. The other chiefdoms are Burhinyi, Nindja, Kalonge, Kaziba, Kabare and Ngweshe. They emerged as distinct entities in the 19th century, each governed by a king or 'mwami' (Chrétien, 2006: 118, 165).

The Bashi kingdoms share some cultural characteristics, in terms of religious conception and clan organisation, with the Bavira and Bafulero from the Uvira region, the Bahavu from Kalehe, and Rwandan and Burundian neighbours (idem). There have also been many contacts, alliances and conflicts between the different 'bami' (plural of 'mwami'), and migrations from one kingdom to another (Masson, 1966). The 'mwami' had little direct political power. His power was mainly situated in the ritual realm, and was exerted because people respected the sense of community he represented. His main task was to ensure the wellbeing of the population, captured under the concept 'ubwami' (Newbury and Newbury, 1982; Newbury, 1991; Newbury, 2009: 34). The 'ritual legitimacy' for kingship was thus very important. In the management of the rites and ceremonies, the king was assisted by the ritualist clan of the 'bajinji' (Chrétien, 2006: 130).

The land in Bushi traditionally was both a community good and a community responsibility. This did not mean that anyone had access to the land. The mwami could grant user rights to individuals, who became like 'stewards' over the land. But the mwami also had the right to take away the land if it was abandoned or abused, for example (Sosner, 1979: 191)²¹². The most common form of customary contract was the 'kalinzi', which has now evolved from a traditional to a more modern practice²¹³. In the traditional conception, kalinzi represented the definition of a set of relationships between people, rather than a kind of proprietor relationship with the land. A man could ask the mwami for the usufruct over a plot of land. The mwami allocated these rights in exchange for a symbolic payment, which came mostly in the form of cattle (a cow) and banana beer and was handed over in a special ceremony in the

²¹¹ Mwamikazi, *Point de presse sur la pétition*, 26/01/2012.

²¹² Personal communication David Newbury, 07/05/2013.

²¹³ There were other types of customary contracts, ranging from simple user rights ('obuhashe') over rental-like contracts ('bwasa') to sales-like contracts ('bugule'), but 'kalinzi' was the most common (Ouchinsky, 1966).

presence of witnesses. Most importantly, by this act the suppliant became a 'political subject' of the mwami, had to pay his fiscal contributions and work on the king's land. His 'subjectisation' needed to be regularly confirmed through acts like 'kushiga' (presenting yourself to the chief). As such, land and cattle were at the core of political, social and economic relations in the Bushi. They were "the foundations on which local kingdoms had been built" (Sosner, 1979: 191). In fact, this system created a "network of dependent relations" between the king and his subjects, thereby "legitimizing the whole social organisation" (Van Acker, 2005: 81; Vlassenroot and Huggins, 2005).

The colonial administration however introduced a dual system and made a division between 'state land' governed by state law and 'indigenous land' governed by customary law. This duality persisted until the introduction of the General Property Law in 1973 that proclaimed all land state property. The state may now grant temporary or perpetual user and withdrawal rights to moral and physical persons respectively in the form of 'concessions'. With this law customary chiefs lost their de jure control over the allocation of the land. Article 389, however, stipulates that land occupied by local communities may still be held under customary arrangements. The specificities for this were to be formulated in a presidential decree. But that decree has not been issued yet (Uthsudi and Ansoms, 2011). As a consequence land arrangements are now characterised by high levels of ambiguity regarding the legal status, the rights of the users and the norm-producing authorities responsible for governing it (Mugangu Matabaro, 2008). Due to the weak implementation capacity of the Congolese state, the de facto duality between state land and customary land has persisted in the Bushi area. But the nature of the kalinzi system has changed, increasingly resembling a commercial transaction, granting full ownership rights to those who have paid for it. Nevertheless, neo-traditional practices were still disguised as 'traditional', which helped the customary chiefs to retain their legitimacy and reinforce their control over the land. But let us now start analysing the historical trajectory of Luhwindja and look in particular at access to the gold mines.

6.1. COERCION, LABOUR AND ELITE CAPTURE (PRE-1960S)

In the beginning of the 20th century the Belgians established a colonial operating base in Luvungi/ Nyangezi, in Uvira territory. From there several missions were carried out to the Bushi with the aim of subjecting the bami and the population, but they were faced with fierce resistance (Chrétien, 2006: 289; Vlassenroot, 2013: 20). As Musimwa Bisharhwa (1982) described, each time a colonial delegation visited the area, the people would pull back in the forest, and the mwami for several years refused to meet the whites, also out of fear of becoming ill. But the massive 'withdrawals' of the population, as well as the wars with neighbouring chiefdoms, had a huge economic and social impact. Moreover, experience told them that other bami who had agreed to collaborate with the colonisers lived in relative peace. In 1920 the new mwami, Chibwire IV, finally agreed to meet with the colonial agents, and Luhwindja was thus subdued (idem: 51).

This subjection, which largely relied on coercion, had far-reaching consequences for the chiefdom and for the chief himself. On the one hand, his position was weakened. He lost a great deal of his political power and became a mere 'agent' of the colonial regime. His position as the 'owner and manager of all land' was threatened. In the entire Bushi region vast surface

'QUI CHERCHE, TROUVE'

areas were sold to white plantation owners by the 'Comité National du Kivu' (CNKI) (Dupriez, 1987: 19; Chrétien, 2006: 289). The colonial legislation introduced a system of privatised land titles with a view to valorising land in this fertile region as quickly as possible. This gave rise to a dual land system in which a division was made between 'state land' governed by state law and 'indigenous land' governed by customary law (Utshudi and Ansoms 2011: 29). The mwami was also required to fulfil his fiscal obligations, in other words, to make his people pay taxes. Therefore he needed to recruit labourers to work on the plantations and in the mines. MGL started to explore the alluvial deposits in the river Mwana in 1957. Until the 1970s there was some alluvial exploitation in the Twangiza concession, but production was limited and hence there was no industrial labour force in Luhwindja. Instead, people were sent to Kamituga as MGL recruited many workers there to work in the underground mines. As Sosner (1979: 192) said, for the local population forced labour "soon became just another form of tribute owed to their chiefs, albeit one they often tried to escape", as was already demonstrated by the 'Binji Binji' revolt against forced plantation labour that started in 1931 in Ngweshe (Vlassenroot, 2013: 20).

On the other hand, the mwami's position was strengthened and his dominance over land was consolidated as it was integrated into the new colonial administrative structures (Vlassenroot, 2013: 15). The chief was now able to substantially benefit from being an intermediator between the colonisers and the population. The intensive plantation culture led to overexploitation of the Bushi land in the 1930s and a terrible famine in 1943. In an attempt to turn the tide the colonial regime introduced a policy of 'peasantisation'. Peasants would be granted stable land titles and encouraged to cultivate cash crops in line with a new 'scientific model' for agriculture (Sosner, 1979). But the policy desperately failed to raise rural peasants' living standards. According to Sosner (1979) an important reason for this was the reluctance of the chiefs to grant stable permits, because they wanted to retain their control over the land. This is a pattern that we will see repeated later in history. Sosner's conclusion (idem: 194), which described a process of elite capture, reads as follows:

"Perhaps the people who profited most from peasantization, plantation development, and an inadequate infrastructure were the traditional Shi authorities, especially those at the upper kingdom levels, and their allies, the mission-educated elite. While the latter took advantage of the new employment opportunities created by colonialism, the former profited by mediating between, on the one hand, their subjects and the administration and, on the other, their subjects and the planters. As intermediaries between peasants and planters, chiefs were the primary recruiters of native labour until the mid-1950s".

Being a chief thus gave access to a new range of economic and political opportunities through the establishment of strategic alliances with the colonisers. Throughout Luhwindja's history similar dynamics have caused many disputes among elites and broader local conflict, as will be further demonstrated. The last will of Mwami Chibwire IV stipulated that his second son Mulindababisha, who had completed his studies, would succeed him, which happened in 1932. But the latter's regime was reportedly characterised by violence and disrespect for the customary traditions, which led to the mwami's dethronement in 1935 (Musimwa Bisharhwa, 1982: 64-68). Mulindababisha was succeeded by his elder brother Rusagara, and not by his son Ruvura, who, despite being underage, could have been officially crowned, while leaving the regency to another family member. This fact led to a succession dispute that has surfaced at regular times in Luhwindja, and still persists today. The ritual dimension of this is equally important. In Bushi, it is said that a prince is always born with 'grains' (sorghum grains) in his hand. This is to be interpreted as a sign of legitimate kingship (Chrétien, 2006: 123). In these kinds of succession conflicts, the symbol of the grains is thus often used as an argument to say that this or that man can be the legitimate king. In 1939 Rusagara was succeeded by his underage son Mukuba Bulungu Raphaël (Chibwire V), who during a first period (until 1951) was represented by a regent, Lugirira. After Mukuba's coming to power, he was quickly accused of corruption by the colonial powers and sent to prison. During this period, his cousin Ruvura was installed. His reign however was interrupted by the political turmoil right after independence.

6.2. Emergence and expansion of artisanal mining, taxation and legitimisation (1960s-1990s)

After independence an 'extraordinary commissioner', a function like a Provincial Governor, was appointed in South Kivu. The commissioner, Kashamura, was Mukuba's brother-in-law and helped the latter reconquer his seat on the throne of Luhwindja (Musimwa Bisharhwa, 1982). Mukuba remained on the throne until 1985, when his son Kashema Rusagara Philemon succeeded him. Until today however the Ruvura family has continued to claim the position of king, arguing that Kashamura removed them from power in an illegitimate way and that the members of the Mukuba family can only act as regents²¹⁴.

While these seemed to be struggles over political power in the first place, they actually were about access control as well, more particularly access to the mining profits. Indeed, just like in Kamituga people soon started to mine in an artisanal way. Although they had been told that it was dangerous to touch the gold, shortly after independence the 'white man's narrative' quickly lost its power and the local population claimed and gained access to the benefits from gold. As one interviewee recalled:

"No black man was allowed to dig for gold. If he were to touch gold, he would be murdered by the white man. We did not know gold before. We only used other material to make our tools like machetes and hoes, later we found out it was cassiterite. When the white man left and we got independence, the black man also started to mine, because everything was left behind by the white man, and the black man could put everything in his pockets and sell to the white man"²¹⁵.

Unlike Kamituga, where customary chiefs did play a role in artisanal mining but their position was not that strong in comparison to other actors, in Luhwindja the mwami occupied a key position. In fact, the whole kalinzi system with the mwami as allocator and safeguard of the land, and land rights in exchange for subjection, was transposed to artisanal mining. If one wanted to pan for gold on a certain spot in the river, or to start digging for underground gold veins, one needed to ask the mwami's permission. The latter registered the demand, made a decision, controlled the mining sites and through his representatives collected monthly taxes.

²¹⁴ Interview with Ruvura family, Bukavu, 10/10/2012 and different letters from the personal archive of the Ruvura family.

²¹⁵ Interview with old man, Luhwindja, 01/2011.

This contribution, locally called 'citore', normally had a value of about 1 g of gold. Apart from this, the mwami could also ask additional ad hoc contributions and shares of the production. He thus derived considerable benefits from the artisanal exploitation of gold. Dupriez (1987: 105) estimated that about one tenth of total production disappeared into the chief's pockets. As I have explained, the roots of this system were to be found in the hierarchical organisation of the Bushi society, where all inhabitants were "either the [chief's] immediate subjects or the subjects of his subjects. All directives move downward along this chain of command, and tax and tribute move upwards" (Sosner, 1979: 196). Sosner (idem: 199) asserted that local people clearly understood how this system worked and manoeuvred within it. Since they depended on the hierarchical system for their land and livelihoods, they did not openly contest it. Rather, they expressed their discontent "through symbolic defiance and passive resistance" (idem).

In artisanal mining, the whole system became fully consolidated after 1975. In that year MGL abandoned the industrial mines in Luhwindja because they were not profitable anymore and because it had become too dangerous to transport the ore from Luhwindja to the factory in Kamituga²¹⁶. When Sominki replaced MGL in 1976, they only left a small delegation, some installations and some guards in Luhwindja. They have done some feasibility studies during the 1970s and 1980s, but there was no industrial production²¹⁷. Artisanal production on the other hand flourished, and Sominki turned a blind eye²¹⁸. Just like in Kamituga, the liberalisation of the gold sector in 1982 caused a dramatic expansion in terms of number of people who started to mine artisanally. Peasants left their villages 'en masse' to try their luck in the gold mines. In 1987 Dupriez described the impacts on the socio-economic life in the Bushi area. His assessment was mixed. On the one hand, he observed that the profits generated from gold mining were not sufficiently reinvested in the local economy. "They do not contribute to an improvement of food intake in the families, nor do they stimulate local agriculture", he reported (idem: 105). The profits were generally captured by a small class of elites, and were canalised to Bukavu, or abroad. Locally they were spent on alcohol and prostitutes, and caused disruption and separations of families. On the other hand, Dupriez maintained that these profits had the intrinsic capacity to foster local development and redistribution:

"Liberalization has had a positive effect in the region. For the first time in history of the Bushi, a considerable social and economic event has taken place outside the feudal and colonial enterprises, even if the latter still determine the fundamental organization. [...] The 'petit peuple' needed liberalization, in order not to starve from demoralization and malnourishment, but how long will the powerful find that the game is worth the candle? (idem: 106)".

The same observations were made by Vwakayanakazi (on North Kivu, cited in MacGaffey, 1986), who argued that artisanal gold production "brings about some expansion of the local economy". In Luhwindja chiefdom the entire monetary economy came to be built around the mining activity, as gold was traded at the local market and side-activities like petty trade, transport, catering, prostitution, entertainment and so on developed²¹⁹. While agriculture remained the most important livelihood activity (cassava, beans, sorghum, bananas, potatoes)

²¹⁶ Personal archives Serge Lammens; OGP (2008).

²¹⁷ Banro (2009) Updated resource statement and feasibility study n.43-101. Technical report Twangiza Gold Project, South Kivu Province, Democratic Republic of Congo, carried out by Senet.

²¹⁸ Interview with former Sominki employee, Bukavu, 16/05/2012.

²¹⁹ Interview with CODELU, Bukavu, 20/05/2012.

and many households also raised chicken, goats or cows, most of it was at subsistence level (OGP, 2008: 21). The trade in primary necessities, clothes and beer was concentrated on the mining sites, and prices at local markets were significantly higher than elsewhere.

So during this period, the local population gained access to the gold mines as the company had physically retreated. They maintained their access by paying contributions to the local chief. The chiefs in turn controlled access by setting up a taxation system for artisanal mining and trade which mirrored the 'kalinzi' system that was in place for access to land. But at the same time, this can be interpreted as a maintenance strategy on their part, as they attempted to hold on to their ability to benefit, even under changing external circumstances. The industrial company turned a blind eye as this area was not within their core concession, and gave control in the hands of the mwami.

6.3. PRIVATISATION AND LEGALISATION (1996-1997)²²⁰

But in the early 1990s Sominki's production had drastically declined and they were looking for a buyer²²¹. At that time, the entire country was in a situation of prolonged political and economic crisis, which forced the Mobutu regime to sell its shares and privatise some mining companies, as said in section 2.2.1. In 1994 the British gold group Cluff Mining declared its interest in a possible take-over. They paid for an option (De Failly, 2001)²²², which was renewed every month until September 1995, when they thought they were the only ones interested, and renewing was not necessary. However, the Canadian junior company Banro Corporation had contacted Sominki's CEO, Mario Fiocchi, through Patrick Mitchell, a Kinshasabased American lawyer who was close to president Mobutu's entourage. Banro wanted to take over the private shares in Sominki (64 percent of total shares), but from the beginning they targeted the gold concessions only. In 1995 they had sent a technical mission (CME) to the four main gold concessions (Twangiza, Lugushwa, Kamituga and Namoya). The CME presented its feasibility study in January 1996²²³. It recommended to start a gold exploration project and did not mention the tin or cassiterite sites. However, Banro failed to collect the necessary USD 3.5 million to take over the shares of the private shareholders. So on 31 January 1996 they concluded an agreement with Cluff Mining²²⁴, which brought the necessary funds in.

Junior companies like Banro aim to engage in exploration, which is very costly and may imply a high level of risk and a low rate of return. They hire engineers and financial experts, and when a promising site appears to be profitable enough, they will try to sell the mining rights to a large mining company (Kennes, 2000: 307; Bebbington et al, 2008: 900; Luning, 2008: 390). Hence there is a lot of speculation involved. From mid-1996 onwards Banro and Mario Fiocchi

 ²²⁰ A lot of the information provided in this section can be found in the personal archives of Serge Lammens.
 ²²¹ See chapter five.

²²² On 5/12/1994, Cluff Mining Ltd bought 7.65 percent of Sominki's shares through its subsidiary MDDZ ('Mines d'Or du Zaïre'), with an option on the shares of the private shareholders.

²²³ Sominki (1996) Procès-verbal de la quarante-huitième réunion du Conseil d'Administration tenue à Kinshasa le samedi 10 août 1996.

²²⁴ Banro brought in USD 125,000, Cluff USD 3,375,000. The conditions were that Cluff would be responsible for the management of Sominki and its activities, Cluff would hold the right to commercialise cassiterite, coltan and wolframite and to appoint the majority in the Administrative Council. The new shareholders were Banro: 36 percent, Cluff mining: 36 percent and the Zairian state: 28 percent. Personal archives Serge Lammens. See Kuediasala (2006); Baracyetse (1999).

were accusing Cluff of non-respect of the conventions and of deliberately delaying the project²²⁵. Whereas Banro wanted to take off immediately with the project proposed by CME, Cluff was more hesitant and asked for a thorough study and an approval of the Mining Agreement by the Zairian state. In the administrative council of 10 August 1996 Cluff was put under serious pressure and agreed to present its own feasibility study within six weeks. The deadline would be 21 September 1996, the day of the next Administrative Council. Sensing that a majority of the Board members were on Banro's and Mario Fiocchi's side however, Cluff preferred to sign a direct agreement with Banro, just half an hour before the start of the meeting. Cluff handed over all its shares in Sominki to Banro, in exchange for a small percentage of the shares in Banro²²⁶. When the 'liberation war' broke out in 1996 and Kamituga and Lugushwa, as said in chapter five were plundered, Banro and its associates considered this as an excellent opportunity to invoke 'act of God', firing the personnel and getting rid of the tin concessions²²⁷. But this did not work as the Kalima headquarters were not pillaged.

In this highly insecure context, Banro was hedging its bets. It negotiated both with the Mobutu regime²²⁸ and with Laurent Kabila, who headed the AFDL rebellion and was still based in Goma at that moment. So the company pursued its legalisation strategy on two fronts. While Kabila had promised Banro to respect their titles to the four gold concessions, the negotiations with the Mobutu regime resulted in the creation of SAKIMA ('Société Aurifère du Kivu-Maniema'). On 13 February 1997 the creation of SAKIMA was approved by the Zairian government²²⁹. It was now clear that Sominki had to go into liquidation. This happened during the General Assembly of 29 March²³⁰. On 6 May 1997, a few days before the seizure of Kinshasa by AFDL forces, the Zairian Prime Minister signed a decree that effectively created SAKIMA (Baracyetse, 1999), with 93 percent of the shares belonging to Banro and 7 percent to the Zairian state. Although SAKIMA should have taken over both the assets and liabilities, the rights and obligations²³¹, they pretended to be deprived of any obligations against personnel or suppliers. They refused for example to pay the redundancy payment for former Sominki employees²³². In the months thereafter, there were several complaints about SAKIMA and 'Sominki en liquidation'. For example, SAKIMA would have sold two airplanes worth USD 3.5 million each for only USD 40,000, exported coltan and cassiterite in a fraudulent way, and let disappear Sominki's archives in South-Africa (Le Potentiel, 2010). But in this same period SAKIMA also started some exploration works in Twangiza.

²²⁵ Sominki, Procès-verbal de la quarante-huitième réunion du Conseil d'Administration tenue à Kinshasa le samedi 10 août 1996.

¹⁰ août 1996. ²²⁶ In the personal archives of Serge Lammens, it says 12 percent, Baracyetse (1999) says 20 percent, De Failly (2001) 14 percent.

^{(2001) 14} percent. ²²⁷ Interview with Serge Lammens, Ottignies, 05/09/2008. See Sominki (1996) *Procès-verbal de la quaranteneuvième réunion du Conseil d'Administration tenue à Kinshasa le 21 septembre 1996*.

²²⁸ 'Gouvernement de salut national' headed by Norbert Likulia Bolongo (09/04- 19/05/1997).

²²⁹ République du Zaïre, *Convention minière entre la République du Zaïre et la Société Minière et Industrielle du Kivu* 'Sominki' et Banro Resource Corporation, 13/02/1997.

²³⁰ Sominki, Procès-verbal de l'Assemblée Générale Extraordinaire des Actionnaires du samedi 29 mars 1997.

²³¹ Sominki, Procès-verbal de la cinquantième réunion du Conseil d'Administration tenue à Kinshasa le vendredi 15 novembre 1996.

²³² République Démocratique du Congo, Ministère des zones stratégiques de développement, *La réaction à l'aide mémoire de Mitchell et associates au Ministre des zones stratégiques de développement*, 10/1998.

In order to dispose of the tin concessions, Banro handed them over to a subsidiary they had created, 'Ressources Minières Africaines' (RMA), headed by Victor Ngezayo, an extremely rich businessman with Rwandese roots. RMA at its turn also declared having nothing to do with the liquidated Sominki and its employees. Ngezayo was not planning to engage in production, but merely wanted to export the cassiterite stocks that were left in the Sominki depots. Yet the local population and the workers heavily protested against this intention²³³. They argued that the stocks would serve to pay their redundancy payment and caused a lot of trouble in the tin-producing areas in March and April 1998. One of Kabila's ministers, being on a mission in Maniema, heard about these protests and raised the matter with the president. In an attempt to gain more control over the gold and cassiterite production in this region, Kabila first took the initiative to prohibit artisanal mining within concession borders in April 1998²³⁴.

The government thus pursued a privatisation strategy, giving the concession to an international mining company. Yet all this was taking place against the background of a staggering regime and a relatively quick take-over of the country by a new rebel movement, supported by neighbouring countries. It was a highly turbulent momentum from which Banro, as a junior company prepared to take risks, benefited. Their strategy was to negotiate with both the collapsing and the new regime, which can be seen as a legalisation mechanism, even though it was not clear in this context who was making the law and who was the state. But they did manage to conclude an agreement, just a few days before the regime effectively collapsed in 1997. In the course of 1998 it became clear that Banro was setting up new alliances, which led them into the second war period.

6.4. VIOLENCE, LEGALISATION AND TERRITORIALISATION (1998-2004)

On 31 July 1998 Laurent Kabila deprived Banro of its mining titles because of "irregularities in the liquidation of Sominki and the creation of SAKIMA". The president created a new stateowned company: SOMICO²³⁵. This can be interpreted as a strategy to control and centralise revenues in the hands of the new regime. But there was also a more fundamental and 'nationalist' dimension to it, as the Kabila regime wanted to reform the mining sector and make it more independent from major Anglo-American companies (Kennes, 2005: 163)²³⁶. Banro from its side had close connections with the new RCD rebellion, which had broken out on 2 August 1998, two days after the creation of SOMICO. The director of SAKIMA, Alexis Thambwe, was one of the RCD's founding members and later RCD-Goma's 'foreign minister' (Tull, 2005: 168). Victor Ngezayo, the director of RMA, initially supported the rebellion as well. But in 2000 he founded his own political party in South Kivu, a rival to RCD-Goma: 'Mouvement des Patriotes Congolais' (MPC) (Le Potentiel, 2010), which troubled the relations between Banro and RCD. In October 1998 RCD-Goma took possession of the coltan and cassiterite stocks from SAKIMA and RMA. They also declared all former Sominki concessions 'abandoned property' and granted an export monopoly for coltan to SOMIGL ('Société Minière des Grands Lacs') in 2000 (Vlassenroot and Raeymaekers, 2004: 208-209). Just at this moment,

²³³ Interview with former Sominki employee, Bukavu, 31/07/2009.

 $^{^{\}rm 234}$ Interview with former Sominki employee, Bukavu, 31/07/2009.

²³⁵ The president issued four decrees: Decree n. 101 annulling the Decree that created SAKIMA, Decree n. 102 annulling the Agreement of 13 February, Decree n. 103 creating SOMICO and Decree n. 104 nominating SOMICO's president.

²³⁶ See section 2.2.1.

coltan prices were booming on the world market. Consequently, RCD and its Rwandese allies were making huge profits. However, the Congolese comptoirs resisted the monopoly, which led to its abolishment in 2001. In that same year, RCD made a new attempt to control the local mineral markets by establishing Congo Holding Development Company (CHDC) (idem: 209-210), a mineral exploitation and trading company. RCD granted the titles on the former Sominki concessions to CHDC and it was in this context that they put Lieutenant Colonel Thierry Ilunga in control of Mobale mine in Kamituga²³⁷. In the 2002 report by the UN Panel of Experts, Banro was blamed for being "in violation of the OECD Guidelines for Multinational Enterprises" (UN, 2002: par. 177), as it was operating in a war zone.

So the creation of SOMICO can be interpreted as a nationalist answer to all these 'external interventions'. In this sense it was also symptomatic that Kabila appointed the mwami of Luhwindja, Philemon Kashema Rusagara, as a director. As I said before, the mwami organised and substantially benefited from artisanal exploitation. But he legitimised his access control by presenting himself as the traditional and legitimate rights holder, as opposed to Sominki, the external investor. With the creation of SOMICO, extraction in Luhwindja continued just like before, this means in an artisanal way, controlled by the customary chiefs. SOMICO never managed to attract investors, to secure funding, or to do large-scale mining works. On 20 December 2000 Philemon was murdered in France, under circumstances that have not been disclosed to date. Some speculate that Banro was involved, that he was smuggling minerals (uranium), that he was trafficking arms, or that it was a personal reckoning²³⁸. Just a few weeks later, Laurent Kabila was assassinated. This event had consequences for Banro as well.

In 2000 Banro had filed a lawsuit before a tribunal operating under the auspices of the International Centre for the Settlement of Investment Disputes (ICSID), which initially proclaimed itself incompetent. In January 2001 they filed a new lawsuit against the Congolese state, demanding a compensation of USD 1 billion before the United States Federal Court, invoking the 'Foreign Sovereign Immunities Act'. However, on 16 January President Laurent Kabila was murdered and succeeded by his son Joseph. During the first visit of the new president to the United States, Banro invited him to negotiate a 'gentlemen's agreement', which was eventually signed on 18 April 2002. The agreement restored all titles and rights to SAKIMA/Banro. It stated that SAKIMA Sarl could keep the rights to 35 tin concessions and became a fully-owned state company. It further stipulated that Banro was allowed to exploit the gold concessions in Luhwindja, Kamituga, Lugushwa and Namoya. The gentlemen's agreement extended the duration of the contract from 25 to 30 years and preserved the extensive tax holidays²³⁹. Yet a 2010 amendment to the agreement, a result of a renegotiation demanded by a government commission that evaluated the mining contracts²⁴⁰, to a certain extent limited the tax holidays. Banro is now required to pay to the Congolese state an annual 4 percent on its net profits, after reimbursement of the capital, and 1 percent royalties, starting from the production phase²⁴¹. These contributions must in principle be used for strengthening its infrastructure works and community development programme. As for the Congolese government, giving this vast concession in the hands of a multinational company

²³⁷ See chapter five.

²³⁸ Various interviews in Bukavu and Luhwindja, 2011 and 2012.

²³⁹ RDC, Avenant n.1 à la convention minière du 13 février 1997, 18/04/2002.

²⁴⁰ Ministère des Mines RDC, *Commission de révisitation des contrats minier. Rapport des travaux*, 2007.

²⁴¹ RDC, Avenant n.2 à la convention minière du 17 février 1997, 13/07/2010.

can be interpreted as a strategy of (re)centralising control over revenues from mineral extraction. Governments expect to obtain a lot of rents from industrial activities, which, as I said before, is an important reason for preferring industrial over artisanal exploitation. Even more, it can be interpreted as a governance tool in a territorialisation strategy. If the state is not capable of providing security and other public services, these responsibilities may be handed over to private companies. In her work on security governance in Katanga, Jana Hönke (2010; 2013) used the concept of 'discharge', a government strategy to leave local governance to private actors²⁴². However, the state does not retreat completely. On the contrary, the strategy of discharge also facilitates the extension of state control – albeit indirectly – into areas previously out of the state's reach, as was the case in Luhwindja during the war.

As far as the company is concerned, both violence and legalisation were part of their strategy to maintain and control access to the concession. The broader war context subjected this process to conflict and, indeed, violence. The war also left deep scars at the local level. First of all, the region witnessed many armed confrontations and people were massively displaced. In 1999 the Rwandese and RCD brutally retaliated against the population, who were believed to support Mayi-Mayi and Mudundu-40²⁴³. This resulted in horrible massacres more particularly in Burhinyi (about 280 victims) and Ngweshe (about 30), two neighbouring chiefdoms (Prunier, 2009: 211; UN, 2010b: 180). The war also caused a massive influx of people to the mining sites as these were believed to offer better opportunities for survival, as already highlighted in chapter five. Finally the war had an influence on the position of customary chiefs. Vlassenroot and Huggins (2005) explained how during the conflict the power of traditional elites was challenged by the development of militarised networks. A growing group of landless and marginalised young men provided these new military groups with a fertile ground for recruitment. The traditional patron-client relationships, like the kalinzi system in the Bushi, were undermined and replaced by new forms of patrimonial relations based on economic gain and wealth accumulation. Local customary chiefs attempted to maintain their position by becoming the "gatekeepers for shifting the asset from customary control to the modern legal system" (Vlassenroot and Huggins 2005: 135).

In Luhwindja, Justin Karhibahaza Mukuba was appointed as the interim chief after the death of his elder brother mwami Philemon Naluhwindja. Philemon's son was only a child at the time, and so his widow was designated as 'guarantor of the customs'. Interim chief Justin continued to support SOMICO and nourished the popular narrative that SOMICO had been created to mine gold on the 'people's land' for the good of Luhwindja's inhabitants. With this discourse he won the sympathy of a considerable part of the population. It can be considered as a 'legitimising practice' through which he sought to establish his authority. Yet in practice the interim chief continued to effectively derive rents from artisanal exploitation through the well-established taxation system²⁴⁴. But the war context also pushed different actors to establish strategic military alliances. Justin had contracted FDLR as personal security guards. At the same time RCD controlled many of the urban centres in the area and tried to establish a tight control over the mines as well. Norbert Kantintima, RCD's governor in South Kivu deployed rwandophone soldiers in his home chiefdom Kaziba (neighbouring Luhwindja) and attempted

²⁴² Hibou (1999) used the concept of discharge, which she reworked from Max Weber, in this way.

²⁴³ See chapter seven.

²⁴⁴ Interview with community leaders, Bukavu, 11/2011. Interview with local businessman, Bukavu, 17/05/2012.

to control the mines from there. This brought him in opposition with Justin²⁴⁵. However RCD never totally succeeded in controlling the gold mining sites, nor in monopolising the gold and coltan trade (Vlassenroot and Raeymaekers, 2004) because well-established networks of artisanal miners and traders continued to channel most of the minerals to international markets, bypassing the RCD administration²⁴⁶. Some miners also joined local militia such as Mayi-Mayi who controlled many rural areas in the wide surroundings, as did FDLR. These armed groups cooperated with local traders for channeling the precious minerals out of the region without paying taxes to RCD.

6.5. LEGITIMISATION, PRIVATISATION AND RESISTANCE (2005-2012)²⁴⁷

After the negotiation of the gentlemen's agreement Joseph Kabila aimed to facilitate Banro's effective control over the concessions. Officially the war ended in 2003, and the best way to convince the outside world of a return of stability and security was to attract foreign investors. But despite the official end of hostilities, large parts of South Kivu's territory still remained under the control of rebel groups, such as FDLR in and around Luhwindja. So the obstacles remained multiple.

Only in July 2005 did the Congolese army launch a military operation to chase FDLR around Luhwindja. This military operation also allowed Banro to effectively install itself. Their infrastructure and personnel were protected by special military forces²⁴⁸. These troops reportedly took violent action against community members who were accused of sympathising with FDLR. Justin, who had collaborated with FDLR and opposed Banro's arrival, was dismissed and took refuge in Kinshasa. In his search for a new legitimate intermediary between the company and the local population, Kabila contacted Philemon's widow, Espérance Barahanyi who beared the title of 'mwamikazi'. At that moment she was residing in Belgium with her children. The president reasoned that if she were able to win legitimacy in the eyes of the population, she could facilitate Banro's instalment²⁴⁹. But part of the population in Luhwindja and the diaspora of Bawindja residing in Bukavu, remained loyal to Justin²⁵⁰. Banro was thus faced with quite a hostile environment when they started to build their exploration camp in Luhwindja in October 2005. Yet the company had just announced a massive exploration programme and had listed its shares at the American and Toronto stock exchange, so shareholders and potential investors needed to be reassured that peace had come to the region and that the time was suited for investments. The mwamikazi was thus instrumentalised by the company and by the central government to quieten things down. She also made a strategic alliance with CODELU ('Comité pour le Développement de Luhwindja'), a solidarity organisation of Luhwindja's elite (businessmen, church and NGO leaders) residing in Bukavu²⁵¹.

²⁴⁵ Interview with local businessman, Bukavu, 17/05/2012.

²⁴⁶ See chapter five.

²⁴⁷ This section is based on interviews in Bukavu in 2012.

²⁴⁸ Interview with local businessman, Bukavu, 17/05/2012.

²⁴⁹ Interview with local businessman, Bukavu, 17/05/2012.

²⁵⁰ Interview with CODELU, Bukavu, 20/05/2012. Interview with local businessman, Bukavu, 17/05/2012.

²⁵¹ Interview with local businessman, Bukavu, 17/05/2012.

In this early period Banro's exploration programme proceeded slowly but steadily. They intensified their prospecting work and started drilling. They also began to work on the main road connecting Luhwindja to Bukavu, a rehabilitation project that was partly financed by the World Bank. But overall their activities had very few links with the local context and economy. The population had no voice in the decision-making process, which initially led to a lot of protest, some violent²⁵². Banro understood that, in order to secure its own economic and security interests, a negotiated approach was needed. In 2009 they instituted a 'community forum' that was supposed to represent the interests of the community in negotiations over resettlement and compensation. But who can legitimately claim to represent the community? This seems to be a matter of access control, since identifying so-called representatives is a profoundly political process and is influenced by and influences local power relations. Ballard and Banks (2003: 302) observed that, in many cases, the "representative committee" is in fact composed and steered by the companies themselves and is based on models that are copied from other projects. In Luhwindja this certainly held true. The forum was assembled and financed by Banro, and the advocates of the company clearly outnumbered the others. The 'working group on compensation', for example, consisted of nine Banro representatives, four community representatives, the mwamikazi and the 'chef de poste' (local state representative), who was also known as a close collaborator of Banro. The forum was involved in negotiations on the displacement and reintegration of artisanal miners and about compensation and resettlement of the local population. Following an initial survey 850 households or about 5300 individuals were targeted for involuntary displacement²⁵³, about half of whom were to be displaced and compensated in the 2010-2011 period, before the end of the exploration phase²⁵⁴. The hill of Cinjira in Luchiga chiefdom was chosen as a resettlement site. As for compensation the eventual proposal of the community forum (February 2010) materialised in a list of compensation rates for crops and trees respectively²⁵⁵. Also, secondary building structures were to be recompensed at a rate of 150 percent of their value. But the main structures (family houses) were not financially rewarded. They were replaced by a construction which adheres at least to the same standards as the current one, to be built in Ciniira²⁵⁶.

With the increasing attention for community policies, Banro started to refer more explicitly to a number of international guidelines and CSR standards as well. For example, they announced that they would adhere to the resettlement and compensation guidelines of the International Financial Corporation and to the Equator Principles, a voluntary standard for banks to manage community-related risks in project financing²⁵⁷. These principles are based on the World Bank's social and environmental standards. They require involving representatives of the local population in negotiations over the modalities of resettlement and compensation. Banro also emphasised their compliance with the Extractive Industries Transparency Initiative (EITI), the

²⁵² See chapter twelve.

²⁵³ Banro, *Technical Report Twangiza. Social conflict arising from involuntary resettlement,* 2011.

²⁵⁴ Interview with Banro's community relations manager in Twangiza, Luhwindja, 10/01/2011.

²⁵⁵ Banro Barême des taux d'indemnisation et modalités de remplacement des biens immobiliers, 2010.

²⁵⁶ This principle is commonly adopted in international resettlement guidelines, see Szablowski, 2007. See also Namegabe and Murula, forthcoming.

²⁵⁷ Interview with Banro's community relations manager in Twangiza, Luhwindja, 10/01/2011. The IFC Handbook for preparing a Resettlement Action Plan can be found at:

<http://www.ifc.org/ifcext/enviro.nsf/AttachmentsByTitle/p_resettle/\$FILE/ResettlementHandbook.PDF. Information on the 'Equator Principles' at: http://www.equatorprinciples.com/index.php/about-ep/about>.

Voluntary Principles on Security and Human Rights, the OECD Due Diligence Guidelines and the ICGLR standards (Banro, 2013). In its 2013 sustainability report (idem) the company highlighted that it "is committed to maintaining the highest standards of corporate governance, transparency and protections for human rights". Indeed in the international specialised press, Banro has been depicted as a model company, with "a community development program that would put many majors to shame, let alone other juniors" (Mineweb, 2007)²⁵⁸. Even Congo researcher Peer Schouten, writing on mining in Ituri District, noted that "ever since 2004, Banro has been considered welcome by local populace [sic] in South Kivu" (Schouten, 2011). My field research contradicts this and shows that tensions ran high just after Banro's arrival, then eased because of increased community participation, and rose again in recent years. This was mainly due to the fact that Banro's presence became increasingly intertwined with local politics²⁵⁹.

In 2006 Justin, who was residing in Kinshasa, ran as a candidate in national elections. He was elected as a member of parliament, but shortly afterwards the Supreme Court invalidated his mandate because of irregularities during the election (Le Phare, 2009). Local voices said that this decision was obviously related to the situation in Luhwindja²⁶⁰. At the provincial level, the mwamikazi was co-opted into the Provincial Assembly after the 2006 elections. The electoral legislation provides for 32 directly elected deputies and four co-opted representatives of the customary chief. The president, who may propose the candidates for co-optation, obviously introduces political allies, supporters of the presidential party. Espérance had good connections with the president himself, as well as with his political counsellor and current governor of South Kivu, Marcellin Cishambo, and was thus co-opted²⁶¹. In 2008 she was officially appointed as interim mwami as well²⁶². The mwami, Tony Chibwire V, had already reached the age of majority, but was still pursuing further studies in Europe.

Apart from her political functions, the mwamikazi was also active in business and in development projects²⁶³. She set up a subcontracting company that provided day labourers to Banro, Cinamula, with the specific aim to create employment for the Bawindja. She was an associate in Diphil too, another subcontracting company for labour. She was a majority shareholder of Chez Bibbas, a subcontractor that built houses for the resettled population. She was involved in the construction of the market Nabuntalaga through a company called Arcadis, of the market of Cinjira (the resettlement village) and of the primary school in the 'groupement' of Luchiga. Her involvement in development projects went through APEF ('Action pour la Promotion des Enfants et de la Femme'), an NGO which she created and which is a privileged partner of Banro, and through her membership of the local committee of the Banro Foundation and the community forum mentioned above. Although she was able to gain legitimacy in the eyes of some, part of the population felt she only cared about her own interests. Moreover her powerful position gave rise to a number of political opposition forces.

²⁵⁸ As Bebbington et al (2008: 900) confirm, junior companies are "far more likely to mishandle community relations and short-cut local decision-making processes, and so trigger conflicts".

²⁵⁹ Interview with local businessman, Bukavu, 17/05/2012.

²⁶⁰ Interview with community leader, Bukavu, 06/06/2012.

²⁶¹ Personal communication, 15/01/2013.

²⁶² Mwamikazi, press conference, 26/01/2012.

²⁶³ Interviews in Bukavu and Luhwindja; *Pétition de la population de Luhwindja contre Madame Espérance M'Baharanyi La Namunene*, 2012.

The 'old' direct confrontations with Justin, her brother-in-law, seemed to fade into the background, but were replaced by other disputes. The dispute over the throne with the Ruvura family, for example, has resurfaced with vehemence²⁶⁴.

In late 2011 a petition calling for the mwamikazi's abdication was launched by a local human rights organisation, UJCC ('Union des Jeunes Congolais pour le Changement')²⁶⁵. Their list of accusations could be captured under three categories: charges on the social, economic, and customary levels. On the social level, Espérance Barahanyi was accused of internally dividing the population in order to be able to establish her power more firmly, exclusion and intolerance against the other members of the royal family, disrespect for the bajinji and the 'chefs de groupement', as well as for the local development structures and the 'notability' in Bukavu (CODELU). She was blamed for carrying out arbitrary arrests, intimidations and false accusations. In the economic sphere the allegations were the following: confiscation of the people's economic rights vis-à-vis Banro (e.g. regarding employment opportunities: they have been given mainly to 'outsiders'), pursuit of her personal economic interests by creating subcontracting companies and NGOs, centralising the development money Banro will put at the community's disposal, and managing the chiefdom's finances in a very opaque way. Finally the petitioners blamed her for not respecting customs. Despite his age, they argued, she continued to treat the mwami as if he were a child, in order to retain her own power. She did not live in Luhwindja but limited herself to short visits, and she crowned herself 'mwamikazi', whereas in the history of Luhwindja there never had been a female interim chief. Finally the petitioners referred to "other acts which are in contradiction with our customs", but which were not specified.

It is interesting to see how the petitioners and other critics refer to 'customs' and 'traditional practices', and how these traditions may also be reinterpreted and used for particular goals. While not explicitly present in the petition, an element that is part of the critic's discourse is the fact that the mwamikazi is not from Luhwindja. This is usually not put as an accusation as such, but it is related to the fact that she gives more employment opportunities to 'outsiders' instead of 'providing for the Bahwindja'. Yet remarkably customs in Bushi have always dictated that the queen mother belongs to a particular lineage: in the case of Luhwindja she needs to be a member of the dynastic clan of Kalehe (Chrétien, 2006: 123). Besides, "in principle, their heir has to be raised outside the court without seeing his father" (idem). Whereas indeed one may discuss about the exact interpretation of this, and claim that the mwami has come of age, it is fascinating to see how elements from the 'tradition' are sometimes selectively used to make current claims. On the other hand, the mwamikazi has used similar 'traditional' elements, such as the role of the mwami as guardian and allocator of the land. In fact the notion of 'guardian' used to have much more prominence: the role of the mwami was above all to make sure that the land was used to the benefit of the people. By directly doing land transactions with Banro, she rather played her role as 'allocator', supposing that she held all the land rights and could freely distribute them. The hill on which the resettlement village of Cinjira was built for example, was described as having been "provided by the local chief" (Banro, 2012: 13). In other words, the mwamikazi was able to reinforce her access control. In an attempt to legitimise this control (and thus strengthen her authority) she referred to

²⁶⁴ Interview with Ruvura family, Bukavu, 10/10/2012.

²⁶⁵ Pétition de la population de Luhwindja contre Madame Espérance M'Baharanyi La Namunene, 2012.

customary (rights-based) law. Yet both her power and authority were contested by part of the population, exactly on the same grounds.

On 24 January 2012 the petition was officially submitted with 4044 signatures. According to the initiators of the petition²⁶⁶, the local political elites already tried to put them out of action in December 2011 by using intimidation and violence. The latter contradicted this, but on 17 March 2012 two leaders of UJCC were arrested in Bukavu. UJCC was now openly supported by CODELU. Since their creation in 1978 they had always occupied quite a prominent position in local politics thanks to the status of their individual members²⁶⁷. Until recently, their leaders were relatively optimistic about Banro's presence in Luhwindja, and the possible impact on local development²⁶⁸. However, in early 2012 they also started to voice criticism, especially on the actions and attitude of the mwamikazi. After the arrests in March they openly accused her of bad management and claimed that "the population has lost confidence in her"²⁶⁹.

According to my own analysis, part of the population indeed felt disappointed and abandoned by the mwamikazi. They felt that the population did not benefit enough from Banro's presence. Some even found that the local elites counteract the population's interests, as the following quote demonstrates:

"We cannot address Banro directly because we have to pass through these few people who monopolise the contacts. And these are the same people who hold us back! They present themselves as representatives of the population, but they are hampering the activities of the common people. Actually the main problem is not Banro itself. The problem lies with these intermediaries who interpret our grievances completely wrongly"²⁷⁰.

At the same time the population saw Espérance's businesses were flourishing. The members of CODELU, many of whom are businessmen, also had their personal interests and they got increasingly frustrated that Banro chose subcontracting companies which had good connections with the mwamikazi²⁷¹. This way, the population's feelings of marginalisation were reinforced and further politicised by power struggles among the local elites.

On 19 March 2012 people in Luhwindja protested against the arrests of the petition's initiators. According to the latter, the manifestation was violently knocked down by the 'chef de poste', assisted by the national police, and nine more people were arrested²⁷². In the meantime 42 people had introduced a claim at the tribunal, saying that their name was on the petition, but that they had not signed. Besides, there would be names of underage and of fictitious people on the list. More protests followed in Luhwindja, and on 28 April eight

²⁶⁶ UJCC, *Relation des faits*, 2012.

²⁶⁷ Interview with local businessman, Bukavu, 17/05/2012.

²⁶⁸ Interview with CODELU, Bukavu, 02/02/2011.

²⁶⁹ Letter from CODELU to Banro, *Retrait de la confiance de la population de Luhwindja à Madame Espérance* M'Baharanyi, 28/03/2012.

²⁷⁰ Focus group with former miners, Luhwindja, 07/01/2011. See also a case in Ghana described by Bush (2009: 60): "There were seldom opportunities for venting anger at village dispossession. There were consultation committees between the mines and communities but these were seen as vehicles for traditional authorities to cement relations with mine managers rather than representing the grievances of the poor in the community or the youth". ²⁷¹ Letter by Banro Foundation to mwamikazi, *Votre urgente assistance sur EP Bigaja*, 19/01/2012.

²⁷² UJCC, Relation des faits, 2012 ; Note de plaidoirie pour Mukenge Barhegine Totoro, Bachoke Ganywamulume Gustave et Beka Ngekema. RP 13 802; Mail by UJCC, Dossier arrestation, 21/08/2012. Mail by UJCC, Retroacte de l'arrestation des défenseurs des intérêts et des droits des Bahwindja par la Namunene, 21/08/2012.

prisoners were released. Both CODELU and the mwami claimed accountability for this release²⁷³. The three remaining prisoners were accused of forgery and unlawful use of signatures. Their case was introduced on 15 May 2012. After the hearings in August and September 2012 the defendants were charged with forgery and condemned to one year in prison and five years on probation²⁷⁴.

In August 2012, however, there was another important event: the official delivery of the first cheque from Banro to 'the community'²⁷⁵. As I already said the government's agreement with Banro stipulated that the company had to pay 4 percent of its net profits to the Congolese state, as well as 1 percent royalties²⁷⁶. The Protocol of Agreement between Banro and the community of Luhwindja, represented by the mwamikazi, spelled out that Banro will pay 1 percent of its net profits after reimbursement of the capital and USD 1 per ounce of gold produced to the community²⁷⁷. Since the mechanisms by which this would take place were not defined, nor the exact meaning of 'the community', this also gave rise to heavy contestations. All parties tried to gain access to this money. In a letter addressed to Banro CODELU asked to be involved in the set-up of a special fund, a 'study bureau' that would study and decide on how the money was to be managed, and where it would go²⁷⁸. This was fiercely contested by the mwami and his allies, who insisted that CODELU had no right whatsoever to represent 'the community'²⁷⁹.

CODELU and UJCC also received support from an important politician²⁸⁰. Norbert Kantintima was South Kivu's governor under RCD rule and former Minister of Agriculture, now Member of Parliament in the national parliament. Originally from Kaziba, he was trying to present himself as the delegate of Kaziba, Luhwindja and Burhinyi. In Kaziba and Burhinyi he already succeeded in placing his allies on the throne (the deceased mwami's little sister in Kaziba as a regent and the current mwami of Burhinyi). In Luhwindja he was also trying to gain access to power through strategic alliances with Justin and CODELU. In other words, these are highly politicised battles around access in the broadest sense. It is remarkable that most of these struggles seem to be fought out at the level of Bukavu among the elites, and not that much at the local level. In chapter twelve I further analyse how these struggles around access played out at the local level and what the consequences were for the local population, more particularly for the artisanal miners.

²⁷³ Rapport de la réunion présidée par sa majesté mwami Naluhwindja Chibwire V Tony en sa résidence à Bukavu avec une délégation de la CODELU en date de vendredi 10 aout 2012, 10/08/2012.

²⁷⁴ Interview with lawyer, Bukavu, 02/10/2012.

²⁷⁵ CODELU, Mot de circonstance à l'occasion de la remise du premier chèque entre Banro-communauté de Luhwindja, 10/08/2012. Interview with lawyer, Bukavu, 02/10/2012.

²⁷⁶ RDC, Avenant n.2 à la convention minière du 17 février 1997, 13/07/2010.

²⁷⁷ Protocole d'Accord signé entre la compagnie Twangiza Mining Sarl (la compagnie) et la chefferie de Luhwindja (la communauté), 05/06/2010.

²⁷⁸ Interview with CODELU, Bukavu, 12/10/2012 ; CODELU, Mot de circonstance à l'occasion de la remise du premier chèque entre Banro-communauté de Luhwindja, 10/08/2012.

²⁷⁹ Letter by Mwami to Governor of South Kivu, *Message de la CODELU au Président Directeur Général de la société* Banro, 08/2012. Letter by Intellectuels et amis du mwami, *Notre réaction aux impertinences continues dans la lettre* vous addressée par la CODELU en date du 11 septembre 2012, 21/09/2012.

²⁸⁰ The following paragraph is based on interview with local elite, Bukavu, 06/06/2012 and interview with local businessman, Bukavu, 17/05/2012.

The Luhwindja case is not unique in combining legitimisation and privatisation as strategies. In an article on 'land grabs' in Ghana, Sara Berry (2013:55) referred to a plan titled "promoting partnerships with traditional authorities" that was drafted by the World Bank in 2003. According to her the strategy was to "expedite market liberalization by tapping into a distinctively African form of political legitimacy", in casu the chiefdom (idem). Yet as the Banro case shows, this 'legitimacy' is often problematic. Borras and Franco (2010: 519), talking about 'land grabs' as well, formulated it this way:

"In many places, a minority elite section of a community often claims to represent the poor even when it does not. On many occasions in many countries, local elites forge formal contracts with investors in the name of their communities despite having no real consultative process and mandate. Often in such situations, the rural poor have little opportunity to set the record straight, while other, more powerful, stakeholders have little interest in ensuring that oppositional voices are even heard, much less taken into consideration, if doing so could mean scuttling the deal altogether. Different social groups join the negotiation table with different degrees of political power".

Indeed as I said in chapter three local elites actively seek to constitute their authority by reverting to 'legitimising practices'. In this case, the mwamikazi initially had trouble being accepted as the legitimate customary chief because of local history and politics. In my understanding, associating herself with Banro, presenting herself as an intermediary and attracting funding and development money for the community was a legitimising practice, which has successfully turned into legitimacy in the eyes of some, but not in the eyes of another part of the community. What is also at stake here of course is an attempt to gain access to new resources. The strategic positioning in subcontracting companies is a clear illustration of this. In the same way, the individuals and groups opposing the power holders in place (CODELU, UJCC and some others) sought to get access to the opportunities created by Banro's presence, notably the financial and development possibilities. They were also pursuing a double aim: on the one hand legitimising their position as spokespeople for 'the community', or more particularly the marginalised voices; and on the other hand gaining access to business contracts and development money flowing through Banro. Seen from the side of the company, these partnerships with elites have turned out to be sensitive issues, and may be threatening the 'social peace' in and around the concession. Some company agents at Banro now say that they have become "far too entangled in local politics"²⁸¹.

6.6. CONCLUSION

In this chapter I have provided an analysis of access maintenance by artisanal miners and traders in Luhwindja. It is true that the recent revival of industrial production and the firm establishment of Banro in Luhwindja have deprived many local people of their access. But there are certainly openings for agency, as some examples in this chapter (resistance against colonisation, against RMA, petition) already showed. Current access maintenance by Luhwindja's miners and traders is further analysed in parts three and four.

²⁸¹ Personal communication with Banro employee, 06/2012.

In terms of access control, this chapter gives a detailed account of the mechanisms that were put in place by the company and by various national and local elites. The national government(s) played a key role in the negotiations over the gold concessions. Laurent Kabila created a new company as a 'nationalist' response to foreign intervention. Yet with the coming to power of Joseph Kabila, a strategic partnership was built with Banro, which was given easier access by eliminating some of the opponents and obstacles to its instalment. I have interpreted this as a strategy to recentralise the mining rents, but also as a territorialisation mechanism, facilitating state control over areas previously out of state reach because of the lingering conflict, and transferring governance responsibilities to private actors. In this process, territorialisation, privatisation, legalisation and violence mechanisms coincided: private capital was attracted, contracts were negotiated and renegotiated, companies and elites allied with armed groups during the war, chiefs were instrumentalised in an attempt to win legitimacy and partnerships were made in order to secure the concession and start gold exploration. Local elites have aimed to draw the benefits from artisanal mining their way, and they repositioned themselves in the wake of Banro's arrival. Banro for its part aligned itself with selected members of this elite, initially in an attempt to secure its position and win the population for its cause through a legitimate intermediary, the customary chief. Yet all this has produced significant political conflict, which ultimately is a conflict over access to the mining rents. Although the company has made a lot of effort to obtain a social license to operate adhering to transnational guidelines and national laws – their effects on local politics seem to be threatening social peace as people feel excluded and are claiming back their rights.

"La découverte des mines nouvelles avait produit parmi la population des environs une effervescence extraordinaire. De tous les points de l'horizon, des hommes à pied et à cheval se dirigeaient vers Bear-Valley. Il n'y avait qu'à les suivre" (p.118).

"The discovery of new mines brought extraordinary excitement to the people around. From all directions men came to Bear-Valley, by foot or on a horseback. We only had to follow them" (p.118).

This chapter analyses the history of mining in Mukungwe. Section 7.1 introduces the discovery of gold and the start of a conflict over its access in the 1970s and 1980s; section 7.2 shows how this conflict got entangled with broader war dynamics; 7.3. describes disputes between artisanal miners and industrial actors in the 2002-2010 period; 7.4 discusses some recent dynamics of renewed violence and state control and finally 7.5. concludes. The chapter also provides an access analysis, interpreting the practices of miners and traders, companies and elites in terms of access mechanisms. As table 12 illustrates, the most important mechanisms are to be found on the side of the elites engaging in access control, and on the side of the miners and traders trying to maintain their access²⁸².

| Actors | Min trad | | Com | npany Elites | | S |
|----------------|-------------|-------------|-----|--------------|-----|--------------------|
| | | 1 | | | | |
| Access | 70- | Relations | 70- | | 70- | Rights-based |
| maintenance | 80 | | 80 | | 80 | |
| | 90 | | 90 | | 90 | |
| | 0.0 | D | | | | |
| | 02- | Resistance/ | 02- | | 02- | |
| | 10 | rights | 10 | | 10 | |
| | 11- | Resistance/ | 11- | Legalisation | 11- | |
| | 12 | rights | 12 | | 12 | |
| Access control | 70- | | 70- | | 70- | Legalisation |
| | 80 | | 80 | | 80 | Financial capital |
| | 90 | | 90 | | 90 | Violence |
| | | | | | | |
| | 02- | | 02- | | 02- | Legalisation |
| | 10 | | 10 | | 10 | Privatisation |
| | | | | | | Violence |
| | 11- | | 11- | | 11- | Legalisation |
| | 12 | | 12 | | 12 | Territorialisation |
| | | | | | | Violence |

Table 12. Access analysis of Mukungwe's mining history

Source: Author's own representation

Mukungwe is a village in Walungu territory, in the chiefdom of Ngweshe and 'groupement' of Mushinga. As I have said in the previous chapter, Ngweshe is one of the Bashi chiefdoms. The landscape here is mountainous and the villages that are scattered over the hills are difficult to reach. At the mining site, artisanal miners have built a 'camp', which is basically a collection of

²⁸² The same remarks as in chapter five apply with respect to the definition of the 'elite' category and the fact that the mechanisms presented in the table are not exhaustive.

a few hundreds huts. There is a total lack of basic infrastructure such as water and sanitation, electricity, or buildings in brick. Some small restaurants and shops sell food and alcohol. This camp is also known as 'Maroc', which according to some refers to its "isolated environment, [...] a desert where people renounce all luxury. They adhere to a certain life style"²⁸³. The population here consists of a majority of young men coming from neighbouring 'groupements' and chiefdoms, or from cities like Bukavu. The traditional Bashi population has thus been outnumbered, at least in the mining camp, by newcomers. Although some do have a family and children, the men live here alone and left their families in their home village or in Bukavu. Most women who do settle (temporarily) in Maroc seek commercial opportunities as prostitutes or petty traders. There are also a number of women from neighbouring villages who walk the tiring path over the hill every day in order to sell food or drinks to the miners. On my way to and from Mukungwe, tens of women, each of them carrying up to thirty bottles of Primus, the local beer, would walk beside me. Approximately 200 gold mining shafts are dispersed over two main hills: Kalanga and Lukwera (commonly called Kalazi). Along the Nyantanda river alluvial gold exploitation mining is taking place. The annual production is estimated to be between 50 and 70 kg of gold, with an estimated number of 1000 to 3000 artisanal miners working underground and in rivers²⁸⁴.

7.1. LEGALISATION, RIGHTS, RELATIONS AND FINANCIAL CAPITAL (1970S-1980S)

In the 1940s Chunu Tukuwa acquired user rights on the hill of Lukwera in Mushinga. This process was concluded by payment of the kalinzi in the form of three goats for the mwamikazi – who was in power at the time – and one goat for the witness²⁸⁵. When the mwamikazi grew older, her son Constantin Kurhengamuzimu became chief of Mushinga²⁸⁶. At his inauguration as the new chief, Chunu Bagayamukwe, son and heir of Chunu Tukuwa, brought him three goats (a ceremony called 'kushiga') in order to "make himself known to the chief" and thus perpetuate the customary rights of his father. Chunu Bagayamukwe also acquired user rights on Kalanga hill by presenting two cows and a bull to Kurhengamuzimu and the witnesses. The conflict started with the discovery of gold in Kalanga in 1975²⁸⁷. According to one account told by a close ally of Chunu,

"the gold was discovered by a cow that slipped on the hillside, and that way uncovered a glittering substance under the sand. When people came to search for more, the old men who owned the field initially burst out in anger because they were damaging his field"²⁸⁸.

This quote already evokes one of the big problems in the Mukungwe conflict: the question of who owns the land (at the surface), and who owns the subsoil²⁸⁹. Chunu was the customary land owner and therefore relied on rights-based access mechanisms. But Kurhengamuzimu, the customary chief, claimed the rights to the subsoil. The contention thus was whether the

²⁸³ Interview at OGP, Bukavu, 14/10/2011.

²⁸⁴ Communication by cooperative leader, Bukavu, 29/02/2012.

²⁸⁵ At this time mwamikazi Elisabeth Bujana, the wife of mwami Mafundwe of Ngweshe, governed the 'groupements' of Lurhala, Kamisimbi, Mushinga, Lubona and Tubimbi.

²⁸⁶ Letter by Chunu Bagayamukwe to the Governor of South Kivu, 05/07/2008.

²⁸⁷ Interview with local leaders, Mukungwe, 31/05/2012.

²⁸⁸ Idem.

²⁸⁹ Interview with professor, Bukavu, 02/11/2011.

payment of the kalinzi also gave the owner the right to benefit from the subsoil. According to the customary chief this was not the case: kalinzi is only applicable to land used for agriculture and cattle rising and does not concern what is underground. The Chunu family however maintained that they did have the right to exploit mine gold in Kalanga. Another issue was whether Chunu needed to be compensated for the damage that was done to his fields, an inevitable consequence of gold extraction. As customary law did not provide a clear solution for this, the respective parties in the first place invoked official state law and relied on official institutions. However, if these institutions did not appear to serve their interests well, parties reached for other sources of authority to legitimise their access, or they enforced access by using violence, as will be demonstrated later. Another question concerned the right to benefit from the profits of gold exploitation, in other words, having a share in the output. In all artisanal mining sites in Ngweshe and the surrounding chiefdoms, it is the practice that customary chiefs share in the profits from gold mining and trade, as I have already pointed out for Luhwindja²⁹⁰. In the case of Mukungwe, this was a contentious issue as well: did Chunu inform the chief about the gold exploitation on this hill, and did he hand over a fair share of the profits? According to Kurhengamuzimu this was not the case.

As early as July 1980, the chief of the Provincial Mining Division wrote that two individuals, supported by Kurhengamuzimu, were exploiting gold in Mukungwe. He considered this problematic since Chunu "enjoys the plenitude of his customary rights"²⁹¹ on this land. A year later, Kurhengamuzimu applied for a gold exploitation permit. Chunu, however, appealed this request, saying that Kurhengamuzimu "stripped him of his rights whereas he had fulfilled all the customary requirements, particularly the payment of the kalinzi"292. The state representative in Walungu seemed to agree with him, stating that "there is no doubt that the contested land is the exclusive and uncontestable property of citizen Bagayamukwe Chunu who fulfilled all the customary formalities towards the chief"²⁹³. The state agent thus seemed to adhere to a strict interpretation of the kalinzi, considering it an inalienable right. This interpretation already deviates from the original conception, which completely ignored the notion of private control and considered the land to be a collective property, the profits of which had to serve the entire community. Indeed, population growth and land scarcity led to individualisation, privatisation and monetisation of land rights. It is in this context that Kurhengamuzimu eventually obtained the permit for artisanal exploitation he had asked for²⁹⁴. In 1982 the gold sector was also officially liberalised, meaning that any individual could apply for a research, exploitation or trade permit.

In the late 1980s the Mukungwe case was brought to court. After the high court's decision, which ruled in favour of Kurhengamuzimu, Chunu lodged an appeal at the court of appeal in Bukavu in 1989. During the trial, Kurhengamuzimu denied that Chunu had ever acquired customary titles on the contested hills, Lukwera and Kalanga, while he did recognise him as land owner of another hill²⁹⁵. According to the court's judgment, however, Chunu was "the

²⁹⁰ See chapter six.

²⁹¹ Letter by chief of 'mining desk' South Kivu to chief of the Provincial Mining Division, 04/07/1980.

²⁹² PV by the 'commissaire de zone' of Walungu , 21/10/1981.

²⁹³ Idem.

²⁹⁴ Decree on attribution of exploitation permit n.498, 09/12/1981. The permit is for a period of two years, renewable four times.

²⁹⁵ Letter by Kurhengamuzimu Bafundisire to the president of the Court of Appeal in Bukavu, 02/10/1989.

legal occupant of the contested land". Kurhengamuzimu and his sympathisers were required to leave and pay compensation²⁹⁶. In a response to this judgment, Kurhengamuzimu wrote that the kalinzi, even if it were paid for Lukwera and Kalanga, had no value since these hills now fell under the mining legislation. Anticipating that, Kurhengamuzimu had applied for the aforementioned exploitation permit, which he invoked again on this occasion. He thus tried to cover himself twice, saying that Chunu had not adhered to his customary obligations and that even if he had, his official mining title now trumped the concessionary title on the land. But while Chunu continued to insist on his customary rights, in practice he and his supporters were also extracting gold. The group he gathered around him was called 'Matonge'. Kurhengamuzimu blamed them for using the profits of the gold exploitation to corrupt the court of appeal: "Chunu and its Matonge group continue singing in the whole 'groupement': 'with 20 tolas of gold we will win the case!'"²⁹⁷. In fact, the local population from the beginning sided with either Chunu or Kurhengamuzimu. Over time, more and more migrants came to Maroc, attracted by the mining possibilities. This group, which is locally called the 'diaspora' or 'kuja kuja' (those who come), shifts its alliance and its loyalty along with the shifting powers. They do not openly declare themselves to be partisans of one family or another, but they strategically position and reposition themselves as the local power configuration changes. For them, this is an access maintenance strategy. Currently there are an estimated 1000 to 3000 miners. The number changes a lot according to varying production. According to an observer, about 1000 miners can be considered to be 'permanent', while the others frequently come and go: 'they are nomads"²⁹⁸.

The access mechanisms discussed here clearly relate to legalisation, rendering a certain claim official or legal by political and judicial instruments. In the case of Mukungwe the conflicting parties have indeed used the legal framework to consolidate their claims. Chunu and his supporters for example have in their discourses always referred back to the 1989 judgment of the Court of Appeal²⁹⁹. Yet the second last paragraph ('with 20 tolas of gold we will win the case') also shows that in practice, not only 'the law' was invoked in order to protect claims. Access to financial capital may have been even more important as a mechanism, as the financial profits derived from the gold exploitation were used in order to pay for the legalisation process. In fact, legalisation relates to a rights-based mechanism and involves an appeal to authority. As opposed to that, or rather as a complement to that, bare power relies on structural access mechanisms like access to financial capital, or on violence and coercion. The next section again demonstrates how both mechanisms coincided.

²⁹⁶ Judgment RCA1630, Court of Appeal in Bukavu, 28/04/1989.

 ²⁹⁷ The tola is a measure for gold. One tola is equal to 11.66 grammes of gold. Letter by Kurhengamuzimu Bafundisire to the president of the Court of Appeal in Bukavu, 02/10/1989.
 ²⁹⁸ Interview with local leader, Mukungwe, 31/05/2012.

²⁹⁹ Idem.

7.2. VIOLENCE AND LEGALISATION (1990s)

In the early 1990s the Kurhengamuzimu family regained effective control over the mine. According to the Chunu family, their assumption of power was accompanied by excessive violence: "Pasteur Kurhengamuzimu [son of the chief of Mushinga] and his men set 32 houses on fire, they looted 15 cows, 23 goats and 9 sheep. They also took clothes, other objects and kitchen tools worth 2,851,250 zaïres at the time³⁰⁰". On the other hand, there are also indications that Matonge was turning into an armed self-defense group. Acts of violence thus occurred on both sides. Meanwhile Chunu also tried to legalise his access to the mine, successfully. A ministerial decree issued on 20 July 1993 granted him a two-year authorisation to prospect for gold, another illustration of a legalisation mechanism³⁰¹.

In the second half of the 1990s, local political struggles linked up with the broader war context, and thus gave rise to violence on a larger scale. In reaction to the foreign occupation by Rwanda and Uganda in 1998, local militia groups surfaced all over South Kivu (Vlassenroot and Van Acker, 2001: 66). These militias were commonly called 'Mayi-Mayi', but had very diverse characteristics. Whereas initially (before 1996) Mayi-Mayi had been set up as rural based movements of self-defence against social and economic marginalisation, after August 1998 many groups were captured by local warlords engaging in profit-seeking activities through the use of violence. It is in this context that the emergence of a Bashi militia in the region of Mukungwe must be situated. In 1999 'Mudundu 40' (M-40) emerged out of the existing private militia Kurhengamuzimu used to protect his claims to the mine (see Lubala Mugisho, 2000 and Namegabe, 2005). Whereas its official mission was to fight against the presence of Rwandan troops in South Kivu, it really aimed to keep control over the mines, and to consolidate customary power.

After an internal conflict over leadership mid-1999 the young Odilon Kurhengamuzimu³⁰² took command. The urban Bashi elite, which was closely associated with civil society in Bukavu, considered M-40 to be a useful instrument to politically position itself and strongly oppose RCD and so they supported the movement. During the subsequent years the group terrorised the entire region and confined its opponents in a notorious underground prison in Mushinga. In 2001, however, they switched sides and allied themselves with RCD in a political power game at the provincial level, which deprived them of any popular support until their dissolution in 2003 (Namegabe, 2005: 217-18). Militia groups thus also participated in political power games and were quick to change their alliances when it served their purposes.

After the reunification of the country in 2003 some combatants were demobilised and partially integrated into the Congolese army. Most former M-40 members however started to work as artisanal miners. This led some observers to conclude that among the miners "90 percent are military elements, demobilised soldiers or deserters, and escaped prisoners"³⁰³. Although this figure is most probably an exaggeration, it is true that many miners have a history of having

³⁰⁰ Letter by Chunu Bagayamukwe to the Governor of South Kivu, 05/07/2008.

³⁰¹ Ministerial decree on attribution of research permit n.2107, 20/07/1993.

³⁰² He is the son of Constantin Kurhengamuzimu, chief of Mushinga, brother of Pasteur and nephew of mwami Ndatabaye of Ngweshe.

³⁰³ Letter by bailiff of Court of Appeal in Bukavu to the prosecutor, 23/06/2006.

served in armed groups. Therefore, some authors and observers have argued that mining actually helps to keep young people away from armed groups (see Vlassenroot and Raeymaekers, 2004b, Johnson D., 2013).

7.3. LEGALISATION, PRIVATISATION, VIOLENCE AND RESISTANCE (2002-2010)

During and after the war effective control over Mukungwe remained in the hands of the Kurhengamuzimu family and its allies³⁰⁴. Maroc was placed under the command of the 10th military region, the FARDC regiment based in Bukavu. These soldiers soon came to be actively involved in mineral extraction³⁰⁵. Global Witness (2009: 35) reported that several FARDC soldiers of various ranks owned mining pits in Mukungwe.

Kurhengamuzimu also pursued his legalisation strategies in order to maintain control over the mine. In November 2005 he obtained an exploitation permit for artisanal miners on the basis of his previous exploitation permit from 1981. This was disputed by Chunu³⁰⁶ as well as by the Governor Célestin Cibalonza, who claimed that the 1982 liberalisation law had annulled all previous permits³⁰⁷. However, the new Mining Code had created new opportunities. As it created a new legal framework favouring industrial mining companies, the best strategy to maintain access to the gold mines was now to acquire a research permit from the Mining Registry. In 2006 Kurhengamuzimu obtained two research permits (PR 5277 and PR 6565). On this occasion he founded an industrial company, SAMIKI ('Société Agricole et Minière du Kivu'). But the end of the war and the new investment climate created by the Mining Code also attracted the interest of international mining companies. Both Chunu and his associates and Kurhengamuzimu and his allies tried to adapt to this changing reality - a move towards privatisation - by establishing relationships with these international companies as well.

This is where Banro Corporation comes in. According to the company's own maps, Mukungwe is part of the 'Twangiza concession', which extends to the chiefdoms of Luhwindja, Burhinyi, Kaziba and Ngweshe. In 2008 they built an exploration camp on Mwananzi hill, facing the hill of Kalanga. Their arrival had been facilitated by the customary chiefs. Kurhengamuzimu (with his company SAMIKI) was said to have concluded an agreement with Banro so that the multinational would take over the research permits, and SAMIKI could benefit by working as a subcontractor³⁰⁸. The population in Mukungwe however fiercely resisted Banro's arrival and set fire to the exploration camp in 2008. They forced Banro's exploration teams to leave. After the company's departure Chunu regained effective control of the site but delegated the daily management to two of his closest allies, Alexis Rubango and Kengeza Karubi nicknamed 'Marocain'³⁰⁹. The latter reportedly had the support of the miners as they had taken the lead in opposing Banro's arrival. They argued that Banro had no 'right' to take over the concession, as

³⁰⁴ Letter by first substitute of the prosecutor, 22/12/2006; Letter by chief of the office of the prosecutor and substitute of the prosecutor to governor of South Kivu province, 19/01/2007; Report by Lieutenant-colonel Kyembwa Wakagela of a mission to Mukungwe, 22/09/2007.

³⁰⁵ Letter by bailiff of Court of Appeal in Bukavu, 30/04/2006.

³⁰⁶ Letter by Ntabala Chunu to administrator of Walungu territory, 07/11/2005.

³⁰⁷ Letter by provincial governor to administrator of Walungu territory, 05/11/2005.

³⁰⁸ Interview with professor, Bukavu, 21/04/2012.

³⁰⁹ Interview with a member of Kurhengamuzimu family, Burhinyi, 26/10/2011; personal communication by e-mail, 04/04/2012; interview with local leader, 31/05/2012.

they were not able to show documents clearly stating that Mukungwe fell within the concession boundaries. "Unfortunately, politics are more important than rights here", one local leader said in an interview³¹⁰, "Banro just came with the agreement they concluded with the government, but on their maps Maroc did not fall within the boundaries".

The year 2008 was characterised by violent confrontations between the different parties, supported by the respective armed forces³¹¹. The results of these clashes were devastating: at least one dead and one wounded person, burnt houses, pillages, lootings and expropriation of mining shafts. The behaviour of the Congolese soldiers was also criticised by the Provincial Minister of Justice and Human Rights. In a letter to the commander of the 10th military region, he explicitly asked for the replacement of the FARDC soldiers:

"I have the noble duty to ask you to replace the military currently quartered in Mukungwe by more subordinate and impartial troops; and to enforce a temporary suspension of mineral exploitation, until the quarreling parties have acquired the necessary documents from the competent authorities"³¹².

In his response however, the commander of the 10th region argued that the presence of FARDC soldiers was absolutely necessary for the protection of the citisens and their belongings, especially in light of the nearby presence of FDLR³¹³. In reality, FARDC soldiers were actively involved in mining and trade activities.

The quarreling parties also pursued their legalisation strategies. In November 2008 for example, the Chunu, Rubango and Mweze families (all allies) had several land titles registered in the land registry³¹⁴. At about the same time they tried to set up an industrial company SOMIMU ('Société Minière de Mukungwe') after the example of SAMIKI, but that project failed. Therefore, Chunu, in collaboration with his partners, founded a cooperative, the 'Coopérative Agro-Pastoral et d'Exploitation Minière de Kalanga et Lukwera'³¹⁵ on 20 January 2009. In the course of 2009 attempts at rapprochement seemed to be taking place. The Chunu and Kurhengamuzimu families and the representatives of Banro reportedly came to an agreement on the allocation of the mining sites, although Chunu's position in all this was not clear. According to the agreement Banro would hold the exploitation rights over the concession of Kalanga³¹⁶ (PE43), whereas SAMIKI would have the right to prospect the hills situated further to the north³¹⁷. Kurhengamuzimu, having secured the exploration rights for SAMIKI, needed to look for an investor now. Through a Bukavu-based broker with connections in Japan, he came into contact with Eco-Project, a Japanese group willing to invest in infrastructure, cement production, jatropha plantations and gold mining in South Kivu³¹⁸.

³¹⁰ Interview with a local leader, Mukungwe, 02/2012.

³¹¹ In a letter from July 2008, the Chunu and Rubango families denounced that they were constantly being attacked by Pasteur Kurhengamuzimu, who mobilised former rebels from Mudundu-40 who still hold their weapons. See Global Witness (2009: 35).

³¹² Letter by provincial minister of Justice and Human Rights to commander of 10th military region, 24/02/2008.

³¹³ Letter by commander of 10th military region to provincial minister of Justice and Human Rights, 11/03/2008. ³¹³ Letter by commander of 10th military region to provincial governor, 15/04/2008.

³¹⁴ Certificates in the name of the Chunu family, the Rubango family and the Mweze family, 10/11/2008.

³¹⁵ Declaration of the foundation of the cooperative, 20/01/2009.

³¹⁶ PE43 ('permis d'exploitation').

³¹⁷ PR6565 and PR5277 ('permis de recherche').

³¹⁸ Website Eco-Project : http://ecoproject-group.com/mining-e.html.

position of mwami Ntabaye of Ngweshe was used to convince the Japanese investors, and after a visit of the mwami to Japan the deal was concluded. Eco-Project, in which both Kurhengamuzimu and the mwami are now associated as shareholders³¹⁹, acquired the research permits for four concessions bordering Banro's Twangiza concession³²⁰. However, the population still fiercely opposed the presence of an industrial company. They chased away Chunu and Kurhengamuzimu and remained on the side of Marocain, who disapproved of the abovementioned agreement:

"We had to oppose Banro. The survival of more than 5000 individuals here depends on it. What do you think the company is going to do with all these people? We were 5000 miners, eacht with a rock in our hands to throw at them. I was put in prison because I was considered to be the instigator, but in court I insisted that Banro never showed us the official document stating that Mukungwe is within its concession"³²¹.

7.4. LEGALISATION, TERRITORIALISATION AND VIOLENCE (2011-2012)

So on the ground the situation remained unstable. In March 2011, Chunu came back to Mukungwe with armed forces and retook the effective control over the mine, which he then again shared with Marocain. Both on 9 April and on 2 July, Chunu and his armed allies were said to have attacked a mission of the provincial and the territorial Security Council respectively. When abandoning their positions in July, they reportedly set 102 huts on fire³²². About this time there also was a rupture between Chunu and Rubango. The latter changed sides and came to support Kurhengamuzimu. Rubango claimed to have been authorised by the provincial minister of mines to restore order in Mukungwe and received support from FARDC soldiers – former Mayi-Mayi – from the 3rd operational zone in Mugogo and the 102nd regiment in Burhale (UN, 2011: par. 529). After a complaint made by Chunu about abuse of power by Rubango and FARDC, the military justice authorities in Bukavu summoned Rubango and five FARDC officers in July (idem). Chunu then travelled to Kinshasa to plead his case at the ministry of Mines and to Goma to consult with Bosco Ntaganda (UN, 2011: par. 530). According to the UN (idem) Ntaganda thereafter ordered close associates in Bukavu to reinstall Chunu. In August Lieutenant Colonel Kazarama Vianney, spokesperson for Amani Leo³²³ in South Kivu, went on a mission to Mukungwe, where they were confronted with several FARDC officers blocking their access to the mines (idem). Besides, Kazarama's superior, General Kahimbi, had not authorised the mission. This testifies to a lingering power struggle between factions of the 10th military region (General Masunzu) and Amani Leo (UN, 2011)³²⁴.

At the time of my field visit in October 2011 Kurhengamuzimu was controlling the mine with backing from FARDC 10th military region factions. He had installed a management structure locally known as the 'committee' of SAMIKI, which proved to be very successful in skimming

³¹⁹ Personal communication, 02/10/2012.

³²⁰ PR6565, PR5277, PR12102, PR5886.

³²¹ Interview, Mukungwe, 02/2012.

³²² Decision n.5072/001/BUR-AT/TER-WGU/2011 on restoration of state authority, 08/07/2011.

³²³ Amani Leo (peace today) was, after Kimia I and II (peace and quiet I and II) and Umoja Wetu (our unity) the military operation deployed in the Kivus to fight against remaining rebels, particularly FDLR. These FARDC operations are supported by Rwanda and – logistically – by Monusco.

³²⁴ Personal communication with Judith Verweijen, 07/03/2014.

off the mining profits³²⁵. Yet Chunu did not give up and tried to regain control with another violent attack just after my visit. This action resulted in a new agreement between Chunu, Kurhengamuzimu, Rubango and mwami Ndatabaye. This time, they agreed to share the benefits of the gold exploitation. According to my informants the different parties agreed that in the contribution paid by the artisanal miners, Chunu would take 40 percent, Rubango 25 percent, Kurhengamuzimu 15 percent and FARDC 10 percent.

During my next visit in May 2012 I discovered that Chunu was in effective control, with security backing from FARDC, who had their share in the mining rents. Chunu and Marocain tried to canalise the mining activities through the cooperative they had officially created in 2009, the 'Coopérative Agro-Pastoral et d'Exploitation Minière de Kalanga et Lukwera'. This meant that they obliged all miners to become a member, and they demanded all shaft managers to contribute 10 percent of their production to the cooperative³²⁶. The creation of the cooperative is a clear example of legalisation and can be explained in light of the formalisation of the artisanal mining sector³²⁷. This mechanism partly overlaps with territorialisation strategies, through which state and non-state institutions create territories with restricted access, in order to consolidate control and 'govern' the people within these territories. The need to (re)establish 'state order' in Mukungwe is expressed in different official documents, from FARDC commanders to the administrator of the territory of Walungu³²⁸. The latter in his letter not only called for a consolidation of power in the hands of the mwami of Ngweshe, he also promulgated a prohibition on the sale of alcohol and an obligation on every inhabitant to register and pay taxes. At a roundtable organised by a local NGO various state representatives expressed the need to 'bring the hill under state control' and 'control and discipline' the people:

"We noticed that many things are going on in Mukungwe without the knowledge of the political and administrative authorities, even of the customary chiefs. Roadblocks are for example set up on the road between Mushinga and Mukungwe without our consent. In order to reinstall state authority in Mushinga, the 'chefferie' will proceed to identify and register all inhabitants of the 'groupement', as well as the activities they exercise"³²⁹.

Registration, mapping and classification are indeed techniques to control, govern and discipline spatial ordering and people in these spaces and are instrumental to a process of territorialisation. As I have said, Mukungwe is a remote site difficult to access. It could be argued that in general terms, the whole eastern part of the country is beyond the control of the central government, which was most visible during the 1998-2003 war. Mukungwe may actually be seen as an isolated space, outside the state's reach. The name under which the mining site is commonly known, Maroc, notably captures this state of isolation: a desert, a hill of refuge for mainly young men who were – socio-economically and politically – marginalised in their communities, and a hill full of promises for fortune seekers.

³²⁵ See chapter eight.

³²⁶ Interviews in Mukungwe, 05/2012. The June 2011 data from the Provincial Mining Division show that the file of Chunu's cooperative had been introduced for verification (*Relève des coopératives minières enregistrées ayant sollicité l'agrément par le biais de l'administration des Mines du Sud-Kivu*, 03/06/2011.)

³²⁷ See chapter eleven.

³²⁸ Decision n.5072/001/BUR-AT/TER-WGU/2011 on restoration of state authority, 08/07/2011.

³²⁹ OGP, Rapport de l'atelier d'harmonisation des points de vues des parties en conflit, pour un paix durable à *Mukungwe*, Atelier organisé à Madaka, groupement de Mushinga, 13-14/07/2012.

Banro has for a long time been reluctant to work in Mukungwe because of the hostility of the local population. In 2012, however, they became more proactive in working with the provincial and national government. As the Mining Registry had to clarify the boundaries of the concession, in early 2012 a joint mission of government, Mining Registry, Banro and civil society went to Mukungwe to collect GPS data to determine the concession limits. The miners welcomed the delegation by throwing stones at them, and the whole mission was severely criticised because Banro, one of the stakeholders, had paid for most of it. In July 2012 a roundtable was organised by a local NGO in order to settle the issue. The conflicting parties agreed to demilitarise the mining site, to clarify the concession rights, to search for sites where artisanal miners can legally work and to set up a commission to do the follow-up (OGP, 2012)³³⁰.

As I have said earlier strategies of privatisation and enclosure often prevent access for those without a legal (according to state law) title to the resources, in this case a large group of artisanal miners. If the Mining Registry, as I discussed above, decides that Mukungwe lies within Banro's concession, the 200 mining shafts may be closed down and at least 1000 to 3000 miners will be dispossessed, displaced and will lose their main source of income. In Mukungwe, the artisanal miners violently protested against Banro's arrival on several occasions. They had seen the example in neighbouring Luhwindja, where thousands of miners were displaced and have lost their only source of income because Banro closed down the main artisanal mining sites, as will be demonstrated in chapter twelve. Finally, the tensions in Mukungwe are not likely to ease soon. On 1 April 2013 Pasteur Kurhengamuzimu was assassinated in his house in Bukavu³³¹. His partisans accused the other families, and more particularly the Rubango family, of being accomplices to this crime, but the full facts of the case remain unclear³³². In September 2013 FARDC withdrew all soldiers from the mine and arrested three soldiers who had continued activities there (UN, 2014: par. 164).

³³⁰ Interviews in Mukungwe and Bukavu, 2012.

³³¹ Personal communication by e-mail, 06/04/2013.

³³² Personal communication by e-mail, 30/05/2013.

7.5. CONCLUSION

In Mukungwe's history, I have devoted a lot of attention to control mechanisms, as is clear from table 12. Indeed, Mukungwe's history has been quite violent and still is today. Access maintenance for artisanal miners was and is heavily constrained. Still, miners demonstrate their agency in strategically allying with one or the other power holder, according to who holds effective power at that moment in time and who is best believed to serve their interests. They have also shown their agency in violently opposing Banro's arrival. The majority of miners here are migrants. Maroc is a 'typical' mining camp with wooden shelter constructions and total absence of public infrastructure – as opposed to Kamituga and Luhwindja which have real centers and more sustainable infrastructure. This also plays a role in the configuration of access mechanisms. For these highly mobile, mostly young people it is more difficult to maintain access, first of all because of the constraining and violent context they are working in, but secondly also because they have fewer structural and relational access mechanisms at their disposal.

The chapter has shown how the conflicting elites use 'the law' in its various manifestations (state law, customary law, judicial decisions) to back their claims and control access. But the law itself has also proven to be dynamic, not always straightforward and open to interpretation. This has been demonstrated by the continuing confusion about the designation of concessions to one company or another, or to artisanal and industrial mining. Moreover, legalisation, which primarily serves the discourse and practice of legitimising claims, may only become effective when combined with structural access mechanisms (access to financial capital) and/or violence and coercion. The conflicting parties have allied with and have even created their own armed groups. During the war the M-40 militia, which had emerged out of a private force protecting Kurhengamuzimu's interests in the mine, terrorised the entire region. In the more recent period, several coalitions have been made between local elites and different factions of FARDC. As such, Mukungwe's history is intrinsically connected with provincial and national power dynamics as well. The government recently also made a number of attempts at 'restoring state authority'. These included endeavours to officially attribute the concession to Banro, which could be interpreted as a strategy of discharge. It again demonstrates how in Mukungwe local and national dynamics of state formation crystallise.

Figure 3. Workers' houses in Kamituga



Figures 4-7. Kamituga: miners working with a karai (top left), biporo (top right) and sluice with kisasi (bottom)



Figures 8-9. Artisanal miners working alluvial deposits in the Mwana river



Figures 10-11. View on the shafts in the hillsides around Mobale mine (left) and Kalanga and Lukwera (right)³³³



Figures 12-13. 'Qui cherche, trouve' in Kamituga



Figures 14-15. 'Descenderie' in Mukungwe (left) and 'direction' in Kamituga (right)



Figures 16-17. Wooden constructions inside the shafts in Mukungwe (left) and Kamituga (right)



³³³ See also maps in annex.

Figures 18-19. 'Mamans twangaises' in Kamituga (left), miners using a 'karai' for the 'pannage' (right) in Kamituga



Figures 20-21. Miners burning the gold with nitric acid in Kamituga



Figure 22. Schematic representation of an underground conflict



Figures 23-24. Illustrations of the drawbacks of granting credit



PART THREE

"Pour moi, je ne veux pas me donner un maître quand je peux être libre; j'ai des outils et j'ai encore de l'or dans ma bourse; je travaillerai pour mon compte. Si je ne réussis pas, et lorsque j'aurai dépensé ma dernière once d'or, j'irai de nouveau me mettre aux gages d'un autre, mais seulement le temps nécessaire pour me remettre en fonds" (p.109).

> "I don't want to work for a boss when I can be free ; I have my tools and I still have some gold on me ; I will work for myself. If I fail, and when I'll have spent my last money, only then will I work for someone else, but only temporarily, the time to build up new reserves" (p.109).

"Chacun, après le dîner, avait raconté son histoire; toutes, avec quelques variantes, se résumaient en ceci: on avait fait de l'or, et on en avait dépensé; on avait eu faim, on avait couché sous les buissons, deux, trois, et parfois six mois de suite, sans se déshabiller soit faute de lit, soit par peur des Indiens. En fin de compte, pas un seul n'avait encore conquis la fortune, mais tous - tous les survivants – espéraient encore y arriver" (p.156).

"After dinner everyone told his own story, all boiling down to more or less the same : we had found gold and we had spent it ; we had been hungry, we had been sleeping under the bushes during two, three, sometimes six months with our clothes on because we had no bed, or we were afraid of the Indians. In the end, nobody had made fortune, but all of us still had the hope to do so" (p.156).

A simple question serves as a starting point to all the chapters in part three: how do miners and traders benefit from artisanal gold mining and trade activities? My theoretical framework states that individual actors use a diversity of access mechanisms in order to benefit from a resource. In this chapter I discuss some rights-based, structural and relational access mechanisms applied by different categories of artisanal miners in the production phase. So this is based on practices, on what actors do in order to gain, maintain or control access. As said in chapter three, practices may evolve into *norms* if they come to be accepted by the members of a specific group and if non-compliance leads to some kind of sanction. In this case, the group is a 'professional group' of artisanal gold miners, which of course interacts and overlaps with other groups that need to deal with and influence the norms set within the group of artisanal miners, like in a 'semi-autonomous social field' (Moore, 1978). I therefore label the norms governing gold mining activities in a very general sense as 'professional norms', although sanctioning can happen by the professional actors themselves (individual miners, associations or trade unions), but also by guilt (in which case they can be called moral norms), contempt or shame (in which case they are also social norms), or customary or state authorities (customary and official norms). So norms in the gold sector have evolved out of actual practices – as part two already demonstrated - but they also direct what individuals can do, or what access mechanisms they have at their disposal.

What I describe in this chapter are the practices and norms that characterise the artisanal mode of production in the study sites in South Kivu. As will be indicated, many of these norms resemble norms prevailing in other African gold mining sites such as in West Africa as described by Grätz (2002, 2004, 2009) and Luning, Panella and Pijpers (in Panella, 2010) or in Tanzania as described in Bryceson et al (2014). This can be attributed to the materiality of gold and the resulting extraction, processing and trade processes, which to a certain extent determine which practices and norms will emerge, in spite of contextual differences that may

produce significant variations in norms and practices³³⁴. In light of these prevailing norms, I also describe the access mechanisms that are used in order to maintain or control access. In this sense, my analysis allows to draw some conclusions on agency (actors), norms and power relations in artisanal gold mining.

Yet when assessing the 'ability to benefit' there is first of all a need to examine what the 'benefits' in gold mining are (see Ribot and Peluso, 2003: 161). Otherwise, the ability to benefit remains quite nebulous and probably useless from a development point of view. Given the fact that working conditions are difficult, production is hazardous and failures are a real possibility, one may wonder why people engage in this sector and what they get out of it. As this chapter demonstrates, this can not only be answered in terms of financial profits or incentives. Other aspects such as hope, freedom, identity, social status, relationships and values are also important.

The findings will feed in to part four, where the question about the viability and future of artisanal mining will be addressed. The empirical material in this chapter relates to cases in Kamituga, Luhwindja and Mukungwe and particularly draws upon miners' own experiences, with data taken from qualitative, open interviews and the structured survey. Although there are other types of artisanal mining in the study area, this chapter focuses on underground shaft mining as I did most of my research there. The chapter first gives an overview of artisanal mining in Kamituga, Luhwindja and Mukungwe (8.1) and briefly describes alluvial placer mining (8.1.1) and underground shaft mining (8.1.2). Next, section 8.2 analyses benefits in gold mining, looking at why people engage in the sector (8.2.1), how much they may earn (8.2.2) and how they spend these earnings (8.2.3). Section 8.3 discusses the rights-based mechanisms through which miners gain access to the sites they are working in, as well as complementary relational access mechanisms. Especially in this section it will become clear how the historical trajectories described in part two have shaped current practices and norms in gold mining. Section 8.4 analyses structural and relational access mechanisms in underground shaft mining, pointing to different categories of actors and their practices. Section 8.5 presents a further analysis of the professional norms governing these mining projects. Finally, section 8.6 concludes.

8.1. Artisanal mining in Kamituga, Luhwindja and Mukungwe

In and around Kamituga, Luhwindja and Mukungwe gold is extracted in various ways. The most common ones are alluvial placer mining and underground shaft mining.

8.1.1. Alluvial placer mining

Alluvial placer mining implies the use of water to recover gold from placer deposits. This gold usually occurs in the form of dust, or occasionally nuggets, which are already quite concentrated in form. The deposits consist of sand and gravel that settle down at points where rivers slow down. In many places, miners have artificially created such points, by diverting rivers and setting up constructions aimed at slowing down the water streams. They may, for

³³⁴ There are differences, for example with respect to access and titling (Bryceson and Fisher, 2014), which can be related to the larger institutional context. See also chapter thirteen.

example, excavate near-surface pits using hoes and shovels, or they may dig large trenches in which they divert the water and start extracting. The extraction techniques take advantage of the high density of gold, which causes it to sink more rapidly than other materials. The techniques that are most commonly used in the rivers I visited were panning and sluicing.

Panning, a technique that was already used by the 'gold rushers' in 19th century California, employs a pan, in South Kivu commonly called a 'karai', in which some gold-bearing sand or gravel and a large amount of water are swirled around. By making the swirling movement, the heavier gold particles assemble at the bottom of the pan, whereas the lighter sand, mud and gravel, can be washed over the side of the pan. The sluicing technique relies on the principle of directing and slowing down the water stream by digging trenches and dykes, and trapping the gold particles in recipients such as boxes covered with fabric. In the South Kivu rivers miners use the bark of a banana tree ('biporo'), carpet or blankets ('blanchettes'). The long boxes or trenches which they use as sluices are called praus ('pirogues') in the river Mwana³³⁵. Another tool they use is a 'kisasi' or a riddle which separates the largest stones before the water is run through the sluice. In Kamituga, miners also use a technique they call 'débordage': they use shovels to loosen up the sand, and dig canals that are used to wash it, so that the sand flows to a basin where pans or sluices can be used to extract the gold concentrate³³⁶. A condition for this type of gold mining is, obviously, the abundant presence of water. Because of the multiple interferences in the course of river streams, the water level in many rivers has considerably decreased. It is thus during the rainy season that a lot of work can be done in these sites³³⁷.

In Kamituga the four main rivers, which each have a large number of tributaries, are Zalya, Lusunga, Kiloboze and Idambo³³⁸. The Mobale river is one of the tributaries, where alluvial exploration has taken place since the 1930s. In Twangiza (mainly Luhwindja and Burhinyi chiefdom) MGL explored for alluvial gold deposits in the Mwana since 1957³³⁹. The company followed the alluvial depoits upstream from the Mwana to Mbwega hill, which later became Banro's main 'Twangiza deposit'. But artisanal activities have been taking place in the Mwana river since the 1960s until now. Particularly the three kilometer stretch downstream from Mbwega has hosted a large number of artisanal miners, partly because the washings from the artisanal processing in Mbwega carried a lot of gold this way³⁴⁰. The miners slow down the water here and dig channels, trenches and dykes allowing them to extract the gold concentrate³⁴¹. Yet their techniques do not allow them to recuperate all the gold. Banro estimates that at least half of the 300000 ounces of gold that have been wasted and washed away from Mbwega have not been recovered by artisanal miners³⁴². In other words, these sands might still be economically profitable to the company. In Mukungwe alluvial mining takes place along the Nyantanda river³⁴³.

³³⁵ Fieldnotes, 26/10/2011.

³³⁶ Interview with miner, Kamituga, 09/04/2008.

³³⁷ Interview with miner, Lugushwa, 26/01/2011.

³³⁸ SRK Consulting (2005) NI 43-101 Technical report. Resource estimation and exploration potential at the Kamituga, Lugushwa and Namoya concessions, Democratic Republic of Congo.

³³⁹ Banro Corporation (2006) NI 43-101 Technical report, Twangiza project, South Kivu province, Democratic Republic of Congo.

³⁴⁰ Banro Corporation (2007) Alluvial gold potential of the Mwana river: preliminary evaluation.

³⁴¹ Idem: 6.

³⁴² Idem.

³⁴³ Communication by J.P. Balagizi, *Les conditions de travail et organisation des artisans miniers, Cas de Mukungwe en RDC*, BICC (Bonn International Center for Conversion), Bonn, Germany, 29/02/2012.

8.1.2. Underground shaft mining

In Kamituga the main underground mine is Mobale³⁴⁴. Mining of primary gold veins began here in 1937, when the cyanide flotation plant in Kamituga was commissioned³⁴⁵. Industrial extraction was organised in the following way³⁴⁶. First vertical tunnels were dug, before chasing the gold vein horizontally. The main tunnels were dug just beneath the gold vein, and miners reached the auriferous rocks through smaller tunnels of about 1 m in diameter reaching up to it. Stones were excavated over a length of about 75 cm, after which they left a 'pillar' to support the ceiling. The excavated stones were then loaded onto little wagons, and a mechanised rail system carried the loads to the processing plant. Other primary gold veins can be found in near-surface deposits such as Kalingi and D3 (Petite Mobale). Current gold mining activity in the area is artisanal, extracting ore³⁴⁷, which is then further processed, as I will demonstrate later³⁴⁸. In Twangiza, the main underground deposits that were prospected by Sominki were Mbwega, Lukunguri and Kashegeshe (Kaduma)³⁴⁹. In Mukungwe, artisanal miners discovered rich gold veins in Kalanga and Lukwera (Kalazi).

8.2. BENEFITS IN ARTISANAL GOLD MINING

8.2.1. Why miners mine

As described earlier the literature on ASM has extensively studied why people engage in artisanal mining. I believe this is important as a starting point in order to understand what kinds of benefits they seek in gold mining. Three main dynamics have been distinguished in the literature: the lack of alternatives and poverty (push factor), the attractiveness of fast money and high profits (pull factor) and a more contextualised dynamic based on the social, economic and historical 'rootedness' of the artisanal mining sector. On the basis of the survey data, table 13 gives an indication of artisanal miners' primary reasons for choosing to work in the mining sector. The proportion of people who are 'pushed into' the mines because of a lack of alternatives and those who are 'pulled into' the sector seem to be more or less in balance, with almost 55 percent of the respondents saying they were primarily motivated by the possibilities to earn money, against about 40 percent opting for mining in the absence of alternatives. A quarter of those who said they acted because of the money making possibilities confirmed that they had been inspired by the examples of others who were already active in the sector, mostly friends, acquaintances and family members, such as their parents.

³⁴⁴ The most important veins are veins A and B at Mobale, veins 16, 18, 20, G15 an dG22 of Grand Mobale, and Tshanda. SRK Consulting (2005) NI 43-101 Technical report. Resource estimation and exploration potential at the Kamituga, Lugushwa and Namoya concessions, Democratic Republic of Congo: 18. Maps in annex. ³⁴⁵ Idem.

³⁴⁶ Interview with Serge Lammens, Ottignies, 05/09/2009.

³⁴⁷ The term 'ore' is used for rock or gravel that contains an economically valuable gold concentrate. I will use it here to refer to the raw, unprocessed material, which can be in the form of pure sand, gravel or hard rocks, leaving the mining shaft.

³⁴⁸ SRK Consulting (2005) NI 43-101 Technical report. Resource estimation and exploration potential at the Kamituga, Lugushwa and Namoya concessions, Democratic Republic of Congo.

³⁴⁹ Banro Corporation (2006) NI 43-101 Technical report, Twangiza project, South Kivu province, Democratic Republic of Congo.

Table 13. Primary reason for working in this sector (consolidated table- percent of responses)

| Push | Lack of alternative employment/ poverty | | | | |
|------------------------|---|---|--|--|--|
| Pull | Possibility to earn money/ followed the example of others | | | | |
| | Other | 5 | | | |
| Source: Survey results | | | | | |

Indeed, push and pull factors are very difficult to disentangle. When triangulating these results with my qualitative data, the conclusion is that in reality push and pull factors coexist. Despite the fact that individual interviewees may give more prominence to the one or to the other, most of the time both dynamics are present in the story of a single individual. Yet for the sake of clarity I will first go deeper into the 'push' dynamics, then I consider the 'pull' factors.

Part two of this dissertation exemplified how artisanal mining emerged as a response to the economic crisis and the growing inability of the state to provide for its citizens. Two moments in history provided for an acceleration and intensification of this process: liberalisation in the early 1980s and the wars in the late 1990s, which both provoked a massive influx of people to the mining sites. This went together with the declining attractiveness of other livelihood activities. Agriculture for example had become less appealing after the introduction of a 'modern' land law in 1973 and erosion of the traditional land system, resulting in dispossession and marginalisation of small peasants, combined with demographic pressure in certain regions in South Kivu and a nation-wide economic crisis, absence of adequate infrastructure and accessible roads or markets (Van Acker, 2005). The wars of the 1990s further undermined customary power and shifted land control towards business and military elites. Insecurity in the countryside caused peasants to abandon their fields, having a direct effect on food production and consumption (Vlassenroot, 2005: 25). As a consequence, people were forced to flee the villages and migrate to urban centres or mining sites, where money could more easily be made (idem and Cox, 2011: 246). Many people, especially women, have become petty traders and have been selling all kinds of products on local markets in a search for alternative livelihoods. In this sense Cox (2011: 245) referred to a "profound post-war exhaustion" on the countryside, which manifested itself socially and economically, but also environmentally. People said that "the soil is tired" and not fertile anymore. A second example is the evolution in public sector jobs, such as state administration or teaching. In the 1980s it became increasingly clear that salaries were no longer being regularly paid and were insufficient to cover basic needs because of hyperinflation. This was an important push factor for some people to go to the mines, while others continued to combine their 'official' job with a job in artisanal mining. The following interviewees from Mukungwe (one), Kamituga (two) and Luhwindja (one), testified to this:

"At a certain moment I was fed up with my job in the administration. We were not even able to pay for our children's school fees. I saw all these houses in Bukavu popping up, and when I made my analysis, I realised that all owners were directly or indirectly involved in the gold sector. I told myself that I may also give it a try and succeed in this sector. [Question: and have you succeeded?] I have not completely succeeded yet, but I have seen that it is possible.

Unfortunately we are often blocked by small technical and financial problems, but it is really a potentially profitable domain, if you work hard and are prepared for a lot of sacrifices"³⁵⁰.

"After I had obtained my degree I worked for one year in teaching, but the salary was very low. I earned USD 30 or 40 per month, but I have a wife and two children, so I was obliged to look for something else. I started to dig for gold. I worked for different shaft managers and lived well"³⁵¹.

"I have been operating this loutra³⁵² for 25 years, since the time of Sominki. I was working as a teacher, and everybody knew that my salary was much too low, so they allowed me to do something on the side. That is how I opened my loutra, where I was active after the school hours. And if the Sominki staff came by and started to ask questions, I just said that I was a poor teacher, and they tolerated me³⁵³.

"I am a teacher. After completing my studies in Bukavu I came to Luhwindja, where I taught for 18 years. But the money we were being paid lost its value day after day. I saw all these people who went to work in the mines, and the mwami allowed them to. That is why I also went to the mwami and told him I wanted to start mining. The mwami was controlling all the mines and gave me a place to work. I could not continue teaching. After a year in the mines, I was already capable of buying a truck, with which I started to transport goods. I also sent my children to school, and bought some cows"³⁵⁴.

Children who were born in Kamituga, Luhwindja or Mukungwe grew up with artisanal mining and have often evolved in the same sector. As said before, their familiarity with the sector and the experience they accumulated is an advantage for them and may contribute to their success. As the example below shows, they may have combined different activities in the gold sector, such as mining, trading and operating a 'loutra'³⁵⁵:

"I started digging for gold at the end of the 1970s, when I was in primary school. It was forbidden at that moment, but we were just little children who sneaked their way in and started to do this work. From the early 1980s I was then involved in gold mining fulltime. Mining was very easy back then. Well the only difficulty was that officially the activity was prohibited, but gold was easy to find, even though we did not use pumps and so on. Today we are free to mine, but the gold is much harder to find. In 1985 then I opened up a loutra near my house, which provided me with good yields. I also started to buy gold and was prospering rather well. I gained the trust of other traders, because they saw that I was an honest man. Eventually I was able to buy a plot in Bukavu and buy a house"³⁵⁶.

As a third example of push factors, many young people working in the mines today reported having given up their studies because of lack of financing. They decided to go into mining,

³⁵⁰ Interview with miner, Mukungwe, 31/05/2012.

³⁵¹ Interview with miner, Kamituga, 20/01/2011.

³⁵² A loutra is a fenced-off space were gold can be processed.

³⁵³ Interview loutrier, Kamituga, 21/08/2009.

³⁵⁴ Interview with former miner, Luhwindja, 01/2011

³⁵⁵ Later in this section I will come back to the issue of investment of mining profits and accumulation. In chapter nine I will further develop the concept of 'honesty' in gold trade.

³⁵⁶ Interview with miner, Kamituga, 08/2009.

some with the aim of earning enough money to pursue their (higher) studies later on³⁵⁷. Indeed, despite the fact that it offers very little job security, studying and obtaining a certificate is still considered to be very important in South Kivu. Yet parents and youngsters are often unable to pay the school fees, as the following testimonies show:

"Life had become difficult and when I was in the second year of secondary school, I noticed that my parents were not able to pay for my school fees anymore, so I decided to go to the mines and help them"³⁵⁸.

"We lived in terrible conditions. My mother died very young and my father married my stepmother, so me and my brothers, we had to take care of ourselves. That is how I gave up school and got involved in this activity"³⁵⁹.

These examples show that poverty and the lack of formal employment or study opportunities definitely play a role in people's decision to go into gold mining. The expression 'kutafuta maisha', to 'seek how to live', was often used in responses to the question why miners engaged in the sector. This is hardly surprising in a context such as South Kivu with alarming poverty headcounts of 94 and 76 percent for the rural and urban areas respectively and a structural poverty rate of 40 percent (Marivoet, 2013: 266, 280)³⁶⁰. Yet the high poverty incidence and the limited availability of formal jobs do not fully explain why people would want to engage in the mining sector particularly. Some additional information is needed to account for this, which brings us to the opportunities of the artisanal mining sector, or in other words, the factors that may 'pull people towards' the sector.

Three dimensions came out of the analysis as being most important: money, lifestyle and freedom. A former child miner for example was principally attracted by the lure of money in Mbwega: "I started at the age of ten. I was just looking for money. Per month I earned at least USD 350. And then I could spend it as I wanted! I also bought two cows"³⁶¹. As indicated earlier the respondents who acted upon the 'possibility to earn money' often did so because they had seen others making relatively good money in mining:

"I studied electricity in Bukavu, but I failed in the third year. My parents were mad at me and refused to further pay for my studies, so I came here to stay with my grandparents. I found my uncle here, who was already working in Mbwega and making good money. He initiated me into the activity"³⁶².

With the availability of cash also comes a particular lifestyle. In the mines, beer, prostitutes, dancing clubs, cinemas, parties and other leisure activities are readily available. Actually miners may not come in the first place because of this lifestyle, but once they become part of this world, they get 'dragged into it', as the following quote illustrates:

³⁵⁷ Group interview with miners, Lugushwa, 26/01/2011. Interview with miner, Mukungwe, 01/06/2012. Interview with miner, Mukungwe, 31/05/2012

³⁵⁸ Group interview with former child miners, Luhwindja, 01/2011.

³⁵⁹ Interview with former miner, Luhwindja, 08/01/2011.

³⁶⁰ The structural poverty rate is based on a combination of income measures and assets. People living in structural poverty have an income below the poverty line and they also have a low level of assets.

³⁶¹ Interview with former child miner, Luhwindja, 01/2011.

³⁶² Group interview with former miners, Luhwindja, 11/01/2011.

"I entered into this activity because I did not have the money to pay for my school fees. So what we did, after school we took our shovels and went into the river to look for gold. When we had found something, we went to Mbwega to sell it to the traders and there we lived the 'ambiance' at night. The following morning, those who had to go to school left, and the others may have stayed. Some even skipped school because of this 'ambiance'. So that is how I eventually gave up school. We just forgot about home because of the atmosphere in Mbwega. I couldn't even stand being at home for a long time, because my mind was in Mbwega"³⁶³.

This example creates the impression that gold mines are 'a world apart', characterised by a distinct culture and distinct norms, a point to which I will come back. This world is especially attractive to young men. The fact that they can earn and spend money here, allows them to build up a social status as men, more specifically as men who are earning money and thus capable of providing for a family, which is a very important element in the construction of their identity. The man who can provide for his family (a 'responsable de famille') is respected in South Kivu. This point actually relates to the argument made by Jeroen Cuvelier (2001: 29) in his dissertation on artisanal miners in Katanga province. Starting from an anthropological view on 'masculinities' he argued that engagement in artisanal mining is "also [...] an attempt to retain a sense of individual achievement and masculine working pride" (idem).

A third dimension that is definitely worth mentioning is the 'freedom' offered by the artisanal mining sector. Miners are mobile, ready to move from site to site according to the availability of minerals. Thereby they are the chief of their own decisions and responsible for their own money. They are not dependent upon an employer, but just rely on their own force:

"[Question: if you compare the profits of a miner with the salary of a day labourer at Banro, how would you compare?] You cannot compare because an artisanal miner is free. In our conception of consumption, a miner is a rich man if he does not work for another person. He goes to work when he wants, if he wants, he may work for two hours and if God blesses him he may find enough money to buy a car in these two hours"³⁶⁴.

In my research I also found that especially young people believe that artisanal mining offers them the opportunity to break away from their parents' control and from social pressure in the village or neigbourhood³⁶⁵. The mining site offers a context where you can be anonymous and 'start all over', like this blacksmith working in Lugushwa who fled his native village:

"In my village I have a house, and fishing ponds, so in principle I could even make a living there. But because of people's mentality I prefer to work here. I ran away from their witchcraft practices and prefer to stay here, where people do not know my background"³⁶⁶.

Having looked at some reasons to enter the artisanal mining sector, let me now follow up with the question whether miners want to remain in the sector or prefer to exit, and for which reasons. The survey questions we took from shaft managers first of all revealed that 83

³⁶³ Interview with miner, Luhwindja, 09/01/2011.

³⁶⁴ Interview with chef de groupement, Luhwindja, 01/2011.

³⁶⁵ See Vwakyanakazi (1992: 381) and Bryceson and Fisher (2014: 180).

³⁶⁶ Interview with blacksmith, Lugushwa, 25/01/2011.

percent of them plan to remain in the artisanal mining sector. We followed this up with a second question, asking if they would stay in mining even if they could freely choose from a variety of possible alternative livelihood activities. 54 Percent still responded affirmatively. Thus, there seems to be quite a gap between miners' realistic options and their ideal options. The problem is, indeed, that the first scenario is realistic, and the second is not. Nonetheless, the percentage of shaft managers preferring to stay in the sector, despite the availability of alternatives, remains high at 54 percent. To those respondents we asked a question about their motivations as well. The results are summarised in table 14.

| Gainful activity | 42 |
|---------------------------|-----|
| Only activity I master | 20 |
| No alternative | 17 |
| Only activity in the area | 11 |
| Easy money | 5 |
| I like my job | 5 |
| I hope to gain | 3 |
| Investments made | 1 |
| Total | 104 |

Table 14. Motivation to stay in artisanal mining (number of responses)

Source: Survey results

Almost half of the respondents said they wish to remain in mining because it is a profitable activity. This means that they find enough in this activity to continue, although a handful rather point to the hope of gaining and to the fact that mining provides relatively 'easy' money. 17 respondents said they really saw no alternative (even if this was part of the survey question), while 20 referred to the fact that mining is the only activity they master. 11 respondents answered that mining is the 'only possible activity in the area', which relates to the previous observations about the absence of alternatives. In brief, for many shaft managers mining is a viable job in the context they are living in.

On the basis of these data two 'barriers to exit'³⁶⁷ seem to be particularly important for shaft managers: the lack of alternative livelihood opportunities and the entanglement of artisanal mining with local economies. Yet interviews revealed the importance of social and financial barriers as well, and thus sketch a more complex picture. The particular 'lifestyle' miners adopt may make it difficult for them to leave. Some have also started new families while being in the mines and find it hard to return to their old family: "Many miners who came here, are here to stay. They don't even know anymore where they come from. They start a new family. They don't know how to return"³⁶⁸. A financial barrier must be added to this. If one has not had the chance to accumulate financial capital, the possibility of 'returning to the family' may be excluded:

"In 2001 I came from Congolo in Katanga. People had told me that in Lugushwa there is a lot of business to do, so I came with a load of beer. It was a difficult period, since there was RCD and Mayi-Mayi all around. But I arrived and managed to sell the beer, but after a few months I ran

³⁶⁷ See section 1.2.

³⁶⁸ Interview with miner, Lugushwa, 25/01/2011.

out of money, and so I decided to start mining as well. Now I dig and I dig, and I haven't found anything substantial yet, because if I had, I would already have returned home. I never returned, I left my family there in Katanga, but in the meantime I remarried here and have three children"³⁶⁹.

Moreover, shaft managers, but also individual miners, generally incur many debts in the mines³⁷⁰. They are tied to their financiers and may run into serious problems if they don't manage to produce enough and are unable to pay their debts back. This issue will be further explored in chapter nine.

The most important point arising from this analysis, combined with insights from part two, is the 'rootedness' of artisanal mining activities and the deep entanglement with local economic and social worlds. In the mines I visited dozens of interviewees expressed the feeling that gold is the only possible source of income and it supports all other economic activity in the area. The following quotes were noted down in Luhwindja (two) and Kamituga (two):

"During all that time we have been mining. We don't usually work the fields here. We only like to dig for gold, and it is the gold that nourishes us and our families"³⁷¹.

"Some were born in this activity, they grew up in it, they married and started families. Their children also grew up knowing nothing else than mining. So instead of going to school, these children will have to accompany their father in the mine"³⁷².

"I cannot say what motivated me, because here in Kamituga we live from this activity only. It is the only movement there is here in Kamituga. I have not studied, so I also had to go with the rhythm of this place"³⁷³.

"If you close the mines, you kill everyone in Kamituga"³⁷⁴.

But artisanal mining activities have not only become the pivot of local economies. They have also become part of people's 'mindsets', since they are the embodiment of how people imagine living in these places. In their study on conflict and socio-economic realities in Kamituga during the second war period, Vlassenroot and Raeymaekers (2004b: 145) argued that gold mining had become "a way of life" for the younger generations³⁷⁵. They also expressed a local belief that gold mining produced at least one positive effect, the fact that its attractiveness prevented many youngsters from joining the militias (see also Johnson D., 2013). Their research may seem to suggest that the adoption of gold mining as a way of life could be related to the war, even if the authors acknowledge that economic 'informalisation' and social destruction are not consequences of the war, but that "the conflict has pushed them to their limits" (idem: 149). Nowadays, artisanal gold mining is conceived as the most

³⁶⁹ Interview with miner, Lugushwa, 25/01/2011.

³⁷⁰ See section 1.2, where I also refer to Banchirigah (2008); Banchirigah and Hilson (2010); Perks (2011).

³⁷¹ Interview with miner, Luhwindja, 08/01/2011.

³⁷² Interview with police commander, Luhwindja, 09/01/2011.

³⁷³ Interview with loutrier, Kamituga, 19/08/2009.

³⁷⁴ Interview with miner, Kamituga, 07/04/2008.

³⁷⁵ See also Grätz (2009) who described the social world of West African gold mines.

viable and legitimate activity to turn to in a context where alternatives are lacking. It is thus more than just an economic survival strategy. It is a moral economy, closely entangled with local economic and social realities. In the remainder of this chapter this argument will be enriched by analysing rights-based and structural access mechanisms miners employ.

8.2.2. How much miners make

This section makes an attempt to assess the economic benefits generated in artisanal gold mining. The analysis is based on a number of economic parameters, looking respectively at the turnover of a mining project (based on total production), the costs incurred, the norms for output sharing and the resulting profits made by individual actors. But it certainly does not constitute a pure cost/ benefit analysis. The analysis includes quantitative data from the survey, but interprets and contextualises these using qualitative data. For a systematic description of the exploitation process and the categories of actors involved, see also section 8.4.

Turnover

Production varies widely in artisanal gold mining, depending on whether the team is in the preparatory period or in the high production period. To give an indication, the surveyed shafts (258 in total) reportedly produced on average (over a time span of one year preceding the survey) 482 g (344 renge) per month during high production and 59 g (42 renge) during the preparatory phase. The proportion between preparatory and high production period (expressed in number of weeks) varies a lot and really depends upon when a mining project started and what phase it is in. Some survey respondents misinterpreted this question, but those who did specify the number of weeks in production and the number of weeks of the preparatory works, and for which the total added up to 52 weeks or one year (110 shafts in total), reported an average of 35 weeks in production. To give another indication, in the month preceding the survey they reported an average production of 108 g (77 renge). Against the October 2011 price of USD 46.86 per gramme³⁷⁶ this would account for an average turnover of USD 5,081 in one month.

Apart from availability of minerals and investment possibilities, another factor affecting production is the climate. During the wet season, it is more difficult and dangerous to mine underground because of the mounting water, thus wet season yields are typically lower than during the dry season. However, more people may be involved in alluvial mining at that time.

Costs

An underground shaft mining project requires a considerable financial investment³⁷⁷. From the survey it can be concluded that in the month preceding the survey the PDGs faced an average cost of USD 1411 for their shaft, which is somewhat less than a third of the total turnover.

³⁷⁶ See section 10.1.1. Data as from October 2011.

³⁷⁷ For this part I am highly indebted to Francine Iragi, who used the same survey data for an analysis in her master's dissertation (Iragi, 2012). The respondents were asked to estimate their costs (spread over a number of predetermined categories + others) for the month preceding the survey, which was late 2011. There were 189 observations in total. Eight 'extreme' cases of more than USD 12,000 have not been taken into consideration for the calculation of the average.

These costs include material resources, human labour and contributions and taxes paid. I have already said that in some cases teams have to work a year or more before they reach a productive gold vein. As a consequence, investments in shafts may run to tens of thousands of USD before the shaft eventually produces³⁷⁸.

All stages have their specific costs. First of all, exploration may already entail costs for transport, manpower and sampling. For example, in 2012 an artisanal miners' cooperative completed an exploration mission in Walungu territory. They took 17 miners for four days and invested USD 500 in transport, food, equipment and so on. But whereas they had hoped to find near-surface gold, the results were disappointing, and deeper drilling for underground deposits would have cost too much³⁷⁹. Second, many investments obviously have to be made during the preparatory phase. There are, for example, the 'extraction costs' made to purchase tools like shovels, chisels and hammers, machetes, bags to evacuate the production and batteries for the torches. Whereas the former are renewable on average every six months, the batteries must be renewed after two days, since the miners work day and night. The fuel for the generator is an important and daily renewable cost as well. And the shaft manager needs to provide the wood for the construction work of the 'boiseurs'. Next there are costs related to manpower, as the workers need to be fed and the PDG may cover additional expenses for them. With respect to alluvial mining, the preparation costs are not that extensive. With the exception of blankets and 'biporo' used to retrieve the sand for gold placer operations renewable each week, other extraction tools are renewable after several months. The greatest expense is here the catering for the workers, which should be paid for every day.

Most of these costs continue and even run up during the production phase of an underground shaft. More investment may even be required in machines and fuel for the generators that power the water and oxygen pumps. A shaft manager in Lugushwa for example whose pit had reached a depth of 180 meters said they needed three water pumps to bridge the entire height, since each pump could evacuate the water approximately 50 meters higher³⁸⁰. To guard and when needed repair these machines, some PDGs hire a 'machiniste'³⁸¹. The same shaft manager in Lugushwa told me he also needs an oxygen compressor to blow oxygen into the deeper parts of the shaft, because since the pit has been in operation (since 1992), already eight people had died inside because of asphyxia³⁸². As I said rising groundwater is especially a problem during the rainy season³⁸³. When I visited Mukungwe in June 2012 the work in almost all shafts had been halted because of this problem³⁸⁴.

Many costs are incurred by the PDG who in turn borrows the money from a financier, as explained. One of the problems shaft managers face in a situation of mounting outside pressures is that these investments cannot be compensated for, since they have never been

³⁷⁸ Examples are multiple: investments for a total of USD 24,000 made in one shaft in Kamituga (Group interview with miners, Kamituga, 25/01/2011), of USD 6888 in another one (Group interview with miners, Kamituga, 09/04/2008), several thousands of USD in Lugushwa (Interview with shaft manager, Lugushwa, 26/01/2011), ³⁷⁹ Interview with cooperative leader, Bukavu, 30/05/2012.

³⁸⁰ Interview with miner, Kamituga, 20/01/2011.

³⁸¹ Group interview with miners, Mukungwe, 01/06/2012.

³⁸² Interview with miner, Kamituga, 20/01/2011.

³⁸³ Interview with cooperative leader, Bukavu, 14/05/2012.

³⁸⁴ Group interview with miners, Mukungwe, 01/06/2012; interview with shaft manager, Mukungwe, 31/05/2012.

formalised, and that they remain with a lot of outstanding debts³⁸⁵. In the next paragraphs I explain how the PDG recovers these investments when the shaft reaches the production phase, before making an estimation of the net profits having incurred all these costs. In the processing phase, miners individually pay for the costs of having their share processed.

Output sharing

A particular set of professional norms guides the distribution or sharing of production among the members of the team during the high production period³⁸⁶. For individual miners, a share in the output constitutes their 'salary'. Miners are not paid in cash, but always in a quantity of rocks or sand, or more precisely a number of bags containing rocks or sand. This is in fact a very important aspect since it means that their profits will always be unpredictable and depend on the quality of the material they receive. Generally, one-third of the extracted ore is used to reimburse the investment costs, including all kinds of taxes and contributions, onethird goes to the shaft manager, and one-third is distributed among the other miners. Sometimes this is done equally, sometimes the shares are divided according to their 'position', and workers with more hazardous or specialised tasks receive larger quantities. Workers with very specific tasks, like 'boiseurs', 'machinistes' or 'bouts de feu', are typically paid a fixed quantity per task³⁸⁷. As remuneration comes in kind, it is common practice to evacuate one metre of rocks or sand to cover the costs (one layer or 'muzamio'), one metre for the shaft manager and one metre for the miners. The three metres or layers thus constitute one 'cycle'³⁸⁸. It may take several weeks to work one cycle, but in the meantime, like in the preparatory phase, the shaft managers provide for the workers³⁸⁹.

In Kamituga individual miners take their bags to the 'loutra' in order to process them. They pay the 'twangaises' to pound the rocks and do the washing and cleaning themselves, before selling their production to the local traders. Interestingly, a different system is used in Mukungwe. Here miners do not process their production themselves. Instead they immediately sell the bags filled with sand ('makaru') to small traders who hang around in the mining sites. These traders pay the miners according to the expected quantity of gold concentrate contained in the bags. This may be a rather rough estimation, although the traders say they base themselves on samples they take and on traces of a particular colour in the sand, which they call 'jogge'. Their price is then based on their estimations, taking into account costs they will need to make for processing the sand and a profit margin³⁹⁰. According to observers, the traders often benefit in these transactions because they underestimate the yield³⁹¹. One interviewee even recalled an experience in which he had sold sand to traders who profited so much that afterwards "they were able to buy a house in the most expensive street

³⁸⁵ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

³⁸⁶ In South Kivu most underground mining projects respect these same norms, or slight variations of them, and similar systems can also be found in the artisanal gold mines in Tanzania (Jønsson and Fold, 2009) and West Africa (Grätz, 2009).

³⁸⁷ Interview with miner, Mukungwe, 01/06/2012; interview with shaft manager, Lugushwa, 26/01/2011; interview with miner, Kamituga, 20/01/2011.

³⁸⁸ Interview with miner, Kamituga, 20/01/2011; interview with miner, Kamituga, 03/04/2008; interview with miner, Kamituga, 11/04/2008; interview with shaft manager, Lugushwa, 26/01/2011.

³⁸⁹ Interview with miner, Kamituga, 20/01/2011.

³⁹⁰ Interview with trader, Mukungwe, 01/06/2012.

³⁹¹ Interview with shaft manager, Mukungwe, 31/05/2012; interview with local leaders, Mukungwe, 31/05/2012.

in Bukavu^{"³⁹²}. Some miners also took credit from these traders and the latter demand to be paid back in sand³⁹³. Yet it does seem to be a big gamble for the miners. Why would they not just wait for the ore to be processed, so that they are sure of the yield they have? The explanation lays in the fact that they want a quick turnover³⁹⁴. They desire to "pocket the money immediately"³⁹⁵ and are in a constant need for cash to cover their "immediate needs"³⁹⁶.

There are indeed some differences with the situation in Kamituga. Some of these differences can be explained by referring to the history and the institutional context³⁹⁷. First, the population in Mukungwe is typically younger, more mobile, and less indigenous because it has more characteristics of a 'booming town'. Second, the security situation in Mukungwe is much more volatile, which may encourage people to act and spend faster. Third, I also mentioned that the processing work in Mukungwe is somewhat more laborious, since the evacuated sand needs to dry first, and the labour of the male 'twangeurs' in Mukungwe is more expensive than that of Kamituga's 'twangaises'. Finally, the conflict between different power holders has also resulted in particular sharing agreements in Mukungwe. The customary chiefs here require a larger share of the production, varying between 30 and 50 percent³⁹⁸. The institutional context is in other words more insecure and puts the miners under greater pressure.

The sharing system described here definitely makes the process more transparent. It builds in certain guarantees for the miners, so that the shaft manager will not add to his own share. It also gives individual miners the freedom to go and sell their gold to whomever they want. And it gives them the responsibility for processing their own rocks or sand. However, disputes may occasionally arise, for example if a shaft manager does suddenly claim a larger share for himself³⁹⁹. Typically, he would justify this by saying he had investments to recoup beyond those provided for in the initial agreement. Miners may also disagree with the part that has been assigned to them. In order to avoid these kinds of discussion, one shaft manager told me that he always asks the miners beforehand which layer they prefer for themselves. He draws with a piece of chalk on the pit walls to indicate which layer is for the workers and which one for him⁴⁰⁰. In the case of disputes, associations or trade unions may intervene as well, but often these kinds of conflicts are arranged within the team.

This analysis actually demonstrates that power relations between PDGs and other miners are not so univocal. As shaft managers make greater investments, they also run greater risks and are more dependent upon their credit suppliers. Miners sometimes have to work for a long time for a very small profit, but in principle their daily needs are covered by the shaft manager. When they are prepared to 'suffer' ('souffrants') they will have their share in the output at the end. However, competition between miners may also arise because not everyone has

³⁹² Interview with local leaders, Mukungwe, 31/05/2012.

³⁹³ Idem.

³⁹⁴ Interview with miner, Mukungwe, 01/06/2012; interview with local leaders, Mukungwe, 31/05/2012.

³⁹⁵ Group interview with miners, Mukungwe, 01/06/2012.

³⁹⁶ Interview with shaft manager, Mukungwe, 31/05/2012.

³⁹⁷ See part two.

 ³⁹⁸ Group interview with miners, Mukungwe, 01/06/2012; interview with shaft manager, Mukungwe, 02/06/2012; interview with cooperative leader, Bukavu, 14/05/2012; Interview with shaft manager, Mukungwe, 31/05/2012.
 ³⁹⁹ Interview with miner, Kamituga, 09/04/2008.

⁴⁰⁰ Interview with shaft manager, Lugushwa, 26/01/2011.

'suffered' to the same extent and so output sharing may be considered by some as unfair. The way in which individual miners are remunerated, a share in the output, gives them a certain degree of freedom, but also introduces an element of arbitrariness. As will be argued later, this is a very important issue, which to a large extent determines the miners' idea of 'benefiting' from their activities. Finally miners also seek access and increase their agency through the negotiation of social relations with potential financiers (often local traders), so as to establish patron/client relationships that may be completely independent from their relationship with the shaft manager⁴⁰¹.

Profits

It is almost impossible to estimate the average profits for miners because first of all, they are reluctant to provide this information, and second, their profits are extremely volatile and unpredictable. However, in table 15 I attempt to calculate the net profits of shaft managers and miners, based on data on average production, local gold prices, average monthly costs and the share of shaft managers and 'ordinary' miners respectively. The production data (converted into grammes) were gathered from the survey and have been distinguished between the high production period, the preparatory period (low production) and the study period (since this is information the respondents would have most readily available). The local price is variable⁴⁰², but for the study period I hold on to an average of USD 40 per gramme. For the costs I adhere to the aforementioned average of USD 1411 per month, although I have already explained that these vary. During the preparatory period costs may continuously run up and since there is little production there is nothing to cover them. Instead the team lives on credit and costs are piling up until they reach the production phase. That is why in the table the costs are not taken into account when it comes to dividing the production during this period. Moreover, as I demonstrated above these costs are not necessarily incurred each month, and they are not reimbursed periodically. The share of shaft managers and miners finally is based on the principle that total production is divided into three more or less equal shares. The average number of miners per shaft was 33 during the study period. For the high production period I calculated the share of an individual miner, supposing there are 50 – because normally the number grows in this period – or 33 miners, in order to give a range. For the preparatory period, I calculated their share supposing they are 10 or 33.

It is important to note that this is only a 'typical' calculation for which individual inputs may vary a lot. A bias may also be created by the fact that neither shaft managers nor miners actually earn that money in cash, but that everything depends on the quality of the production share they receive. Nevertheless, the table may give us a general idea of what the profits in artisanal gold mining are. It shows that during the study period the income of the PDG can be evaluated at USD 1440. The 'ordinary' miners earn USD 44 each, supposing they are 33 in total. During the high production period the share of the shaft manager may mount to USD 6426, while that of an individual miner, supposing there are 50 miners active in the shaft, may be around USD 128. But if the preparatory period has lasted for more than 5 months, costs will have piled up and will exceed the USD 6426 foreseen to reimburse them. The excess costs can be taken from the PDG's share, or may necessitate a renegotiation of shares. During the

⁴⁰¹ See chapter nine.

⁴⁰² See chapter ten.

preparatory period, the share of the shaft manager is estimated to be USD 1180, against USD 118 (supposing there are 10 miners) for an individual miner. In another survey question the shaft managers were directly asked about last month's profits (for them personally), which they estimated at USD 1037 on average. This is a bit lower than what the calculations under the study period indicate.

| | High production | Preparatory period | Study period |
|--|--|---------------------------------------|-----------------|
| Production (gramme) | 482 | 59 | 108 |
| Total value (USD) ⁴⁰³ | 19,280 | 2,360 | 4,320 |
| Costs (USD) | 1,411 | 1,411 | 1,411 |
| Share of investment costs (USD) | 6,426 ⁴⁰⁴ | | 1,440 |
| Share of shaft manager (USD) | 6,426 | 1,180 | 1,440 |
| Share of miners (USD) | 6,426 | 1,180 | 1,440 |
| Share of individual miner ⁴⁰⁵ | 128 ⁴⁰⁶ /195 ⁴⁰⁷ | 118 ⁴⁰⁸ /36 ⁴⁰⁹ | 44 |

Table 15. Typical calculation of costs and individual profits in mining

Source: Author's calculation based on survey results

Owing to a lack of data this is a highly uncertain exercise. However, these data can be compared to the estimated monthly income from other sectors, such as agriculture (USD 17), 'informal business' (USD 20), 'formal business' (USD 62) or public administration (USD 25) (Iragi, 2012)⁴¹⁰. Among these options, agriculture and 'informal business' seem to be the most realistic ones for the group of miners under study, considering the scarcity of jobs in formal business and in public administration. The data suggest that gold mining is quite profitable in comparison to these other activities. Especially for shaft managers the activity may be very profitable, on the condition that they reach the production phase, of course. For other miners, the difference with other sectors may be less pronounced, but still the activity seems to be profitable.

A crucial additional factor in understanding the attractiveness of gold mining for these individual miners is the unpredictability and volatility of its profits and the resulting constant hope to 'strike it rich'. Also, money from gold mining is perceived as 'easy' and 'quick' money,

⁴⁰³ During the study period, one gramme was sold at about USD 40.

⁴⁰⁴ So when costs have been accumulated during more than 5 months of preparatory works (which is often the case), this share does not suffice to cover them all.

⁴⁰⁵ On average 33 during study period; estimated 50 and 10 respectively during high production and preparatory period.

⁴⁰⁶ Estimated share of miner based on average of 50 workers per shaft.

⁴⁰⁷ Estimated share of miner based on average of 33 workers per shaft.

⁴⁰⁸ Estimated share of miner based on average of 10 workers per shaft.

⁴⁰⁹ Estimated share of miner based on average of 33 workers per shaft.

⁴¹⁰ Calculations on the basis of the 1-2-3 national survey in the DRC. The figures on the unofficial economy must be interpreted with caution though, and are rough estimations based on survey data.

in contrast to money from agriculture, which is seasonal and comes much more slowly: "The money I find is easy money. A farmer has to wait for a long time"⁴¹¹. Artisanal gold production depends on a range of controllable and non-controllable factors, a mix of experience, skills and luck: the presence of rich gold veins, the discovery of those, the available capital to invest, available manpower, technical support, climate conditions. High production periods are thus alternated with preparatory works and low production periods. But artisanal mining provides attractive opportunities, especially to young people who are uneducated and in a context where there is a general lack of formal employment. These miners are driven, above all, by the high hope of a rich strike. In the case of Tanzania, Bryceson and Fisher (2014: 187) argued that

"Over time, this belief is tempered by the experience of the real probabilities and risks involved in mining, the exceptionally hard work it entails and the market practices and price fluctuations that can undermine the miner's earnings. Nonetheless, even at the stage of greater awareness of the pitfalls, an imaginary of 'anyone can get rich', may continue to prevail because it is observed that some do succeed".

The names of some of the shafts I visited reflected this 'imaginary'. In Mukungwe for example a newly opened shaft was named 'Kitumainiya kesho' or 'Tomorrow's hope'⁴¹². In Kamituga one can find pits like 'Bana Espoir' or 'They have hope'⁴¹³ and 'Qui cherche, trouve' or 'He who seeks shall find'⁴¹⁴. The last pit actually had a surname as well, 'Company of heritage'. For the shaft manager, this expressed the belief that "this is something eternal. Even if I die today, my son can continue to work here"⁴¹⁵. In other words, the hope even surpasses the reality, in which gold is a non-renewable resource and the deposits will be exhausted one day.

The imaginary of 'striking it rich' and 'hidden treasures' is also nourished by a number of stories that widely – and in different variations – circulate in the mining sites. In Luhwindja for example there are stories about thermal sources that are on top of a rich gold deposit, but which are guarded by a venomous snake⁴¹⁶. The Europeans already tried to chase away the snake, but they never succeeded. So whoever can overpower the mythical snake, will be rewarded with a golden treasure. Some stories really encourage people to start searching or digging. In Itabi, not far from Kamituga, the Europeans would have hidden a gold treasure walled up in concrete. As late as in 2010, local people worked there for several months in an attempt to find it⁴¹⁷.

8.2.3. How miners spend their earnings

The question now arises as to how miners spend their money. Here again I have observed different patterns, which all together provide for a nuanced analysis. Mining profits are used for covering daily family needs (food, school fees and so on), for investment (in houses, bridesprice or more productive activities like trade) and for immediate consumption in the mines (on alcohol, women, clothes and so on). First of all, miners use their profits to cover the

⁴¹¹ Interview with miner, Kamituga, 02/04/2008.

⁴¹² Fieldnotes, Mukungwe, 31/05/2012.

⁴¹³ Fieldnotes, Kamituga, 09/04/2008.

⁴¹⁴ Interview with shaft manager, Kamituga, 22/01/2012.

⁴¹⁵ Idem.

⁴¹⁶ Interview with miner in Luhwindja, 01/2011.

⁴¹⁷ Interview with magistrate, Kamituga, 22/01/2011.

daily needs of the family: food and drinks, school fees for the children, clothing and health care. Of the USD 1037 survey respondents declared to earn, they said they spend on average USD 72 for 'personal needs' and USD 404 for 'family needs'. In places like Kamituga and Luhwindja you may find entire families living in the mining sites or the adjacent villages. However, in many cases miners also left their family in their native village or in Bukavu. In the Mukungwe camp you find no families: they all live either in Bukavu – which is relatively easily accessible from there – or in other villages. In this case miners normally send part of their profits to their families, although some have become so 'detached' that they have 'forgotten about' their family:

"You see someone who earns FC 50,000 on one day, and he spends it on the same day! He does not even wash his clothes. If his pants are torn apart, he immediately buys another pair. Oh, I send nothing to my family. I eat [in the sense of 'spend'] everything myself"⁴¹⁸.

This quote illustrates a second pattern that was observed: immediate consumption of goods such as alcohol, cigarettes and fashionable clothes and on prostitutes. The following quotes illustrate this 'exorbitant consumption pattern':

"I am an adventurer. Even if I were to find 10 tolas, I would spend it buying alcohol and entertaining women. Do I have to lie about that?"⁴¹⁹

"They may earn money, but they don't know how to manage it. Take for example someone who never had USD 500, and one day he find 1000. Very likely he will spend it all at once, in the hope of finding 2000 in the same pit tomorrow. So some people spend USD 500 like that in one night"⁴²⁰.

"I just spent the money on adventures, marrying women. By the way the woman you saw at my place, she is my seventh wife. I married the fifth one, but after her I also took two new wives. [Why?] It is just youth and the pride of money"⁴²¹.

"In Mbwega these boys were making a lot of money. And they stayed there, some even for months or years without returning to their family. They got drunk and they fought, they smoked cigarettes, it was really bad. Now that they closed the mine and they have no money anymore, they have become a bit serious again"⁴²².

"When I get my money, I go to Bukavu to relax. In Bukavu you take a shower in the morning, then you go and see your friends, you discuss a bit, you rest, until it's time for your evening drink..."⁴²³.

⁴¹⁸ Group interview with former miners, Luhwindja, January 2011; interview with miner, Luhwindja, 09/01/2011.

⁴¹⁹ Interview with miner, Lugushwa, 26/01/2011.

⁴²⁰ Interview with cooperative leader, Bukavu, 14/05/2012.

⁴²¹ Interview with shaft manager, Kamituga, 22/01/2011.

⁴²² Group interview with former miners, Luhwindja, January 2011.

⁴²³ Group interview with miners, Mukungwe, 01/06/2012.

"I think this gold is possessed by some kind of demon. Because I don't know what happens, but every time you have found gold, you tend to waste the money. You see, it is demons. Miners only think about three things: eating, drinking and sleeping with women"⁴²⁴.

"Some people make a lot of money here! Can you imagine a young man earning USD 50,000, 100,000 like that? You know in March of this year, a boy here had made more than USD 200,000. He was 27 years old. I went to see him to ask what happened, and just like that he gave me USD 5000. So you say to yourself: someone who can give me USD 5000 like that, just out of respect...? So he took everyone to go drinking. Come, today we go drinking in Bukavu! Go, everybody in his jeep! What do you want? Champagne? Bring us four bottles! [What happened to him?] He died of aids. This money made him crazy. They told him: calm down boy, take it easy. But you see, that is the impact of the mining site. If you have not studied, you do not have a vision"⁴²⁵.

The quotes hint at a number of factors that may, in the minds of the interviewees, explain this kind of behaviour: foolishness or sense of adventure that characterises youth, incapacity to manage the money and a firm belief that the manna will fall from the sky again tomorrow. But the spending pattern is also characterised as being 'bad' and immoral behaviour and may lead to self-destruction, as the last quote suggests. Besides, the money earned from gold is even believed to be dangerous or 'possessed by some kind of demon'. For Filip de Boeck (1998: 788), observing the same phenomenon in the diamond miners on the Zairian-Angolan border in the 1990s, this is an expression of a "deeply felt *angst* experienced by the subaltern in a social reality that escapes or crushes him and that no longer seems to make sense". All these elements hint at an *irrationality* that typifies this particular spending pattern.

Yet I found that this behaviour is not just illustrative of moral decay and foolish consumerism. Other reasons underpin it, such as the constant need for cash in an environment where all services are to be paid for and where food and basic goods are expensive, a general feeling of insecurity and the threat of state intervention and theft. In this sense the spending pattern may be very rational. The institutional environment does not encourage people to save or invest. There are for example no reliable banking systems in place in these mining sites, although recently a savings bank opened a branch in Kamituga. As a result, people hold a lot of cash in their houses, with ensuing risks:

"Recently they stole USD 16,000 at someone's house. But imagine, someone who keeps USD 16,000 under his mattress! Recently Copec opened an office in Kamituga. They actually are a bit reliable, but people do not have this experience yet"⁴²⁶.

In such a context money is indeed very important, but also dangerous and perishable⁴²⁷. Research on artisanal mining in other parts of Africa has demonstrated that people characterise money earned in mining as 'hot money' (Walsh, 2003) or 'bitter money' that cannot be invested in 'lasting goods or serious activities' (Werthmann, 2009: 20), whereas money from farming is judged to be more sustainable. In other regions a distinction is made

⁴²⁴ Interview with miner, Mukungwe, 25/10/2011.

⁴²⁵ Idem.

⁴²⁶ Interview with magistrate, Kamituga, 22/01/2011.

⁴²⁷ See also Smith, 2011: 30.

between money from gold panning (more stable; done by women) and from diamond mining (more risky, more suitable for immediate consumption; done by men) (Hilson, 2010a; Pijpers, 2010; Cartier and Bürge, 2011).

I also agree with De Boeck (1998: 779) that this spending pattern can be understood by referring to "the collective habitus as well as local notions of autonomous male identity and personhood". First of all, displaying your success by excessive consumption is part of the social reality of a mining camp. Upon arrival in a mining site, almost all miners can thus point you to the shafts that are in high production, as the team members will openly display their success after the working hours:

"It will immediately show, because someone who is earning money cannot hide it. He will not sit here talking to you [pointing at the interviewer] like that; he will take you to a restaurant, order a brochette and some beers. You know, it is difficult to hide the fact that you've got money. You are even going to change your food habits. Even if people see that you make a lot of phonecalls, they will know that you are producing. Also in the loutra they will quickly notice"⁴²⁸.

In Mukungwe for example the team of 'Bako Juger' ('they can judge'), a shaft in full production, would manifestly occupy some tables in the local bar with an abundance of bottles of beer - leaving the empty bottles so as to emphasise their copious consumption - in the evening⁴²⁹. Yet I emphasised earlier that miners are reluctant to openly speak about their production and earnings, and prefer operating in secret. Bryceson and Fisher (2014: 182) explained this apparent paradox by differentiating between collective and individual behaviour. In 'good times', members of mining teams drink together and socialise as a form of 'social bonding' and maintaining relationships. At an individual level though, miners are more likely not to exhibit their wealth and invest for example in houses in their native villages. Second, displaying your wealth is also about social prestige, a confirmation of your social and economic identity. Miners want to show that they are 'someone' in the society. Men need to prove that they are capable of earning money and providing for a family. In interviews, as was said before, they would often repeat that they are 'des responsables', husbands and fathers with a responsibility vis-à-vis their families. As Cuvelier (2011: 28) argued in his dissertation on artisanal miners in Katanga, the notion of 'paid work' (referred to as 'kazi' in Katanga) in general constitutes an important source of masculine identity and status. In the current Congolese context, however, with a generalised lack of formal employment, the notion of 'kazi' has been hollowed out and artisanal mining now constitutes "an attempt to retain a sense of individual achievement and masculine working pride" (idem: 29). Vlassenroot and Raeymaekers (2004b: 142) talked about young miners adopting a "new sense of identity, which is largely based on the external features of a 'new' and 'modern' capitalist lifestyle" during the 1998-2003 war. These miners increasingly copied the lifestyle of soldiers and militia members (idem). During my fieldwork in 2009 local observers pointed to another new phenomenon. The current 'heroes' for young miners from Kamituga are the 'bikers':

⁴²⁸ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

⁴²⁹ Fieldnotes, Mukungwe, 02/06/2012.

"These young boys buy a motorbike and they abandon school. And the young girls think that marrying a biker is the supreme good. That is how these bikers have become big stars around here. All young girls, instead of going to school, are hanging out where the bikers are. It has really become a status symbol. They do taxi rides, sometimes 12 or 15 clients per day, they may make USD 50 or 100. Schools here are empty, especially secondary schools. And we have a university, but you will find only old people there, people who finished secondary school in the eighties"⁴³⁰.

But the attractiveness of status and prestige is of course not new, as the following quote shows. This man talks about his motivation to join the Ninja movement in the 1980s⁴³¹:

"At the time I was still tempted by alcohol and women, all these pleasures. And the Ninjas were admired by the women, in the bars it was all about the Ninja and they got all the attention!"⁴³² Of course the attractiveness of this lifestyle also depends on an individual's character. When talking to a group of former miners in Luhwindja, some said they used to spend all their money on food and prostitutes only; others found that "a normal person would also invest in a house, a field, a cow, a goat"⁴³³.

Moreover interviews in 2008 and 2009 in Kamituga revealed a certain change in the spirits of young gold miners since the period of the war⁴³⁴, in the sense that they started to think more and more about productive investments. This brings us to the third spending pattern. One interviewee stressed: "There have been some changes, yes. In the old days, the youth was not thinking rationally, while now they have an ideal, they dream about investing"⁴³⁵. Another one said: "The mores have changed: when a miner has one gramme now, he spends half of it, and the other half he saves. So there are a lot of people in alcoholism and prostitution, but some invest as well"⁴³⁶. Apparently the story of K., a successful businessman and social figure in Kamituga, has inspired some young people there to accumulate and invest:

K. is an ex- Sominki worker who began illegal artisanal exploitation in the early 1990s and has prospered since. When Sominki left in 1996, he managed to gain access to the Kabo-Zimira vein, an underground fossilised river. This vein had previously been abandoned by MGL This company had done some prospecting and had found rich veins, but mining technology had not yet sufficiently evolved to deal with the risks in this shaft, so they had to abandon it in 1958. This was known to K. The mining project he set up here in 1997 quickly generated good yields, and K. was able to successfully invest part of his profits in Bukavu in real estate and automobile sales, and in improvements to his mining facilities. The mining project evolved into a small-scale enterprise called COMILU ('Coopérative Minière de Luna') and contracting about two hundred workers in 2009. He invested in a brick-making entity and bought a boat on Lake Tanganyika that does transports of up to 50 tonnes. In the local community K. had become a very rich and influential person and a role model for many miners and small-scale traders. Apart from being

⁴³⁰ Interview with former Sominki worker, Kamituga, 16/08/2009.

⁴³¹ See chapter five.

⁴³² Interview with former Ninja, Bukavu, 27/07/2009

⁴³³ Group interview with former miners, Luhwindja, 11/01/2011.

⁴³⁴ Interview with commission agent, Kamituga, 08/04/2008. See also Vlassenroot and Raeymaekers (2004b: 144-145).

⁴³⁵ Interview with miner, Kamituga, 03/04/2008; interview with miner, Kamituga, 07/04/2008.

⁴³⁶ Interview with miner, Kamituga, 03/04/2008.

the manager of COMILU, K. is also president of the miners' association CPACAM and pastor in the 'Ministère du combat spirituel,' a popular revivalist church. He is appreciated for his 'high moral standards', which he also enforces among his workers⁴³⁷.

Another important factor in this respect is Kamituga's improved access to Bukavu via the 'Route Nationale 2'⁴³⁸. The physical accessibility of Kamituga, in contrast to a place like Mukungwe, encouraged young entrepreneurs to do business and to invest locally. On the other hand, they also found ample opportunities and examples for accumulation and investment in Bukavu. If they do make some larger investments, most miners opt for a plot for construction and/or a house, preferably in the provincial capital Bukavu. Other options are to invest in marriage (bridesprice), in livestock and in agricultural fields. These investments in agriculture and livestock may be seen as one of the strategies to cope with the uncertainty of mining profits. Marriage is considered to be a big investment. This can be explained by the fact that the bride price to be paid to the girl's family has risen (it can go up to USD 3000 or 5 cows at a price of USD 600 per cow), as well as the expenses for the wedding festivities. Some miners have also managed to invest in other economic activities, like trade (in gold or in other goods) or transportation (trucks mostly).

In conclusion, different patterns can be observed in mining sites. Such sites certainly are "places of rapid accumulation and dispossession, as money is made and lost there very quickly" (Smith, 2011: 30), but miners also want to make more sustainable investments and cater for daily family needs. Or as James Smith (idem) put it: "Despite all of the above-cited social and temporal dangers surrounding mining, many Kivutiens would like to convert mineral value into something socially and personally sustainable over time". It seems that the appreciation of the profits from mining – and the consequent decisions on how to spend it depends on the institutional context and on the local perception of the activity. Where the mining activities are rather of a 'rush-type' miners tend to spend their money quicker on nondurable goods. In areas where mining activities are more deeply rooted and connected to other economic sectors there is more sustainable investment. Insecurity - whether it manifests itself as institutional insecurity or outright violence – also impacts on expenditure patterns. In contexts characterised by a high level of insecurity it is more rational to spend the money in the short run than to make long-term investments. But this does not prevent the miners, despite their legally insecure position, to considerably invest in their shafts. They do it first of all because of a necessity: if they do not invest, there will be no yield. Second, they use different access mechanisms in order to increase their tenure security. And third, the investment risk is divided over different categories of people, which in itself produces ambiguous power relations.

8.3. RIGHTS-BASED AND RELATIONAL ACCESS MECHANISMS

This section discusses how artisanal miners gain access to the places where they work – not only in terms of physical access, but rather in terms of laying, securing and legitimising claims – and thereby analyses their strategies and constraints in terms of rights-based access

⁴³⁷ Interview with former Sominki employee, Bukavu, 31/07/2009; interview with trader, Bukavu, 24/07/2009; interview with shaft manager, Kamituga, 21/08/2009.

⁴³⁸ See chapter five.

mechanisms. I have said that the Mining Code provides for 'artisanal exploitation zones' in which miners can legally carry out their activities⁴³⁹. As for many other provisions though, the problem is that these zones are not (yet) operational. Taking the example of South Kivu, seven zones – all for cassiterite and coltan mining – have been identified and registered at the level of the Provincial Mining Division and the Mining Registry, covering a surface area of about 219 km², some being difficult to access and having no proven geological reserves⁴⁴⁰. As a consequence, there are no artisanal gold miners in South Kivu who are working in artisanal exploitation zones. Instead, most of them are mining in areas that have been given in concession to industrial companies, because these are known to host the richest deposits. Some underground galleries were abandoned by Sominki when it closed down in 1996⁴⁴¹; other deposits had been abandoned by the company much earlier. It is this knowledge about abandoned shafts that guides the miners in their choice of a place to start working⁴⁴². It is also the qualification of these shafts as being 'abandoned' that gives miners a legitimacy to enter them, as I will illustrate later.

While legally these mines are part of an industrial concession, locally they are governed by different norms, set and negotiated by a mix of customary, state, military and professional authorities. As the following paragraphs demonstrate, these norms have been shaped through a process of 'bricolage' (Cleaver, 2012). They are partly based on existing customary norms, but have been adapted and twisted when confronted with professional and other norms.

To give an example, the process of acquiring and securing a plot of land where you can start to mine, is somewhat different in Kamituga and in Luhwindja. Chapters five and six have highlighted the main differences between both contexts. In the Kamituga region, access to land was relatively easy and open, while around Luhwindja the land tenure system was much more hierarchically organised⁴⁴³. These systems were mirrored in artisanal mining. If one wants to start a mining project in Kamituga, it suffices to have the necessary financial capital, recruit workers, provide them with tools and equipment, and start to dig. It is "the right of the first occupant"444 that was also described in the early Californian gold rush: "the first miner on the site acquired the usufruct through discovery, notice, and continuous use" (McDowell, 2002: 3). But once a miner has started extraction in Kamituga, he does need to inform the customary chief, to 'announce' himself so that the chief knows where he is working. Miners also pay customary taxes and contributions. Part of it is a 'fixed' (but negotiable) contribution, which may turn around 1 g of gold per month⁴⁴⁵. Part of it is a percentage on the production, often amounting to 10 percent of total production, referred to as 'ntulo ya mwami', the quantity reserved for the mwami⁴⁴⁶. But in their discourses miners lay a lot of emphasis on the fact that the mines were 'abandoned' and on the physical force and material resources needed to open up a shaft. The local population indeed considered the land to be 'vacant' after the

⁴³⁹ See section 2.1.2.

⁴⁴⁰ See section 2.3.

⁴⁴¹ See chapters five and six.

⁴⁴² Group interview with miners, Lugushwa, 26/01/2011.

⁴⁴³ See Vlassenroot and Huggins (2005: 124) who don't mention these exact places, but discuss different land tenure systems in the Kivu region.

⁴⁴⁴ Interview with shaft manager from Lugushwa, Kamituga, 20/01/2011.

⁴⁴⁵ Interview with shaft manager, Lugushwa, 26/01/2011.

⁴⁴⁶ Idem; interview with shaft manager from Lugushwa, Kamituga, 20/01/2011; group interview with shaft manager and miners, Lugushwa, 25/01/2011.

retreat of Sominki⁴⁴⁷. During the second war, many displaced people from the hinterland settled in Kamituga, hoping to earn some money in the mines and to be spared from violence. As was explained in chapter five RCD established access control in Mobale mine and offered some security in the town centre, but was not able to control the entire exploitation and trade system, for which the networks were already well established. So the war did not really alter local realities, but accelerated, intensified and increased the scale of artisanal mining and trade activities⁴⁴⁸. Moreover, the retreat of the company created a space in which access could be (re)negotiated and (re)claimed, both at the macro (as has been demonstrated in chapter six) and at the micro-level, as will be demonstrated in this section. The 'right of the first occupant' still forms the basis for gaining access to a mining shaft, but this person also has the obligation to continue working in the shaft. Actually the norm prescribes that if a mining team abandons its shaft nobody else can take over the place without the shaft manager's permission during a period of six months. If after these six months the shaft manager has not yet notified the competent authorities (or the association or trade union), someone else can start to work in the abandoned shaft. But if the shaft manager has notified that he needs some more time, for example in order to gather the necessary financial capital, he retains the right to work in this place⁴⁴⁹. A similar norm was already in place during the California gold rush, where 'claim jumping' was permitted under certain conditions⁴⁵⁰. As one miner quoted by McDowell (2002: 15) testified: "a tool left in the hole in which a miner is working is a sign that it is not abandoned yet, and that nobody has a right to intrude there"⁴⁵¹.

In Luhwindja MGL already abandoned its industrial mines in the 1970s⁴⁵². Although these sites officially remained part of the vast concession, in practice the company exercised no strict control and thousands of artisanal miners have been carrying out their activities since that time. This also allowed the local chief, the mwami of Luhwindja, to firmly establish his control over the entire system of artisanal mining. This was at least accepted, if not encouraged, by the mining company, which had an interest in maintaining good relations with the customary power. For the mwami, it was an opportunity to extend his access control over land rights to the underground and to substantially benefit from its yields. In Luhwindja, miners nowadays tend to emphasise the fact that the land 'belonged' to the chief, and that the latter 'distributed' the mines. Indeed, the 'kalinzi' created a hierarchical network and tight reciprocities between the chiefs and their subjects⁴⁵³. The following quotes illustrate how individual miners in Luhwindja gained access to their shafts in the 1980s and 1990s:

"I went to the chief and asked to give me the mine, since he was distributing all the land"⁴⁵⁴.

"I was a veterinary, working in the public administration. So you know, the difficulties we have with the government, no salaries, or very little salaries [...] The beloved mwami has given me a shaft in Mbwega in $1990^{n^{455}}$.

⁴⁴⁷ Interview with miner, Lugushwa, 26/01/2011.

⁴⁴⁸ See chapter five and Vlassenroot and Raeymaekers (2004a and b).

⁴⁴⁹ Interview with former miner, Bukavu, 27/07/2009.

⁴⁵⁰ See section 1.4.

⁴⁵¹ Yet McDowell (2002: 15) notes that it is not clear how long these tools would hold a claim.

⁴⁵² See chapter six.

⁴⁵³ See chapter six.

⁴⁵⁴ Interview with leader artisanal miners, Luhwindja, 08/01/2011. See also interview with former miner, Luhwindja, 01/2011: "I went to see the mwami and he gave me a shaft".

The quotes highlight the importance of customary chiefs for gaining access, as well as the inability of the state to provide for its citizens. Part of the Twangiza concession has now been taken over by Banro. But Banro is just working in a 'core area', and left vast parts of the concession untouched. Here, artisanal miners are still working under the same system⁴⁵⁶. In exchange for access, these miners pay regular contributions (a monthly tax called 'citore', equal to one gram of gold) to the chief's representatives, the 'baganda'. When the mines start to produce good quantities of gold, the chief levies additional taxes on production, which reportedly amount to 10 percent (sometimes expressed in quantities of gold, sometimes in centimetres of excavated rocks)⁴⁵⁷. The 'baganda' thus normally have a good overview of all shafts and the production stages they are in⁴⁵⁸.

In Mukungwe, the system of rights-based access is also very closely tied to history. Chapter seven showed that control over the mining site has for a long time been contested, mainly between the customary land owner and the customary chief ('chef de groupement'). These parties have exercised their control over the mine in a very strict and coercive way, and, as I have demonstrated, thereby also rely on armed groups. Miners who want to open up a shaft here need to ask permission from the power holder in place⁴⁵⁹:

"Normally a person who has the financial means and the human resources, can start to dig. But in Mukungwe you need to ask the one who is in power for an authorisation, and that depends. Me for example, I got my shaft when Kurhengamuzimu was in control. So when Chunu drove Kurhengamuzimu off, he also expropriated all the shafts. I had to renegotiate with him [and pay him] in order to be able to continue working"⁴⁶⁰.

This system of control over artisanal mining by the chiefs, and subsequent taxation, is used by the miners as well as an access maintenance mechanism. Although it is not in line with the Mining Code, as has been said, the system gives the miners tenure security because of the legitimacy of a customary title, which is still very prominent in land tenure⁴⁶¹. But the system is not fully 'customary' or 'traditional' either. As I argued before, the interpretation of the concept of customary land tenure itself, the 'kalinzi' in the Bushi area, has evolved over the years from a traditional patron-client contract into a more commercial contract. The mwami thereby shifted his/her position in order to personally profit from new economic opportunities, as chapter six demonstrated. This had an impact on the perceived legitimacy of the mwamikazi in Luhwindja, and thus undermined her authority. Legitimacy is important in all artisanal mines, and as I said in chapter three, it is constantly being negotiated, granted and taken away. The gold miners, knowing they are technically 'illegally' (according to the Mining Code) working in an industrial concession, therefore look for other sources of legitimacy. For

⁴⁵⁵ Interview with former shaft manager, Luhwindja, 09/01/2011.

⁴⁵⁶ See chapter twelve.

⁴⁵⁷ Interview with former shaft manager, Luhwindja, 08/01/2011; interview with former miner, Luhwindja, 01/2011; interview with former miner, Luhwindja, 08/01/2011.

⁴⁵⁸ Interview with 'chef de groupement', Luhwindja, 01/2011; interview with 'chef de groupement' of another 'groupement', Luhwindja, 01/2011.

⁴⁵⁹ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012; interview with trader, Mukungwe, 01/06/2012

⁴⁶⁰ Interview with cooperative leader, Bukavu, 14/05/2012.

⁴⁶¹ Interview with former leader artisanal miners, Burhinyi, 26/10/2011.

example, they justify their work by referring to their 'traditional right' to mine the ancestors' land. As one interviewee told me in Kamituga: "We only take what is ours; it's the land of the Congolese"⁴⁶². Another miner said: "We were born here, our parents worked in the company. As their children, we have the right to work in these mines"⁴⁶³. Some also claimed that the 'Belgians', when closing down their activities, announced that from now on, the 'children of the Sominki workers' could freely dispose of the remaining gold reserves⁴⁶⁴. Another argument to legitimise their claims is to be found in the relative absence of the state performing its core functions. This is tangible in a statement made by a former MGL employee:

"Mobutu chased away MGL and instructed all of us to use our own force, he chased the white people. [. . .] And when they had left, we stayed here. When the president told us to fend for ourselves, we started this work of digging gold"⁴⁶⁵.

He thus explicitly referred to Mobutu's liberalisation policy⁴⁶⁶ and implied that the state had left the land to the local population to mine on. This encouraged the latter to 'fend for themselves'⁴⁶⁷.

The Mining Code foresees a number of administrative⁴⁶⁸ and technical services⁴⁶⁹ aimed at supporting miners, such as Saesscam. Saesscam should be partly financed by taxes and contributions: on the one hand a share in the 'remunerative taxes' to be paid at export level (1 percent of export value), on the other hand a contribution for the delivered services, to be paid by miners and traders in the 'centre de négoce'. In reality, the service does not have the appropriate financial, material and human resources to take up its responsibilities⁴⁷⁰. Saesscam's local branches, installed in various mining sites (many of them also inside industrial concessions, which is forbidden by the Mining Code), are making some attempts to register mining pits and miners, but they do not have the capacity to act upon all their responsibilities. Yet they are levying monthly taxes on artisanal miners and on traders. In the eyes of miners and traders, Saesscam is therefore often seen as a 'harassing' body ('tracasseries'), not as a service provider, as the following quote demonstrates:

"If they could send specialists, engineers for example, who could give us some expert advice before asking us money, things would work properly. But Saesscam, I realised that they betrayed us. They told us they would bring specialists, machines and funding. But they have done nothing. The only thing they have done so far is asking for money"⁴⁷¹.

⁴⁶² Interview with miner, Kamituga, 04/04/2008; interview with miner, Kamituga, 11/04/2008.

⁴⁶³ Interview with miner, Kamituga, 14/04/2008; interview with shaft manager, Kamituga, 09/04/2008.

⁴⁶⁴ Interview miner, Kamituga, 11/04/2008; interview with miner, Kamituga, 03/04/2008; interview with miner, Kamituga, 07/04/2008.

⁴⁶⁵ Interview with former MGL employee, Luhwindja, 08/01/2011.

⁴⁶⁶ See section 2.1.1.

⁴⁶⁷ See section 8.2.1.

⁴⁶⁸ See section 2.1.2: National Minister of Mines, Provincial Mining Division, Mining Registry, Geology Directorate, Directorate of Mines, Department in charge of the Protection of the Mining Environment (Pact, 2010: 36).

⁴⁶⁹ Saesscam, CTCPM, CEEC (Mining Regulations, T.1, Ch. 1., Art. 2).

⁴⁷⁰ See Pact (2010: 37); Carisch (2012: 24); interview with cooperative leader, Bukavu 26/05/2012; observations in the field.

⁴⁷¹ Interview with loutrier, Kamituga, 21/08/2009. See also interview with trader, Kamituga, 11/08/2009, who said that "this country is ill. They ask for taxes all the time, but do not give you anything".

But Saesscam is not the only state actor imposing payments outside of the official law. At the local level a whole range of interveners try to benefit something from artisanal exploitation and trade⁴⁷², relying on their 'legal command' as state representatives. The concept of 'legal command' has been introduced by Pierre Englebert (2009) to refer to the state agents' capacity to make and enforce norms, despite the obvious weakness or even failure of the state's institutions. The institutions and officials making up the state thus retain *some* authority, which is "mainly derived from the fact that the state is law" (idem: 62), not from the fact that this authority has been legitimised or justified by the provision of health and education services, the maintenance of infrastructure or the implementation of development policies. As Englebert (idem) said: "The state can barely do anything *for* the people, it is still very much present and imposes its will *upon* people (idem: 42). This is particularly clear in the case of local taxation systems⁴⁷³. Yet as I will say later, the capacity of state agents to impose things upon people is also constrained and challenged.

"If you want to be a shaft manager you have to be prepared to pay all of them. First we have the state agencies. The local branch of the Provincial Mining Division asks 1 renge kanta⁴⁷⁴ or about USD 75. After that Saesscam demands another renge kanta. Then the Mining Police, they ask their renge kanta. They give you official documents and you can start working. When you have got some production, the Mining Division comes by again, as well as Saesscam, the FARDC and the Mining Police, and the customary chief. Then you need to buy cards from the Mining Division, for USD 35 or USD 50"⁴⁷⁵.

The local representatives of the Provincial Mining Division indeed sell artisanal miners' permits ('carte d'exploitant artisanal'). According to the law these may only be issued to individual miners, within artisanal exploitation zones, but since these zones are not operational yet, this official norm cannot be followed. In practice the local agents ignore other official norms too. They generally do not declare these permits to the Provincial Mining Division, which is required according to the Mining Code⁴⁷⁶, but just note them down in their own registers. They also set differences prices, between USD 25 and 125, depending on the miner, his negotiation skills, and their own needs. This is indeed a matter of 'fending for themselves' since salaries are paid only irregularly, as was said before. This is also acknowledged by the miners:

"[So you negotiate over the taxes you pay?] Yes, we do. Our government says: arrange that with the 'chef de bureau'. So when they send someone over as 'chef de bureau', you'll see that it is a young man who recently left school. He has nothing but his certificate in his hand. So he wants to earn something in this office. It is easy to understand. He uses the power he has to survive. He imposes, and you pay what he asks you"⁴⁷⁷.

Pact (2010: 5) actually stated that 'illegal taxation' by numerous state and non-state agents places a heavy burden on miners and traders, but paradoxically also provides "a means of

⁴⁷² Discours par un représentant des creuseurs à l'occasion de l'atelier organisé par OGP par rapport à la suspension des activités minières artisanales à Bukavu, Bukavu, 11/02/2011.

⁴⁷³ See chapter two.

⁴⁷⁴ One renge is a local measure equalling 1,26 to 1,4 grammes. A kanta is half a renge.

⁴⁷⁵ Group interview with shaft manager and miners, Lugushwa, 25/01/2011.

⁴⁷⁶ Mining Regulations, T.9, Ch. 1, Art. 223-231.

⁴⁷⁷ Interview with loutrier, Kamituga, 21/08/2009.

wealth distribution at a community level and fills the gap in payment of many government services".

Another example of access control and maintenance was observed during the temporary ban on artisanal mining activities that was imposed by president Kabila from September 2010 until March 2011⁴⁷⁸. During this period gold production continued, albeit in much smaller volumes, in a clandestine way and at night, as opposed to openly, during daytime. For miners, this meant that carrying out their activities became dangerous, and it required them to 'cooperate' with FARDC soldiers, Mining Police, intelligence officers or magistrates who demanded a part of the production and/or a fixed contribution in exchange for protection⁴⁷⁹. This was not a new phenomenon, as the description of the Ninja movement and the role of the Mining Police in Kamituga demonstrated⁴⁸⁰. Also during the second war, a system called 'divisé par deux' (divided by two) was in place in Mobale mine in Kamituga⁴⁸¹. Here, shaft managers were forced to give half of their production to the RCD Colonel, in exchange for protection. One of the shaft managers who was active at the time, told me with some pride that he was "one of the best collaborators of the Colonel". He continued:

"I started working in that shaft in 2000, when I was only sixteen years old. But I was collecting a lot of gold! In a loutra⁴⁸² I easily found 4 to 5 renge. But the Colonel was very demanding. I had to give 50 percent to him"⁴⁸³.

These examples show that state and non-state agents compete to control the rents provided by gold mining and trade. They use their position vis-à-vis the miners to gain and control access and to serve their personal economic interests. But they also seek to establish or reinforce their power position, and through sanctioning the miners' claims, granting or denying the latter's access, and participating in dispute settlement, constitute their authority. This is what von Benda-Beckmann (1981) refer to as 'shopping forums'. The actors, in their individual capacities, may be part of the 'state system', but they do not always act in accordance with that system. Take the case of a local representative of the Mining Division who sells a 'carte d'exploitation artisanale' to a miner for USD 50, in spite of all the aforementioned legal provisions. While his position in the public administration gives him the necessary power and access to material resources such as official documents and stamps to do so, he does not act in compliance with the law, and officially cannot take that action. His legitimacy, in the eyes of the miners, is merely based on his legal command - or what remains of it: the 'official' appearance of the document he issues, the fact that he registers the artisanal miner in a book, the fact that he sits in an office, and above all the fact that the issuing of this card will prevent him from issuing further demands on the same miner. So for the miners it is equally a strategy of preventing future demands. At the same time miners know that this access maintenance strategy is not sufficient, and so they combine it with other access mechanisms. In this sense, the quote of von Benda-Beckmann and von Benda-Beckmann (2006: 11) that was already used in chapter three seems to be quite appropriate:

⁴⁷⁸ See chapter eleven.

⁴⁷⁹ Interview with miner, Kamituga, 20/01/2011.

⁴⁸⁰ See chapter five.

⁴⁸¹ See chapter five.

⁴⁸² Metal mortar that is used as a recipient and measure for extracted gold ore.

⁴⁸³ Interview with shaft manager, Kamituga, 22/01/2011.

the emerging picture "is that of a state which manifests itself – and is treated by the local population - as a fractured, potentially powerful, but also manipulable set of players, sometimes considered useful, rarely considered reliable and always to be treated with suspicion".

But it must be noted that the access mechanisms which are used by these authorities and power holders are also regulated and constrained to a certain extent. A Saesscam agent will for example pass by the gold buying offices in Kamituga once a month, thereby already exceeding the boundaries of his official mandate. But he will not increase the frequency of his visits or the amounts he demands, because he knows that would not be accepted. The customary chiefs for example collect monthly contributions and levy taxes on production, but these are all part of a well-defined system that is based on the land tenure system, and which is known and acknowledged by the actors involved. This taxation system is not static either, but allows for dynamic interpretation and negotiation. The mwamis also 'shift' in response to changing circumstances, as the Luhwindja case clearly demonstrates.

So it is definitely not true that miners have no agency at all. Miners 'use' the aforementioned actors and services in order to gain and maintain their access. If they pay taxes and contributions, they know their claims may be registered or written down, which increases their feeling of tenure security – probably more than the Mining Code and its current application can do⁴⁸⁴. One miner in Lugushwa said: "We are not spared from the occasional harassment by soldiers, but when you give them something it is ok. In any case you can be sure that the shaft remains yours"⁴⁸⁵. So from their side, it is a strategy to use these payments as an access mechanism, although this strategy may not always be applied so consciously. Besides, they negotiate over the amounts all the time, and are thus trying to manoeuvre themselves into a more favourable position vis-à-vis these authorities. This is a clear example of a relational access mechanism. When I was staying in a house in Kamituga that was the property of the mwami of Wamuzimu, miners sometimes came by to discuss contribution issues with the mwami's representatives⁴⁸⁶. The representative of the mwami of Ngweshe in Nyamurhale, a small mine near Mukungwe, told me that the amount you pay "is not fixed. We can negotiate. Just give me a bottle [of beer] and I'll see what I can do"⁴⁸⁷.

The endless negotiations and attempts by miners to achieve the most favourable outcome in these unfavourable circumstances may be captured under the mechanism of 'forum shopping'⁴⁸⁸. Yet this concept can be criticised on two grounds⁴⁸⁹: the 'strategies' applied may not always be as conscious as the concept suggests, and the 'shopping options' available are not boundless, as they are also determined by an individual's social and power position. As was said before, Cleaver (2001: 29) introduced a view in-between, seeing people as "conscious

⁴⁸⁴ This relates to what what discussed in section 1.4 as 'perceived tenure security' (Gilbert, 2002). See also Fisher and Mwaipopo (2014: 84) who quoted a miner in Tanzania saying that "people did not see the need to get a licence because what they want most was their daily income and therefore they were content with whatever process assured them of this"

⁴⁸⁵ Interview with shaft manager, Lugushwa, 26/01/2011.

⁴⁸⁶ Fieldnotes Kamituga, 04/2008.

⁴⁸⁷ Interview with customary representative, Nyamurhale, 02/06/2012.

⁴⁸⁸ See chapter three.

⁴⁸⁹ See chapter three.

and unconscious social agents": they are not purely rational economic actors, but they do have some agency. So within the constraints imposed upon them, they use their opportunities. When they are engaged in institutional bricolage, they "gather and apply analogies and styles of thought already part of existing institutions" (Cleaver, 2002: 15). Indeed, as other examples in this dissertation show, the norms in the gold sector do not emerge out of nowhere, but are taken, adapted and reframed on the basis of already existing practices and norms.

Another mechanism to increase tenure security for miners is to invest in mining shafts, which will become clear later in this chapter. Artisanal miners make substantial investments, which are considered, among miners and traders, as valid access claims. However, problems arise when these locally legitimate claims come into collision with other claims, such as the industrial concession titles which are backed by state law. The Banro case demonstrates that artisanal miners have no legal recourse, and cannot demand a compensation for the investments they have done⁴⁹⁰.

8.4. STRUCTURAL AND RELATIONAL ACCESS MECHANISMS

In this section I analyse structural access mechanisms in artisanal gold mining, including access to financial capital, information, labour and technology. Sometimes these are intrinsically linked with relational access mechanisms, as having good relationships with financiers for example will determine your access to credit, or to labour opportunities. I will describe the different steps in the extraction and processing of gold ore from underground shafts, looking at the actors involved and the professional norms governing the mining project. An underground mining project is initiated by a so-called PDG ('Président Directeur Général'). The term itself (meaning 'CEO') is a nice illustration of how the artisanal miners mock the industrial companies. In this study, I call them PDGs or shaft managers. The PDG cannot be considered as the 'owner' of the shaft, nor is he the land owner, but he has his place in a complex set of access relations. He acts as the initiator, investor and manager of the team of artisanal miners. I indeed write about 'he', since in most cases the PDG is a man. Yet there are some exceptional cases of female shaft managers. In Kamituga for example, I met a woman who has been in charge of two shafts since 1997. Her husband insisted that she "did ask the customary chief for permission, and was authorised to do the work despite the traditional taboos"⁴⁹¹. The woman herself emphasised that it was her explicit choice to get involved in the mining sector, since it is the only viable activity in Kamituga and she wanted to help take care of the family. She even created a small association of female miners in Mwenga territory⁴⁹². But whereas women are indeed omnipresent in the mining sites to carry out a variety of tasks, as I will say later, they cannot normally enter the mining shafts. The reasons that are given for this interdiction are multiple. Some refer to a customary law that prohibits women's access. Others refer to a popular belief which says that the presence of women, especially when they are having their period, causes the gold to disappear. Still others advance more pragmatic reasons, stating that

⁴⁹⁰ See part four. Bromley (2008: 24) argued that instead of what is commonly assumed (see section 1.4), namely that tenure security promotes investment, the reverse may rather be true: investment is necessary to obtain security. I think that indeed, investment increases security of a particular kind, the one that is locally recognised and considered to be legitimate by the miners and traders themselves. But investments have not protected the shaft managers against dispossession.

⁴⁹¹ Interview with cooperative leader and his wife, Kamituga, 01/2011.

⁴⁹² Idem.

the work underground is too harsh, hygienic conditions are abominable and women are not limber enough to go down and crawl through the often very tight tunnels and shafts, or carry the heavy loads to the surface⁴⁹³. A PDG's ability to benefit is determined by a number of factors: his professional experience, his access to information, to technology, to a labour force (workers) and to financial capital. The latter is particularly important for his role as an investor; the former four are crucial for his role as an initiator and manager of a mining project.

Almost all PDGs have many years of experience in artisanal gold (or some also in cassiterite and/or coltan) mining. Many have started off as miners, were able to accumulate some starting capital and invest in opening up new shafts. Table 16 gives an indication of shaft managers' experience in number of years, in the sector as well as in the site where they were working at the time of the survey:

| | Sector in general | | Actual site | |
|------------------------|-------------------|-------|-------------|-------|
| Time | Freq. | Perc. | Freq. | Perc. |
| <3 months | 13 | 5.1 | 28 | 10.9 |
| 3 months to 1 year | 5 | 2.0 | 48 | 18.6 |
| 1 to 5 years | 22 | 8.6 | 41 | 15.9 |
| >5 years | 216 | 84.4 | 137 | 53.1 |
| Don't know | | | 4 | 1.6 |
| Total | 256 | 100 | 258 | 100 |
| Source: Survey results | | | | |

Table 16. Time spent in the sector and in the current mining site

From the table it appears that 84 percent of the survey respondents have spent more than five years in the sector, while 53 percent spent more than five years in the same site. This demonstrates the shaft managers' commitment to the activity and to the place where they are working, always counting on a good production in the future. The differences between the surveyed sites do not seem to be relevant either. These observations may be remarkable, given the general findings about miners' high mobility (Jønsson and Bryceson, 2009; Bryceson and Jønsson, 2010). Yet they may be explained by the particular characteristics of the group of shaft managers in South Kivu⁴⁹⁴, who invest a lot of time, energy and money in a project, and of course the nature of the deposits, which requires such an investment. Therefore these shaft managers seem less likely to abandon – or abandon less quickly – or migrate to another site⁴⁹⁵.

The experience these people have in the sector may have been acquired through different activities, such as mining and trading. Interviews revealed that many shaft managers are former Sominki workers, or their parents were. These former company workers cannot only be found in the mines of Kamituga and Lugushwa, they may also have migrated to Mukungwe for

⁴⁹³ Interview with local leader, Mukungwe, 02/2012.

⁴⁹⁴ However, Bryceson and Jønsson (2010) found that the permit owners and pit holders were more mobile than the diggers, and that the average time spent in a site declined with the number of years of experience. They explain this by referring to accumulated experience and level of education. They surveyed 108 respondents, of which 84 were diggers and 24 were PML owners or pit holders. A factor that may explain the difference, is the degree of investment that is needed in the project, but this would require further comparative research.

⁴⁹⁵ Unfortunately I have not been able to conduct a larger survey among different categories of mining. This is a suggestion for further research.

example, and it is indeed their experience which gives them an advantage there over the local population. Access to information is very important in this respect, especially knowledge about where to find the richest gold veins and some technical knowledge about how to proceed underground. Shaft managers who are (children of) former Sominki workers or have just grown up in this environment know the mining sites very well and they do not start an underground mining project 'blindly'. They know which shafts have been abandoned by MGL or Sominki and which veins are still worth exploiting. Moreover, they have some basic technical and geological knowledge to direct their tunnels towards the gold veins and they prove to be very inventive in applying known industrial techniques to their artisanal undertakings. The story of J., a PDG in Kamituga, may serve to illustrate this:

J. is 45 years old and has six children. He was born in Kamituga and worked for Sominki in the eighties. Having lacked the opportunity to study at that time, he has recently decided to begin his university studies at one of the four divisions of universities in Kamituga. In order to pay for his studies, he works as a miner. In 2008, we met him in Mero. He constituted a team together with some fellow students. Unfortunately, they had to abandon the shaft a few months after our visit due to the rising groundwater. In January 2009 J. invested in a new shaft in Misagi, another mining area in Kamituga. As an ex-Sominki worker, he knew that this area contained a particularly rich vein. He says that they based themselves on old geological maps which, although not up-to-date, give a pretty good indication of where to direct the tunnel. 'While proceeding,' he explained, 'we also communicate with each other, and hammer-blows indicate when another team is coming too close.' At the time of my visit in August 2009, they had already dug a 60-meter long tunnel with a team of five miners. But their work had to be temporarily stopped since J. lacked the money to buy fresh batteries for the torches. In spite of all other opportunities, this may be one of the banal constraints miners are facing.

For his role as investor, the PDG usually does not (only) count on his own financial means (although he does need some financial resources to start with). He relies on a financier, who in many cases is a local trader. This person may be called 'supporter' ('supporteur' or 'PDG supporteur'⁴⁹⁶). The relationship between these two is indicative of the importance of access to relations, which facilitates access to financial capital or credit. Indeed, in the institutional context of the mining sites, sources of credit through banks or microcredit institutions are not available to the miners. Yet since they need to invest considerably before being able to 'harvest' the gold, they have to rely on other financiers. Arrangements with local traders then provide a source of financial support. They also create a particular relationship of mutual dependency, as will be further explained in chapter nine. These agreements between individual miners or PDGs and 'supporteurs' are made on a daily basis. And they may already start in the very first stage of the mining project, the exploration phase.

Although artisanal miners cannot rely on sophisticated exploration and sampling techniques, their exploration is guided by some specific techniques and information. First of all, they are oriented by information received from other miners. Discoveries of rich gold veins inevitably attract other miners, a dynamic that is often referred to as 'the gold rush'. But more often in this region, miners try to find veins that have been explored or exploited before by Sominki or

⁴⁹⁶ Group interview with miners, Mukungwe, 01/06/2012.

MGL⁴⁹⁷. In places like Kamituga they may receive the information from their parents. Many shaft managers in Kamituga and Lugushwa had fathers or family members who had worked for Sominki. The latter were able to tell their children where Sominki had left rich deposits unexhausted⁴⁹⁸. Interviewees also told me that white geologists left 'traces' in the form of flowers or small trees, which they planted at places where they had found promising deposits in order to find them again afterwards. "We know all the indigenous plants. If you see a specimen that does not belong at this place, then you may suspect that it is a mark and that there are minerals to be found"499, one miner said. Indeed, while currently explorers leave posts and other marks, in earlier times they left plants and small trees as indicators⁵⁰⁰. Similarly, when the soil is already damaged, or when one arrives at a place with remarkable erosion, one may suppose that exploration has been carried out here⁵⁰¹. Other signs may be the abundance of vegetation, as some minerals constitute a fertile underground for plants to grow on⁵⁰², or the composition of the soil. If the soil takes a particular colour and composition, something that artisanal miners refer to as 'sable fine' (fine sand), they know there is a good chance to find gold⁵⁰³. Next, very thin veins, which miners call 'filoniens' (diminutive of 'filon' or vein), often lead them in a particular direction to the thicker and richer veins⁵⁰⁴. The more experienced miners can try to predict the course and direction of these veins. Finally, the roots of some waterplants, e.g. a kind of bamboo, have the capacity to hold gold particles in rivers⁵⁰⁵ and therefore constitute useful indications.

This illustrates that miners do have access to information, mainly based on their previous experiences, and some basic geological knowledge that is shared within this professional group. Yet their access to appropriate technology is quite limited. This is considered to be a big problem. Companies that do possess technology for exploration are usually not interested in investing it for artisanal and small-scale mining. In South Kivu there seems to be only one private geological expertise centre that can assist artisanal miners with technology and geological studies. It was established by some young Congolese geologists who had finished their studies in Uganda and who believed that there was a market for rendering technical services to artisanal miners, especially to cooperatives, so as to make the sector evolve towards small-scale, semi-industrial mining⁵⁰⁶. The geologists use a georadar system that helps them looking at geophysical anomalies up to 25 meters underground. After that they take samples, for which they analyse the chemical composition using spectometers⁵⁰⁷. But artisanal miners do not really understand how these technical processes function. They frequently talk about what they call 'testeurs'⁵⁰⁸, equipment that is believed to detect deep veins and underground deposits with great accuracy. This apparatus is sometimes accorded an almost mythical status and is believed to yield quick results. But the spectometers they refer to when

⁴⁹⁷ Interview with miner, Uvira, 24/03/2010; group interview with miners, Lugushwa, 26/01/2011.

⁴⁹⁸ Interview with miner, Kamituga, 17/08/2009.

⁴⁹⁹ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

⁵⁰⁰ Interview with geologist, Bukavu, 08/10/2012.

⁵⁰¹ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

⁵⁰² Interview with geologist, Bukavu, 08/10/2012.

⁵⁰³ Interview with geologist, Bukavu, 27/05/2012.

⁵⁰⁴ Interview with miner, Mukungwe, 02/06/2012; interview with shaft manager, Nyamurhale, 02/06/2012.

⁵⁰⁵ Interview with geologist, Bukavu, 08/10/2012.

⁵⁰⁶ Idem.

⁵⁰⁷ Idem.

⁵⁰⁸ Interview with geologist, Bukavu, 27/05/2012; interview with miner, Uvira, 24/03/2010; interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

talking about 'testeurs' are actually used to analyse the composition of materials. They can hardly be used for the purpose of detecting underground veins, since they can detect high concentrates, but not relatively low concentrates in larger volumes⁵⁰⁹. According to geologists, other techniques based on gravimetry would give better results, but are still very expensive.

Once a work place has been chosen, shaft managers constitute a team of miners. The recruitment of workers may be partly based on existing friendship and (extended) family relations, but this is not a sufficient, nor a necessary condition. Some miners indeed say they have been introduced by a family member, but they do not necessarily continue to work for this person. Instead of family and ethnic ties, skills, experience and physical force are the necessary conditions to be engaged⁵¹⁰. However, the extent to which for example experience is required also depends on the kind of task the worker will need to do. As I will show later, there is a quite remarkable degree of specialisation in underground mining, with different categories of people carrying out different tasks. Social relations in the mines can thus be based on pre-existing ties, but only partially, and rather at the beginning of a miner's entry into the sector. In general, relations are gradually built up. If a miner has a good reputation, his shaft manager may recommend him to someone else if he cannot put a lot of people to work at that moment. So these relations provide a useful means for the shaft managers to gain access to labour and for the miners to gain access to labour opportunities.

In the beginning of an underground mining project there are few people involved, but depending on how the work proceeds, teams may grow up to 10, 20, 50 and even more than 100 miners, all of whom have specific tasks. The mining team first of all 'opens up' the shaft, and starts 'chasing' the gold vein. They do this by digging alternately tunnels (horizontally, what they call 'direction') and shafts (vertically, what they call 'descenderie')⁵¹¹, through which they proceed in the direction of where the gold vein is supposed to be. One 'direction' and a 'descenderie' can easily become 20 to 50 meters long⁵¹², and the total length of an underground project may reach up to 250 meters and more. The work of digging and proceeding in the tunnels and shafts is done by a category of workers called 'foreurs' ('forer' means to drill). Their work is physically very demanding and is typically done by men aged between 20 and 40. They usually have a certain degree of experience in underground mining and need to be physically fit⁵¹³. After them come the 'pelleteurs' ('pelleter' means to shovel), who are mainly younger and/or less experienced men. They clear the rocks or sand, fill bags (large bags that are also commonly used for food aid for example) and evacuate these to the entrance.

In some shafts the excavated tunnels and shafts are shored up with wooden trunks in order to prevent cave-ins. This 'boisage' (wooden construction) is especially needed where the soil has

⁵⁰⁹ Interview with geologist, Bukavu, 27/05/2012.

⁵¹⁰ See also Bryceson and Fisher (2014) and Bryceson and Jønsson's (2009: 5): "On arriving at a new site, miners need inter-personal skills to negotiate effective social networking, which is crucial for gold mining access and success. Claim owners tend to rely on relatives to manage their operations when they are absent from the claim. Outside of this property guardianship function, the importance of family and tribal ties does not seem salient in mining. Ethnic and tribal boundaries are intersected by new cultural, political, and tenurial relations within the mining settlements. Miners are increasingly judged for their qualifications and competence instead of place of origin and tribal affiliation". They argue that ASM is a sector with a relatively easy entry.

⁵¹¹ Interview with cooperative leader, Bukavu, 14/05/2012.

⁵¹² Idem.

⁵¹³ Interview with miner, Kamituga, 20/01/2011.

no hard rock, and so the risk of landslides and cave-ins is greater. But it requires an extensive investment in manpower and in wood, so the quality and durability of the 'boisage' depend from one shaft to the other. The wooden constructions are made by specialised workers, the 'boiseurs'⁵¹⁴ who are normally paid per task⁵¹⁵. They are not necessarily attached to one specific shaft, but can be very mobile and work in different projects. They are often experienced, middle-aged ex-Sominki workers, like B. whom I interviewed in Mukungwe:

"I was trained to be a boiseur at Sominki. When the company closed down, you know, we had to look for something else. That is how all former workers got dispersed over these artisanal mines. Sominki paid us well and regularly, they looked after our health, but what do you want? We needed to do something after. So now we are here, offering our services to the PDGs. Our work is very important because we are responsible for everyone's safety, and the young miners are curious to see how these old men do the construction. [...] To be a good boiseur, you have to know your job, and above all, you cannot be afraid"⁵¹⁶.

This practice of 'boisage' also has far-reaching environmental effects, since it requires a lot of wood. In Mukungwe for example, the trees are supplied from a plantation some 20 kilometers further, on the other side of the hill. They are very expensive. One tree-stump is sold for FC 4000 (almost USD 5) and has to be transported all the way to the mines⁵¹⁷. For this work transporters may be hired, who are also paid per task.

All underground activities are overseen by the 'conducteur'. Conducteurs are very experienced and they need to have a profound knowledge of where to direct the shafts and tunnels in order to reach the gold vein⁵¹⁸. They coordinate and guide all the teams working in the underground. Sometimes, when the project consists of multiple shafts and tunnels, there may be more than one conducteur, usually one per line ('taille'), but one of them is the 'conducteur général' and is responsible⁵¹⁹. The 'capitas' work closely with the conducteur but hierarchically stand one step lower. They supervise one team or one shift and are in charge of daily management⁵²⁰. If the gold veins are surrounded by veins of hard rocks, explosives may be needed in order to be able to proceed. This dangerous task is carried out by another category of specialised workers called the 'bouts de feu'⁵²¹.

The period of preparatory works, and consequently low production, is also called the 'suffering period' ('souffrance')⁵²². It may last for several months, in some cases even multiple years. During this entire period the shaft manager provides the necessary tools (e.g. shovels, chisels, pickaxes, torches, fuel and water pumps) and caters for the basic living requirements (e.g. food, clothes, family allowance) of all miners in the team, regardless of the yield⁵²³. This

⁵¹⁴ Idem.

⁵¹⁵ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

⁵¹⁶ Interview with 'boiseur', Mukungwe, 01/06/2012.

⁵¹⁷ Fieldnotes Mukungwe, 24/10/2011.

⁵¹⁸ Interview with miner, Mukungwe, 31/05/2012; interview with shaft manager, Lugushwa, 26/01/2011.

⁵¹⁹ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

⁵²⁰ Group interview with miners, Mukungwe, 01/06/2012; interview with shaft manager from Mukungwe, Bukavu, 09/06/2012; interview with shaft manager, Lugushwa, 26/01/2011; interview with 'capita', Mukungwe, 31/05/2012.
⁵²¹ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012; interview with 'bout de feu', Mukungwe,

^{01/06/2012.}

⁵²² Interview with shaft manager, Nyamurhale, 02/06/2012.

⁵²³ Interview with miner, Uvira, 24/03/2010; interview with cooperative leader, Bukavu, 14/05/2012.

obviously implies a big and risky investment; and it is here that the 'supporteurs' intervene. But still, the unpredictability of the mining project also creates a particular relationship between the shaft manager and the other miners in the team. The more unpredictable the yield and the more investments had to be made, for example, the greater may be the share of output demanded by the PDG. The longer the preparatory works take, the more discouraged the workers may become, and some may eventually leave to take a chance somewhere else. But a shaft manager who efficiently organises the work and yields good results is normally well respected by the team members. From his side, the costs he makes for handing out food, equipment, and maybe something extra for their family, are also strategic: "I give them some extra from time to time, so as to make sure that they will come again to work tomorrow," a shaft manager in Mukungwe said⁵²⁴.

Once the gold vein is reached, the 'foreurs' set to work in a 'room' at the bottom of the shaft, where they excavate the gold-containing rocks or sand. This place is locally called 'tambour' or drum, since it resounds with the hammer-blows of the 'foreurs'⁵²⁵. The excavated rocks and sand are loaded in bags weighing up to 25-30 kg each. They are carried outside by the 'pelleteurs'. In this phase a team counts tens of miners, even up to 100 and more. They work in different shifts (morning, afternoon and night), so that they can work around the clock, and there is always someone present to guard the shaft⁵²⁶.

The working conditions inside the shaft are difficult and access to technology to improve them is limited. The slopes are often steep and the tunnels narrow. Hygienic conditions are problematic since the underground workers use some parts as toilets⁵²⁷. A very common problem is lack of oxygen inside the shaft. This may be caused, for example, by breakdowns of the water pumps⁵²⁸. When the latter are not well maintained, they may cause carbon monoxide poisoning⁵²⁹: "You need to be careful with that, because when the pumps do not function well, and it hits you underground, you will die. There won't even be a trace of blood"⁵³⁰. Indeed, the most important cause of death in the mines seems to be asphyxia because of lack of ventilation⁵³¹. There is no system to detect the availability of oxygen, so miners say they just 'smell' whether "the air is good or not"⁵³². Cave-ins and landslides are also a big problem, and sometimes hit more than one individual at a time. In Mukungwe for example 23 people died in a cave-in in 2009: the entire part around the shaft collapsed and people who were living in small huts in the surroundings were also swept along⁵³³. According to the local branch of the Mining Division in Kamituga there are on average five to ten deaths per year and 15 to 20 wounded miners⁵³⁴. The COKA ('Coopérative de Kamituga) association in Kamituga, which operates as a kind of trade union, listed the accidents that took place in the course of 2006 (16 in total) and 2007 (10): two people died because they fell into a pit, nine

⁵²⁴ Interview with shaft manager, Mukungwe, 31/05/2012.

⁵²⁵ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012.

⁵²⁶ Interview with miner, Kamituga, 03/04/2008; interview with shaft manager, Kamituga, 09/04/2008; interview with miner, Kamituga, 03/04/2008.

⁵²⁷ Interview with cooperative leaer, Kamituga, 04/04/2008.

⁵²⁸ Interview with cooperative leader, Bukavu, 14/05/2012.

⁵²⁹ Interview with cooperative leader, Bukavu, 29/05/2012.

⁵³⁰ Interview with local leader, Mukungwe, 02/2012.

⁵³¹ Interview with miner, Kamituga, 03/04/2008.

⁵³² Interview with shaft manager, Nyamurhale, 02/06/2012.

⁵³³ Interview with cooperative leader, Bukavu, 14/05/2012.

⁵³⁴ Interview at local Mining Division, Kamituga, 10/04/2008.

died because of asphyxia, 13 died when a shaft collapsed, one drowned and another one's cause of death could not be specified⁵³⁵.

Once the bags filled with sand or rocks are evacuated to the surface, they need to be processed. This happens in a fenced-off place called 'loutra'⁵³⁶ where the rocks are crushed into fine powder. When the sand is really humid, it may need to be dried first, leaving it for many hours on firewood, as I witnessed in Mukungwe⁵³⁷. Depending on where the 'loutras' are located, transporters may be used and paid by the miners to carry the bags from the mine to the loutra⁵³⁸. In the 'loutra' we usually find a guard who is paid by the 'loutrier,' the owner of the parcel. He receives part of the production.

We also find the 'twangeurs'⁵³⁹ or 'crushers', who use metal mortars and wooden pounders with metal cover at the end to pound the rocks, similar to the squashing of cassava roots⁵⁴⁰. In Mukungwe and Twangiza this work is done by men, but in Kamituga it is almost exclusively done by women, locally called the 'mamans twangaises'. This phenomenon started to appear during the war, among women who had fled the countryside that was being insecured by different armed groups (Vlassenroot and Raeymaekers, 2004b: 138). Since they needed to make a living in Kamituga and women were not allowed in the shafts themselves, they started to be engaged in other types of work like transportation or crushing. Nowadays the 'mamans twangaises' are hired by individual miners to pulverise their production. The women are paid USD 1.40 to 2.00 to fill a basin (usually cut from a jerry can), containing 13 to 15 kg of stones. On average they can process one basin per day. They are employed on an ad-hoc basis by individual miners or by groups of miners and they have no contract. This makes them vulnerable. When the stones appear to contain little gold dust, miners are not likely to pay the 'mamans twangaises.' On the other hand, miners repeatedly denounce the 'mamans twangaises' for stealing valuable stones and selling them on their own account⁵⁴¹. Indeed, some women admit that they might hide stones in their underclothes⁵⁴², which could be considered as an access strategy (to trickery, or theft) on their behalf. In any case, this work is physically very demanding and many women suffer from pulmonary diseases and vertebral column deformation due to the harsh working conditions⁵⁴³. The women may also bring their children and babies to the working place, with devastating consequences for the children's health. In Mukungwe, the 'twangeurs' (men) are paid USD 10 for pounding a bag of 25 kg of sand. Two men can pound one bag per day, so they earn about USD 5 per day⁵⁴⁴.

⁵³⁷ Interview with shaft manager, Mukungwe, 31/05/2012.

⁵³⁵ Interview with cooperative leaer, Kamituga, 04/04/2008.

⁵³⁶ It is not clear where this term comes from. One hypothesis I have is that the word is derived from the Latin name for otter, lutra, because this animal is used to crushing the shells of shellfish with stones found in the river.

⁵³⁸ In Mobale mine in Kamituga, which is a bit far from the main 'loutras', the transporters are waiting at the entrance of the underground mine. They have their rules as to who can be hired and in what order, and they even have their own association, see Règlement d'ordre intérieur pour le groupe des transporteurs des pierres à Mobale, fieldnotes, 04/2008.

⁵³⁹ From the Swahili verb 'kutwanga', meaning to pound, to crush.

⁵⁴⁰ This iron bucket is also called 'loutra'. Another meaning of the word is the basin in which the production is washed. The word 'loutra' has thus three meanings. Interview with cooperative leader, Bukavu, 14/05/2012.

⁵⁴¹ Interview with miner, Kamituga, 08/2009 ; interview with miner, Kamituga, 11/04/2008.

⁵⁴² Interview with 'maman twangaise', Kamituga, 04/2008. ⁵⁴³ See also International Alert and LEAD (2009: 47).

⁵⁴⁴ Interview with shaft manager, Mukungwe, 31/05/2012.

If necessary, the sand or rocks, now crushed into a fine powder, can be sifted by the 'tamiseur'545. After that it is washed in a water-filled basin of about one by two meters long and 1.5 meters deep in which a metal plate ('karaï') is used to separate the 'waste' and the gold concentrate. The miners do this by slowly turning the plate around so that the heavier gold particles are separated. This process, which was also described in artisanal mining, is called 'pannage'. After two or three months, depending on the frequency of use, the water basin is emptied and the owner can re-process the sand left in there for additional profit. Part of this sand can also be sold by the 'loutrier' to others, usually younger men or women, to be further processed and re-processed. This happens in a second plot which may be located further away from the mining sites and closer to the centre of the town, like in the Tshanda and Mero neighbourhoods of Kamituga. These 'loutras' can be very spacious and host several areas, each accommodating a specific processing activity: water basins, water streams, parcels for pulverising the production and fireplaces for purifying the gold dust (with nitric acid). People come here to work their production because they need water supply, which is not publicly available everywhere. In these loutras mercury may be used in order to recover the gold dust by making amalgams⁵⁴⁶.

A specific category of actors⁵⁴⁷ intervening in the re-working of the sand in the second loutra are the 'biporistes'. They use the bark of a banana tree ('biporo'), into which pores the gold dust sticks, to wash the sand. This technique is used in alluvial mining as well, but here it is a next stage in the re-processing of sand that directly came out of the underground shafts. The biporistes are often organised in teams of four to six boys or men and might produce some 3 to 10 mishale per day for a value between USD 9 and 30⁵⁴⁸. Another category are women, called 'mamans bizalu', who buy a quantity of sand (waste) for USD 2 to 3, wash and work it, and if necessary crush it again, in order to find some gold dust in it. They can earn between USD 3 to 6 a day for 1 to 2 mishales. A final category (mainly women and children) hangs around in the 'loutra' and gathers the leftovers, the small quantities that are spilled while crushing, washing and transporting. They process the waste once more to extract any remaining gold dust. The women involved in this activity are commonly called 'maman tora.' Their daily profits vary between USD 1 and 3.

As I already said in these places the raw gold is also burnt with nitric acid, so as to remove all 'impurities' and give the gold concentrate a shining glow. A small pan is placed on the firewood, the gold is heated with the nitric acid, and small particles of iron, silver and copper are dissolved. This technique is also used in order to detect 'false' materials, which are sometimes offered to the traders⁵⁴⁹. The fumes escaping from these fires are noxious though, and may cause health problems. Some miners believe that drinking milk will protect them from the harmful effects⁵⁵⁰, which is of course not the case.

⁵⁴⁵ Idem.

⁵⁴⁶ See fieldwork by Edouard Kalakulo, student at the 'Institut Supérieur des Techniques Médicales' (I.S.T.M.), Bukavu.

⁵⁴⁷ These observations were made in Kamituga.

⁵⁴⁸ Data as from 2009 in Kamituga.

⁵⁴⁹ Interviews with trader, Bukavu, 24/07/2009; interview with female trader, Bukavu, 23/07/2009; interview with commission agent, Bukavu, 29/07/2009.

⁵⁵⁰ Interview with commission agent, Kamituga, 13/08/2009.

Finally, many people are working around the mining site and providing services to the miners. Even in very small mines traders have set up their food stalls, bars and phone kiosks. These petty traders are often women or children⁵⁵¹. Many women are involved in prostitution, a service that is high in demand in the mines: "When a miner comes out of the pit with some money, the first thing he does is buy a beer and get a prostitute"⁵⁵². Yet the reality of interactions between men and women in mining settlements is far more complex than just payment for sexual services. The story of N. In Mukungwe gives an idea about how women end up here⁵⁵³.

N. and her husband lived in a village not far from Mukungwe and cultivated a plot of rice. They were able to live from the yields and they could even set some money apart at a savings association. But her husband started to spend the money on 'useless stuff' and eventually left her for another, more attractive girl. N. was suffering for several years, until a friend recommended her to sell her pair of shoes in order to buy some salted fish, take this to Maroc and sell it there. While selling the fish in Maroc, she got to know other women, who told her about the possibilities to make money by prostituting herself. Eventually she acted upon their advice. When I talked to her she had been in the mining camp now for more than a year, and was already able to make enough money to buy a plot of land.

So like many other women, N. ended up in Mukungwe after having been repudiated by her husband. Still other women came in order to escape social control in their village or neighbourhood. Young girls from Bukavu even go to the mines to breathe the atmosphere of a mining camp and make a lot of money⁵⁵⁴. Once they have arrived in the mine, they rely on a social network of other women and of course they try to build personal relationships with miners. Bryceson et al (2013) described different 'wifestyles', or sexual relations that vary according to the emotional and economic ties between partners, as well as to the degree of sexual exclusivity, from monogamous-cum-business relations over polygamous to cohabitation and loose relationships. The role of women in and around the mines often remains underexposed, and unfortunately it also falls beyond the scope of this research. More research needs to be done to analyse women's positions and their access strategies, although it is already clear that they are faced with both opportunities and constraints⁵⁵⁵.

Finally, I have shown earlier that the profits in artisanal mining are unpredictable. Indeed, artisanal mining depends on a number of non-controllable factors, such as the exact location of the gold veins, the difficult working conditions, the risks at accidents, the volatility of the output and the fluctuation of prices at the world market. Although miners try to master these factors using the access mechanisms described here, some things still remain beyond their

⁵⁵¹ Group interview with former miners, Luhwindja, 01/2011.

⁵⁵² Interview with prostitute, Mukungwe, 01/06/2012.

⁵⁵³ Idem.

⁵⁵⁴ Fieldnotes, Mukungwe, 30/05/2012. See also Werthmann (2009: 20). In her study on female participation in ASM in Burkina Faso she argued that women often settle in mining camps in order to escape from social obligation and claims made by relatives. They also typically earn more by pounding ore or selling goods in the mines, than they would earn selling beancakes or sorghumbeer in their villages. Also, women ar less inclined than men to spend money on consumer goods like beer and cigarettes.

⁵⁵⁵ Studies on the role and position of women in ASM: Labonne (1996); Heemskerk (2003); Hinton et al (2004); Gier and Mercier (2006); Yakovleva (2007) on Ghana; Werthmann (2009) on Burkina Faso and Hayes; Perks (2012) on the DRC and Bryceson et al (2013) on Tanzania. A PhD student from Wageningen University is currently also studying the role of women in mining sites in South Kivu.

control. That is why they often talk about their profits in terms of luck ("Kazi yetu ni bahati" or "Our work depends on luck"⁵⁵⁶), God's will ("Everything depends on your chance, on the way in which God will bless you"⁵⁵⁷), magic ("This work is like magic")⁵⁵⁸, or lottery:

"In the mines we worked in the hope of finding something. And tomorrow again. It was not much, but it was regular. You were sure to find something at least. We had at least USD 30 per week. With USD 30 you can pay your basic needs. And then when we were fortunate, we even made up to USD 500 per week. It was a lottery"⁵⁵⁹.

"In this country someone who is extremely poor today can become very rich tomorrow. And the day after tomorrow he can be killed. And after that he will come back even richer than before. It's like in the USA"⁵⁶⁰.

So on the one hand, luck is seen as a purely random outcome. But on the other hand, there are references to magical, spiritual or religious factors⁵⁶¹. Luck can thus be enforced by prayers and by carrying out the right customary or other ritual practices. As was said earlier, women are believed to bring bad luck, although my own visit to a shaft was sometimes believed to predict a good output. Another story recalls that in the 1980s in Lugushwa, there was a shaft were one could find a layer of 20 cm pure gold in the hard rocks. The PDG of this shaft was an old woman, who had set a number of access rules. It you wanted to enter, you could not take a bath for one month, you needed to take off your shoes, go in naked and sleep with the old woman. The miners went in there massively and came out with plates filled with pure gold⁵⁶². So these ritual practices or 'fetishes' were used as access mechanisms. Actually both luck and professionalism are part of miners' lifeworlds⁵⁶³. The aspect of luck, unpredictability or hope, is above all embodied in the miners' daily dreams about big future profits. The aspect of professionalism (experience, access to information, labour, financial capital and technology) is exemplified in the planned and regulated nature of a mining project.

8.5. PROFESSIONAL NORMS IN GOLD MINING

My analysis has shown that in spite of what is often believed about artisanal mining, these activities are not chaotic or unregulated, on the contrary. I argue that a number of professional norms apply to underground mining projects in South Kivu. As was said in the introduction, similar norms exist in other countries because of the nature of the commodity and the extraction and processing, although specific contexts may also create particularities. A first example is that the norms for acquiring and maintaining a plot differ between Kamituga,

⁵⁵⁶ Interview with miner, Kamituga, 07/04/2008.

⁵⁵⁷ Group interview with miners, Lugushwa, 26/01/2011.

⁵⁵⁸ Interview with miner, Burhinyi, 18/01/2012.

⁵⁵⁹ Group interview with former miners, Luhwindja, 11/01/2011; interview with commission agent, Bukavu, 29/07/2009. Also in the Californian gold rush the "cliché that mining was a lottery" was frequently repeated (McDowell, 2002: 62).

⁵⁶⁰ Interview with magistrate, Kamituga, 22/01/2011.

⁵⁶¹ See Bryceson et al (2010: 361).

⁵⁶² Interview with former miner, Kamituga, 21/01.

⁵⁶³ Jønsson and Bryceson (2009: 274) argued in the same way. At the one hand they analysed miners' decisions and mobility as 'rational behaviour'. On the other hand, they said that "no matter how experienced a miner is, he sees luck as a vital ingredient in success". See also Bryceson and Fisher (2014).

Luhwindja and Mukungwe. The task of the 'twangaises' may serve as a second example. In Kamituga, these tasks are carried out by women, since they massively migrated in to the town during the war and did not find other occupations. In Mukungwe, the 'twangeurs' are men, since fewer women have settled in Maroc and the local division of labour prescribes that they are engaged in petty trade, transport, sexual services or open restaurants and bars.

The description of tasks performed by different categories of miners clearly indicates that there is a degree of specialisation. Criteria such as experience in the sector, physical ability, age and skills are all important in hiring labour. As Bryceson and Jønsson (2010) showed for Tanzania, mining apprenticeship and accumulated work experience are crucial for success. Also familiarity with artisanal mining, obtained by people who grew up in mining areas, seemed to be an advantage (idem)⁵⁶⁴. This is confirmed in the case of South Kivu. People who grew up in Kamituga are generally believed to be skilful miners and they are more likely to succeed in their mining projects, as they have acquired relevant knowledge and skills over time. Most people who effectively worked for Sominki have now reached the age of retirement (although in Mukungwe I met two boiseurs who had worked for Sominki in Kamituga in the past), but some have passed on their knowledge to family members. Miners with more specialised tasks, like the boiseurs, are also paid differently: per task instead of with a percentage share in the output. As has been explained, a share in the output is quite hazardous.

The recruitment in a mining team is first of all based on skills and physical ability, although preexisting family and friendship relations may facilitate someone being hired. Yet someone who is physically not able to do the hard work in the underground shafts will not last in the activity. Within the teams there is some hierarchy, as the description of the different specialisations showed. But everyone who works underground faces the same harsh working conditions. To some extent this levels out the differences. For that reason, Bryceson and Fisher (2014: 181) perceive some 'democratic tendencies' in artisanal mining, which are exemplified in the egalitarian frontier entry and the pit power politics (professionalism, collegial ties, fairness and egalitarianism).

Some of the social and moral norms prevailing in artisanal gold mining give a good idea about the professional qualities that are highly appreciated, like honesty, trustworthiness, responsibility and loyalty. As I said, a mining project may extend over a long time period, and there are periods in which the team is hardly making any profits, periods they must endure before reaching the production phase. The miners who are working hard to open up the tunnel and proceed in the direction of the gold vein, are sometimes called 'souffrants', or those who suffer. On the other side, you find those miners who only show up and offer their services when a shaft is about to reach the high production. These miners are called 'kanyata na fine' in Kilega (the language of the Balega), those who 'go along with the fine gold'. So they only come into action when there is pure gold to be found. The 'kanyata na fine' are considered to be opportunists and are said to corrupt the shaft managers⁵⁶⁵. They have a bad reputation and are not well respected in general. Some shaft managers therefore have an internal 'order of business': if you have been absent for three months, you are declared to be a deserter. In that

⁵⁶⁴ The authors also referred to level of education, but I have not been able to study that.

⁵⁶⁵ Interview with shaft manager from Mukungwe, Bukavu, 09/06/2012; interview with local leaders, Mukungwe, 31/05/2012.

case you cannot show up just like that in the high production phase to claim your share⁵⁶⁶. As one local leader overseeing a number of mining shafts said: "everyone has to be aware of his obligations towards the other"⁵⁶⁷. Pretension is not tolerated either. This is illustrated by a story that was told in Kamituga about a man who had grown rich by mining and bought a house in Bukavu. When he went back to visit his native village, he demanded three mattresses to sleep on, and he refused to eat the local food. But he was punished for behaving so arrogantly, fell bankrupt and eventually had to sell all his properties. These kinds of exemplary stories are also used in the traditional Lega culture to educate children and teach them about good and bad behaviour. This shows how moral, social and professional norms often interplay, and result from a bricolage process of pre-existing norms and practices.

Other norms do not appeal to social or moral prescriptions, but have just been installed in a pragmatic way, in order to facilitate the work underground. For example, in some gold sites which are intensively exploited, several teams may be working on a relatively small surface area. Sometimes they unexpectedly bump into one another underground. In this case, the norm prescribes that the team that last arrives at a place where another team is already working and where they have left tools (a sign that they are still in operation), needs to retreat. This norm seems to apply to all South Kivu sites⁵⁶⁸:

"When two teams are working next to each other... In any case, we miners say that in the underground, there are no boundaries. Our work is only guided by the gold vein we are chasing. But when it happens that by chasing the gold, you end up at a place where another team is working, and you end up in a shaft that they have already dug, you need to retreat"⁵⁶⁹.

The work underground indeed poses a number of material challenges. To surmount them, shaft managers may sometimes cooperate, as the following example from Lugushwa demonstrates:

A. explained that he shares a shaft entrance with another PDG⁵⁷⁰. With his team of sixty workers, A. proceeds to the left-hand side, while the other shaft manager, employing more than 100 miners, proceeds to the right. In principle they work independently. They do not share the yields, but they do share some costs. As the other shaft manager is working seven metres below A., all the groundwater flows his way. Therefore they have agreed that A. takes an equal share in the costs of the water pump (buying or hiring a pump, paying for the gasoline and paying for two guards to watch over the pump).

The professional norms are sanctioned by the professional actors themselves, mostly the shaft managers or trade union-like organisations or cooperatives. The latter exist in most mining sites, although they do not comply with the official regulations of what a 'cooperative' should look like. In practice these associations take up a myriad of functions, from defending miners' rights over social assistance in case of an accident to technical assistance and inspection of the

⁵⁶⁶ Interview with local leaders, Mukungwe, 31/05/2012.

⁵⁶⁷ Interview with local leaders, Mukungwe, 31/05/2012.

⁵⁶⁸ Interview with former miner, Bukavu, 27/07/2009. Luning (2008) describes how these kinds of conflicts are managed by a 'strong' man in the artisanal mining site of Baskouda.

⁵⁶⁹ Interview with former miner, Bukavu, 27/07/2009.

⁵⁷⁰ Interview with miner, Kamituga, 20/01/2011.

working conditions. They may also intervene in the case of underground disputes, as described above. The map on figure 22 for example was drawn by COKA, an association in Kamituga, and illustrates a conflict in which four mining teams came into collision and in which COKA mediated.

In this capacity some of them seemed to function quite well. Yet in other places, and especially as a result of recent formalisation attempts, as will be argued in chapter eleven, cooperatives are used by local power holders as vehicles to obtain access control. Also customary chiefs may intervene in the case of such a dispute. But the formal courts of justice or state institutions like Saesscam or the Mining Division rarely do. As I already indicated the latter have little legitimacy among the miners and are not competent either in cases of mining activities that are not in compliance with the Mining Code⁵⁷¹.

8.6. CONCLUSION

An access analysis of artisanal gold mining entails a deconstruction of the ways in which people are able to benefit from the resource and of the power relations and norms that shape their ability to benefit. It allows us to draw a number of conclusions on agency, norms and power relations.

First, gaining and maintaining physical access to the gold mines is of crucial importance for miners. Miners use different legal rights-based mechanisms to secure their access. They base themselves for example on 'traditional' and 'customary' rights, whereby traditional rights are conceived as the rights resulting from the fact that parents and ancestors lived and worked on the same land, whereas customary rights are part of a system that is often perceived as being 'traditional', but that in reality has undergone changes and has evolved to an effective taxation system on access to land and on mineral production. Still under the rights-based approach, miners refer to the fact that the land has been 'abandoned' by the company that had it in concession, and that the state does not provide for its citizens, which gives the latter the right to fend for themselves. They also strategically make use of the presence of state institutions or other power holders in order to maintain their access. In turn, state agents, customary chiefs and military leaders use of the claims addressed to them as instruments to establish their own authority, making use of what I have called 'legal command'. This specific application of the rights-based access mechanism is related to the particular context of South Kivu, where artisanal mining has been recognised by law, but where the provisions aimed at formalising the sector have not been operationalised (yet). It has its roots in historical processes as described in part two. This chapter also shows the importance of access to technology and information. But perhaps the most crucial factor for a mining project to succeed is access to financial capital. I have explained that underground mining requires investments in manpower, tools, small machines and so on. For these investments the PDG is at least partly dependent on a financier, in many cases a small trader. At this point, the importance of access to relations also becomes clear. The traders are crucial in securing miners' access to markets as well. This access to markets is shaped through the particular relationships of dependency miners and traders have. This point will be further detailed in chapter nine. As for the miners themselves,

⁵⁷¹ See chapter eight. In chapter nine I will come back to the issue of disputes and sanctioning, so I will not go into detail here.

access to labour opportunities is very important and is shaped through personal relations with shaft managers, whereby specific skills and experience (e.g. of the 'boiseurs'), or reputation (e.g. the 'kanyata na fine') are determining factors as well.

The configuration of these access mechanisms changes over time, as has been demonstrated in part two, but also across places. In Kamituga and Lugushwa (and to a lesser extent Luhwindja) an experienced and skilled workforce can be found. These people have relatively good access to information about the location of gold veins and about extraction techniques in general. After the end of the war, the institutional context there became more secure and more conducive to investment. In Mukungwe the security situation is much more volatile, which has an impact on people's ability to benefit. The local power holders have been competing for a long time for access control, which has resulted in outright violence and heavy taxation burdens on the population. The miners working here are typically younger, more mobile and live the 'ambiance' of the mining camp, spending a large part of their profits on immediate consumption. Yet in Mukungwe one also finds some very experienced shaft managers or other skilled workers who have been moving between different mining sites, following up on the availability of minerals.

One recent change, in all three mining sites, is the presence of Banro. As I will demonstrate in chapter twelve this has caused, and will most likely cause more changes in the configuration of access mechanisms because it changes the power relations. Industrial companies have more access to financial capital, technology and geological knowledge and they are advantaged by the state legal framework. Both national policies and evolutions on the international market (scramble for resources, trend towards large-scale mining, new governance functions embodied in CSR) tend to prioritise the rights of industrial actors as opposed to artisanal ones. In this context, the strongest mechanism artisanal miners may have left, is (violent) resistance, as will become clear in chapter twelve. Yet artisanal mining also stands for a production mode that offers ample opportunities for (flexible) employment and local livelihood support and is well-connected to the local economy and society. Moreover, this chapter showed that it is characterised by particular practices for gaining, maintaining and controlling access (access mechanisms) and by proper professional norms. To come back to a remark made in chapter one: the choice may not be between either industrial or artisanal mining. The question may rather be which one is beneficial to whom, under which circumstances and in which time period. As I will argue further in chapter thirteen, artisanal mining is currently more adapted – or at least contains some elements that make it more adapted but need some improvement to be beneficial for the majority of South Kivu's population. In this sense my partial conclusion here follows Bryceson and Fisher's (2014: 185) observation that artisanal mining can foster democratic tendencies at the local level and beyond. However, the authors warn that this is not always the case and that democratic tendencies may be undermined, for example by "political and economic pressures" or "displacement" to the advantage of large-scale mining. This will be discussed in part four.

So in order to make an assessment of artisanal mining vis-à-vis industrial mining, we should better understand the internal dynamics of artisanal mining. This chapter has demonstrated that artisanal mining activities are regulated by a particular set of professional norms, which means that they are not just ad-hoc individual livelihood activities driven by so-called push or pull factors. Interestingly, this development towards a professionalised, regulated sector has taken place against a historical background of economic and political crisis, weakening of state power and violent conflict.

"Puis un code pénal draconien: quiconque fait volontairement tort à quelqu'un de la valeur de cinquante dollars sera pendu par le cou jusqu'à ce que mort s'ensuive. La peine pour un tort moindre sera de cinq à cinquante coups de baguette frappés à nu sur les parties charnues du corps. Le nombre de coups, dans ces limites, est laissé à l'appréciation du juge" (p.104).

"Then there were draconian punishments: whoever steals for a value of more than 50 dollars will be hanged to death. The punishment for a lesser offence will be between 5 and 50 lashes, to be decided upon by the judge" (p.104).

Just like the previous one, this chapter addresses the question how miners and traders benefit from gold. It focuses on access via the negotiation of social relations. The observation that interactions are based on personal relations, rather than on pure market exchange, is a very common finding in research on economic exchange⁵⁷². Ribot and Peluso (2003: 172) argued that social relations of friendship, trust, reciprocity, patronage, dependence and obligation are in fact "central to virtually all other elements of access". This observation is important. It shows that relational access mechanisms are often used as a kind of gateway to some other access mechanism. Indeed, chapter eight already indicated that relationships are important in rights-based access mechanisms (the negotiations with state agents or customary chiefs for example) and in structural access mechanisms (the recruitment of miners, the investments in the underground shafts). In the words of Sara Berry (1993: 15), "access to resources depended, in part, on the ability to negotiate successfully". Therefore people need to invest in the means of negotiation as well as the means of production per se. This also means that, in case there are changes in the broader political economy, people may need to renegotiate their access by creating new types of social relations. For example, part two has illustrated that those who are in power, those who have access control over a mining site, change over time. The occupation of mines during the war is perhaps the clearest example. Such changes do force miners to build up and maintain new relationships with power holders.

In this chapter though I will not so much look at 'vertical' relations with power holders, but for the sake of focus and detail, I will focus on credit and debt relationships between miners and traders in and around the mines⁵⁷³. These relationships are used in order to gain access to financial capital and to supplies or to the market. Yet this is just a snapshot, as similar relations connect virtually all actors in gold mining and trade. Like in chapter eight, I will describe the practices: how miners and traders interact and transact. Then I will analyse how these practices have evolved into professional, moral and social norms, and which sanctioning mechanisms are available. This chapter thus analyses local gold extraction and trade as a web of personal relations which are governed by a set of norms, shaped within the particular institutional context. This allows me to draw some conclusions on agency and power configurations.

⁵⁷² See section 1.3.

⁵⁷³ In the literature on artisanal mining there generally is recognition of a relation or a dependency of miners on traders (often characterised as being exploitative). Yet as Childs (2008: 207) rightly noted, little in-depth research has been done about this dependency and why it persists.

The empirical data were mainly gathered in 2008 and 2009 in Kamituga. The presence of local buying houses in Kamituga provided an excellent opportunity to carry out interviews on this issue of personal relationships⁵⁷⁴. In Mukungwe realities are slightly different, although personal relations also play a crucial role, as this chapter will show. In Luhwindja similar practices and norms existed before the arrival of Banro, but by the time of my field visits there (2011 and 2012) local realities had already altered to such an extent – as a result of the arrival of Banro - that studying them was no longer possible⁵⁷⁵. This chapter analyses why and how the relationships between miners and traders are created in the first place (9.1), what the nature is of the credit and debt relations (9.2), how these are maintained, reinforced and regulated through particular professional norms (9.3), how these norms are sanctioned (9.4), and finally comes to a conclusion (9.5).

9.1. BUILDING RELATIONSHIPS

Close relations between artisanal miners and traders emerge out of a mutual need to collaborate. This need is created by the urge for cash and the requirement to invest in shafts on the one hand, and to secure a constant supply of gold on the other hand. Artisanal miners, as I have explained in chapter eight, prefer to sell their production on the spot. First of all they usually produce relatively small quantities, which make it not worth travelling to Bukavu to go and sell in the bigger trading houses. Besides the price difference between the buying houses in Bukavu and those near the mining sites is usually very small, as chapter ten further details. Second, miners prefer to get cash for immediate consumption which is not only a symptom of boundless consumerism, but also a risk aversion strategy. By quickly transforming their production into cash, they avoid a number of risks: the risk of keeping a stock of gold or cash in an insecure environment, the security risk of travelling with it to Bukavu, the risk of having to establish new personal relationships in town and the risk of being negatively affected by price fluctuations. Consequently they remain dependent on local traders.

In expectation of reaching the gold veins inside the shafts, miners need tools, food, drinks, clothes, torches and so on for their daily work and survival. As was explained these costs are usually born by the shaft managers. Beyond the daily or monthly costs, shaft managers also need to make larger investments since they may face technical limits. The deeper one reaches, the more difficult it becomes to circulate oxygen and to evacuate the extracted stones and, more importantly, the groundwater. Therefore they need to buy small machines such as water and oxygen pumps, fuel and dynamite to excavate the stones. As there are no other credit facilities available, shaft managers turn to traders for making (parts of) these investments. Some shaft managers may have financial capital themselves and rely on financiers to complement this⁵⁷⁶.

Traders for their part need a constant supply of goods. If the shafts are not producing, there is nothing to sell. In 2009, for example, quite some traders in Kamituga complained about supply shortages due to the difficulty of reaching productive gold veins, since decades of artisanal

⁵⁷⁴ See chapter five.

⁵⁷⁵ Interview with former miner, Luhwindja, 08/01/2011.

⁵⁷⁶ Interview with miner, Kamituga, 01/2011.

mining had left some upper soil layers exhausted. Therefore additional investments had to be made, as a local trader explained:

"We are forced to sponsor them if we want gold to buy. If we do not finance their operations they will not find gold. Because we found that here in Kamituga the available gold veins are already deep underground, up to 400 meters, where it becomes difficult to mine. So I sponsor 12 shafts at the moment. I buy them food, but also machines and fuel"⁵⁷⁷.

Traders said that "it is impossible to have a supply of gold without sponsoring or financing miners and shaft managers. Every day you need to give them money in order to get something back"⁵⁷⁸. The same goes for loutriers, who also finance the miners with usually smaller amounts, in order to secure their supplies⁵⁷⁹. Keith Hart (1988: 179) observed the same phenomenon on the Accra market in Ghana: "The interdependence of both parties is based on the fact that sellers are subject to unpredictable shortages and gluts of supply and must have a steady clientele, while the buyers of course need to eat when they have no cash". This mutual dependency is nicely illustrated by the following quote by the commission agent of a buying house in Kamituga:

"You can have a client whom you sponsor; this means you help him, you give him credit. So imagine you help him until the point where you run out of money. This means bankruptcy for you as well. You absolutely have to find more money, in order to continue the work, so that you can find the gold. That is our great difficulty. We have big problems with our clients, since it becomes more and more difficult to reach the gold vein and we do not have enough money to cover those costs"⁵⁸⁰.

A trader in Kamituga expressed it this way: "We all become PDGs"⁵⁸¹. Another added: "You both become responsible for the shaft, because you bear the costs and he sheds his sweat"⁵⁸². Miners on the other hand complained that if a financier runs out of money, the mining project immediately fails as well⁵⁸³. So because of this mutual dependency, gold traders and miners repeatedly interact with each other. They personalise their relationships in order to reduce uncertainty. This process has been characterised as 'clientelisation' or the "tendency for repetitive purchasers of particular goods and services to establish continuing relationships with particular purveyors of the goods" (Geertz, 1978: 30). As Clifford Geertz (idem) noted, clientship in the market is "a reciprocal matter, and the butcher or wool seller is tied to his regular customer in the same terms as he to them". Kranton (1996: 830) defined reciprocal exchange as the exchange of "goods, services, information, or money in exchange for future compensation in kind". Reciprocity, so MacGaffey and Bazenguissa-Ganga (2000: 13) finally argued, is "a key element in network organisation". But "rather than involving a precise definition of equivalence in exchange, it tends to emphasise indebtedness and obligation". In other words, it is not so much about the value of the exchanged goods, but rather about indebtedness and expectations or obligations created by the relationship.

⁵⁷⁷ Interview with trader, Kamituga, 08/2009.

⁵⁷⁸ Interview with commission agent, Kamituga, 19/08/2009.

⁵⁷⁹ Interview with loutrier, Kamituga, 08/2009.

⁵⁸⁰ Interview with commission agent, Kamituga, 10/08/2009.

⁵⁸¹ Interview with trader, Kamituga, 12/08/2009.

⁵⁸² Interview with commission agent, Kamituga, 07/08/2009.

⁵⁸³ Group interview with miners, Mukungwe, 01/06/2012.

These personal, reciprocal relationships are not confined to miners and traders. Small traders and large traders, or loutriers and traders interact with each other on a similar basis: the larger traders put some money at the disposal of the smaller traders as 'working capital', which the small traders need to pay back. In the gold trade the system of traders, usually based in Bukavu, and commission agents, based in buying offices set up in and around the gold mining sites, is common. The former use their agents to diversify their supplies and to avoid risk, while commission agents work with the funds put at their disposal by their 'patron', the trader they work for. In fact this system has led to the building of an extended network, linking different mines and trading hubs, and tying traders, big and small, to one another. Ultimately a lot of the working capital in the gold trade comes from big traders who are active on the world market⁵⁸⁴. In Bujumbura, some master traders lend amounts up to USD 500,000 to individual traders who go and buy in the DRC⁵⁸⁵. An agent working at an official comptoir in Bukavu told me they hand out credits for up to USD 20,000 per individual⁵⁸⁶. But the supplies then have to follow shortly, preferably in two days, so that the credit does not remain outstanding for a long time. This means that traders come here to lend money when they already have their eyes on a sufficient supply. According to one of the interviewed traders, who was a regular customer/supplier at this particular comptoir, the conditions to obtain a loan are now somewhat stricter than before, since the comptoir has had some bad experiences with people embezzling their money⁵⁸⁷. This already indicates that the network and the relations may come under serious pressure. It is not because there is reciprocity that problems do not emerge, or that emerging problems are automatically solved in mutual agreement, as I explain later.

The initial recruitment of commission agents may be done on the basis of 'strong ties', close friends or family (Granovetter, 1973). There are many examples of patrons who employ brothers – sometimes in the context of extended family – , sons or brothers-in-law⁵⁸⁸. But it is also acknowledged that working with family members may create problems, since it is "difficult to dismiss family members if they don't work hard enough. It is better to just employ someone in whom you have confidence"⁵⁸⁹. Z. for example operates a number of buying offices in different neighbourhoods in Kamituga (Kele, Kalingi and Camp 6) and in the surroundings (Kibe). One of the offices is managed by his brother, but "there have been some problems between me and him". When asked on what basis he now recruits his staff, he told us:

"On the basis of credibility. [So if you see me for the first time, how would you know that I am credible?] You have to employ someone you know. [You only hire familiar people?] Well they may be family, but more often it is just someone you know works hard and is capable of doing the job. I am not an NGO. I hire people on the basis of their capacities, their skills and their education level. I only hire men whom I consider honest"⁵⁹⁰.

⁵⁸⁴ Focus group with traders, Kamituga, 01/2011. See also chapter ten.

⁵⁸⁵ Interview with trader, Bujumbura, 17/03/2010; interview with trader, Bukavu, 04/01/2011.

⁵⁸⁶ Interview with commission agent, Bukavu, 23/07/2009.

⁵⁸⁷ Interview with trader, Buakvu, 23/04/2008.

⁵⁸⁸ Interview with trader, Kamituga, 08/2009; interview with commission agent, Kamituga, 11/08/2009; interview with trader, Kamituga, 07/08/2009; interview with commission agent, Lugushwa, 26/01/2011; interview with commission agent, Kamituga, 08/2009.

⁵⁸⁹ Interview with trader, Bukavu, 23/04/2008.

⁵⁹⁰ Interview with trader, Kamituga, 08/2009.

This quote demonstrates that commission agents may also be recruited on the basis of professional qualities such as skills, honesty, experience and education. This – as has been argued for artisanal mining in chapter eight - points to a professionalisation of the trading activities. In her study on the Igbo shoe manufacturers' cluster, Kate Meagher (2010: 86) observed that strong ties based on kinship or ethnicity are more and more being replaced by weak ties of a diverse nature, at least for access to labour, supply and marketing. For access to training and starting up a business though, strong ties were still important (idem). Studying the Nande business network in North Kivu, Timothy Raeymaekers (2007: 43) found that there is a division of labour between family relatives, who manage the internal affairs of the firm, whereas the "day-to-day business of importing and exporting goods and exploring new markets is done preferably with outsiders to the family network". Similarly in Kamituga it can be observed that family ties are still important in the gold trade, but their drawbacks are also acknowledged, which has encouraged some traders to start working with acquaintances whose qualities they know and appreciate. As the next quote illustrates, experience as a miner is an added value for a trading agent. This agent has been hired by an acquaintance of his because his age did not permit him anymore to work in the shafts:

"I was just a miner. I was like bareskinned when this old man [patron] placed me here. He clothed my nudity. This [work in the gold trade] is the cloth that covers me now. I found nothing in other activities. I immediately spent the little money I found. Now it has happened that I am old, I cannot hold a shovel or a chisel anymore, let alone to penetrate in the gold shaft. And that is why this old man told me: 'Have a rest here'. He gave me this office, I started to work. I get my money at the end of the month. [...] [Is the 'patron' your brother-in-law?] No, he hired me for my age. Maybe he has appreciated my wisdom. In any case we are no relatives. We have known each other for quite some time though"⁵⁹¹.

A similar conclusion can be drawn from the story of another commission agent who was recruited on the basis of the experience he had already acquired, this time not in the gold sector, but in trade in general:

"My patron had an agent here who did not perform well, so he was looking for someone else. We had already been collaborating before. I was first working in Burundi, when he asked me to join him in his travel agency Tanganyika Express. So I moved to Bukavu and started operating our trucks and warehouses. At a certain moment he asked me to join him in the gold trade, so I first went to learn how to measure the gold and do the calculations. After that I was sent over here"⁵⁹².

The case of miners and traders developing relations is somewhat different than commission agents and bosses. Miners and traders often do not know each other before their first transaction so there definitely is no strong tie, and not necessarily even a weak tie either. They really need to build up a relationship. The next section explains what exactly this relationship consists of.

⁵⁹¹ Interview with commission agent, Kamituga, 08/08/2009.

⁵⁹² Interview with commission agent, Kamituga, 08/2009.

9.2. CREDIT AND DEBT RELATIONSHIPS

It already became clear that the relationships in the gold trade are based on sponsoring or financing. Our interviewees would occasionally use the French term 'crédit', but when talking in Swahili (most of the time), they would use the term 'deni' (plural: 'madeni'). This literally means 'debt'. It thus tends to lay more emphasis on the indebtedness (as a characteristic of the relationship) than on the credit (money or goods) itself. Indeed, we see that the long-term relationship is valued higher than the immediate monetary benefits: "He cannot run away from me, and I cannot run away from him. Can I end all that for USD 10 or 50? No"⁵⁹³. Or as a Bukavu trader formulated it:

"You need to maintain the relationship. If you have a good relationship with someone, that is worth more than money. But if you betray the relationship, then he will not be on your side anymore. And if you need him tomorrow, he will refuse"⁵⁹⁴.

These quotes already evoke a number of issues that will be dealt with in this chapter, for example what happens if someone is disloyal. But let me first concentrate on the nature of the relationships itself. In his work on the Frafra migrants in Ghana, Keith Hart (1988: 179) already found that "credit is [...] the most prominent feature of buyer-seller relations; and you do not bargain if each side has a long-term arrangement to protect". In the mining sites this credit takes different forms⁵⁹⁵. The first category includes small credits in the form of limited amounts of money, tools, food (beans, rice, and so on), batteries for torches, clothes, or something to provide for the family⁵⁹⁶. Some interviewed traders label them as 'assistance'⁵⁹⁷ or as 'gifts', saying "I give these things for free, he does not have to pay it back"⁵⁹⁸. But clearly these 'gifts' have to be repaid in the form of a supply (gold presented to the trader for sale). In other words, these are not pure gifts. They have a social meaning "within a well-defined network of obligations", as Granovetter (1993: 19) described it. Commission agents often do not discuss those small credits with their bosses, since they are part of the daily transactions⁵⁹⁹. Secondly, large credits are granted to shaft managers and take the form of investments in the shafts, mostly in water and oxygen pumps, generators and fuel⁶⁰⁰. Sums can run up to USD 5000, 50,000 or even 100,000⁶⁰¹, depending on the size of the buying office and the needs in the shaft. Some debts have been outstanding for a long time and are divided over different shafts. One trader in Kamituga told us he has unsettled debts from 2002. All this time

⁵⁹⁷ Interview with commission agent, Kamituga, 08/2009.

⁵⁹³ Interview with commission agent, Kamituga, 12/08/2009.

⁵⁹⁴ Interview with trader, Kamituga, 06/01/2011.

⁵⁹⁵ The same has been observed in the West African gold trade, see Grätz (2004: 153).

⁵⁹⁶ Interview with commission agent, Kamituga, 11/08/2009; interview with commission agent, Kamituga, 13/08/2009; interview with miner, Kamituga, 03/04/2008; interview with commission agent, Kamituga, 19/08/2009; interview with trader, Kamituga, 21/08/2009; interview with commission agent, Kamituga, 12/08/2009; interview with trader, Kamituga, 14/08/2009.

⁵⁹⁸ Interview with commission agent, Kamituga, 11/08/2009; interview with another commission agent, Kamituga, 11/08/2009.

⁵⁹⁹ Interview with commission agent, Kamituga, 11/08/2009; interview with another commission agent, Kamituga, 11/08/2009.

⁶⁰⁰ Interview with commission agent, Kamituga, 20/08/2009; interview with commission agent, Kamituga, 11/08/2009.

⁶⁰¹ Focus group with traders, Kamituga, 01/2011.

the debtors have been working in the various mining shafts he sponsors, in and outside Kamituga (on gold and cassiterite sites)⁶⁰².

When the team of miners reaches the 'production' phase, the shaft manager is required to sell his production at the trader's place: "He cannot go elsewhere, even if they were to pay a higher price there"⁶⁰³. The trader-financier will first of all aim at recovering his investments, and possibly also take an additional part of the production⁶⁰⁴. The one-third arrangement discussed in chapter eight is usually upheld as a standard. But these arrangements are not always respected. When it comes to dividing the haul, conflicts may arise and new negotiations may start. In Mukungwe the situation is slightly different⁶⁰⁵. Here miners usually do not process their own production share. They rather sell entire bags of sand to the traders, locally called 'managers', who are present at the site. This is done in order to make the transactions because the price that is paid is a rough estimation, which is most of the time in favour of the trader⁶⁰⁶. Although it happens less frequently, miners and traders may as well agree that the loan will be reimbursed in cash:

"Here, you can see in my notebook whom I have granted credits. They will pay me back, no problem. Here, this one I have given him USD 2000 first, then another 1000 and then 700. So he will pay me USD 3700 in gold, as we agreed. This one I lent him USD 1500, he will pay me back in cash. That is how we agreed. This one must pay me USD 2700 in gold [...]"⁶⁰⁷.

A mining project may of course fail to generate an output, or the miner who took the credit may suddenly disappear. According to the interviewed traders, this happens frequently. But they take it as 'part of the job': "It is also a matter of luck, whether a project succeeds or fails"⁶⁰⁸. Sponsoring miners is considered to be a necessary investment, a risk you have to take⁶⁰⁹. The granting of large credits clearly promises greater returns, but also involves higher risks:

"It really depends on luck. Someone may invest USD 10,000 and yield gold worth USD 20,000. Then you can easily recover your investments and maybe take another share in the production. And suppose that a bit later the shaft produces another USD 20,000, then your investment will be multiplied by how much? That is what motivates people to lend out money. Maybe God will help them and they will earn a lot of money"⁶¹⁰.

However, not all traders are prepared to take those risks. One trader stated he had lost a lot of money in the beginning of his career. The numerous failures had forced him to be more careful now when granting credit⁶¹¹. Another agent said he will never grant credits to shaft managers,

⁶⁰² Interview with trader, Kamituga, 21/08/2009.

⁶⁰³ Interview with trader, Bukavu, 08/2009.

⁶⁰⁴ Interview with trader, Kamituga, 11/08/2009; interview with commission agent, Kamituga, 08/2009.

⁶⁰⁵ See chapter eight.

⁶⁰⁶ Interview with local leader, Mukungwe, 31/05/2012.

⁶⁰⁷ Interview with commission agent, Kamituga, 11/08/2009.

⁶⁰⁸ Interview with trader, Kamituga, 21/08/2009; interview with commission agent, Kamituga, 08/2009; interview with loutrier, Kamituga, 18/08/2009.

⁶⁰⁹ Interview with trader, Kamituga, 07/08/2009; interview with commission agent, Kamituga, 13/08/2009; interview with commission agent, Kamituga, 11/08/2009.

⁶¹⁰ Interview with trader, Kamituga, 17/08/2009.

⁶¹¹ Interview with trader, Kamituga, 13/08/2009.

because "when you lend money to those people, they adopt the spirit of a thief"⁶¹². When asked about smaller 'gifts' though, the same commission agent said he does give them: "They [miners] can buy some beans with the 500 or 1000 Congolese francs I give them. They don't have to pay it back. I do this to attract clients". This confirms the point that handing out small amounts is a commercial strategy. When asked about their strategies to attract clients, traders indeed answered:

"I give them beans to eat, buy them some fuel for the water pump or some branches to shore up the shaft"⁶¹³.

"They are my friends and they usually come to me. You help them with a little money, they go to the shafts and when they return, they will pay you back"⁶¹⁴.

"You give them some 200 Congolese francs to buy beans. This is to encourage him to bring you gold later"⁶¹⁵.

One commission agent claimed he has about 50 fixed clients who regularly – more than once a week – come to his buying office to collect these small amounts⁶¹⁶. In terms of commercial strategies, it also seems to be important to have a permanent presence near the mines, so that the miners know you are in business:

"If you have been absent for a month, the miners will have forgotten you already. They need to see that you are permanently working"⁶¹⁷.

So what does this mean in terms of power relations? As I have said reciprocal exchange is not void of power imbalances. The credit/debt relationship makes the miner dependent upon the trader. When he wants to sell his production, it will be harder to bargain about the price. A miner in this case mostly accepts the price the trader imposes, whereas he might be able to obtain a higher price in another buying office. As one miner told me: "We discuss, but they impose"⁶¹⁸. Nevertheless, this possibility to negotiate also depends on the quantity of gold he has on offer: the more you have to sell, the stronger your bargaining power, is a norm accepted by both buyers and suppliers. But handing out credits also creates dependence on the side of the traders. It forces them to take big risks and they have limited guarantees at reimbursement, as will become clearer later. So these arrangements may be conceived as risk-sharing arrangements, rather than as exploitative deals⁶¹⁹. In this case we are really confronted with ambiguous power relations. In other words, the image that arises from my analysis does not confirm the popular account of artisanal miners whose labour is exploited by greedy and

⁶¹² Interview with commission agent, Kamituga, 11/08/2009.

⁶¹³ Interview with commission agent, Kamituga, 12/08/2009.

⁶¹⁴ Interview with commission agent, Kamituga, 19/08/009.

⁶¹⁵ Interview with commission agent, Kamituga, 11/08/2009.

⁶¹⁶ Interview with commission agent, Kamituga, 08/2009.

⁶¹⁷ Interview with trader, Kamituga, 14/08/2009.

⁶¹⁸ Interview with miner, Kamituga, 04/04/2008.

⁶¹⁹ See also Grätz (2004: 146) for a similar argument on West African gold trade.

parasitic traders⁶²⁰. I argue that it is erroneous to consider the miners, who are 'at the bottom of the chain' as the ones who are necessarily exploited and held in 'debt bondage'⁶²¹.

This is not to say though that credit and debt relations have no drawbacks. People may indeed become 'trapped' in their debt. This phenomenon, also known as the 'poverty trap of indebtedness' has been acknowledged in the literature. Banchirigah (2008: 35) and Perks (2011: 1122), for example, consider it as being one of the 'barriers to exit' artisanal mining. Yet Hilson (2009: 3) believes it it is so far poorly understood. And it is certainly not often recognised that it also works for traders. Commission agents noted for example that they hand out credits on their own account. The boss does not cover them, so if the project fails they need to compensate their loss with their own capital, which may cause them serious problems⁶²². A loutrier described how he conceives the indebtedness trap: "Once you have accumulated a lot of outstanding loans, there is no way to exit the activity anymore"⁶²³. The high risks that come with granting credits are illustrated in the pictures below. On the left it shows a sign that I found in one of the buying offices along Kamituga's main road⁶²⁴, saying: "Don't come today, be ashamed to ask for credit". It was the only sign though of its kind in Kamituga. The agent of this buying office explained that he had stopped handing out credits because it had already caused him too many problems. Besides as a commission agent he was responsible for those credits, and needed to settle the accounts with his boss. Putting up this sign was his way to make this clear to customers.

The picture on the right refers to a more general belief about the dangers of selling on credit. I did not find it in the mining sites, but encountered it in several shops in Bukavu. Jeroen Cuvelier (2011b) discussed a very similar image in his PhD dissertation on the anthropology of mining in Katanga Province. This cartoon of an impoverished man, wearing beggarly clothes and carrying some meagre tools, is accompanied by the saying: "Return to the village, he sold everything on credit, his kindness made him miserable" in French and "I have lowered my price a lot, but I also became victim of my decision" in Swahili. Cuvelier (2011b) claims that shopkeepers in Katanga's urban centres are reluctant to hand out credits, knowing that clients are often unable to pay back, and he attributes this wariness to the impersonal relationships in these urban contexts (idem: 27)⁶²⁵. This may indeed explain why I encountered these cartoons in the big city center of Bukavu and why these kinds of signs were exceptional in the mining

⁶²⁰ This narrative is especially dominant in reports written by some NGOs or advocacy groups. An extreme example is a briefing by Free the Slaves (2010) considering 'debt bondage' as a form of slavery in the Congolese mines, see also Pact (2007); Global Witness (2009); Hochschild (2010). My own account also relates to an argument made by Cartier and Bürge (2011: 1094) that when markets are closer to farmers, the "potential for close (reciprocal) relations between farmers and traders and for less exploitative conditions increases". While the authors did not want to say that relationships between creditor and debtor are entirely free of exploitation and conflict, they argued that the reciprocity and proximity reduces the likelihood of it.

⁶²¹ In Pact (2010) the tendency to see traders as "parasitic middle-men who should be removed from the system in order for the miners to get a better deal" was recognised, but not deemed appropriate. Nevertheless, this report also lacked a fine-grained analysis of the relations between miners and traders.

⁶²² Interview with commission agent, Kamituga, 08/2009; interview with trader, Bukavu, 23/07/2009; interview with commission agent, Kamituga, 08/2009.

⁶²³ Interview with loutrier, Kamituga, 08/2009.

⁶²⁴ Fieldnotes, Kamituga, 12/08/2009.

⁶²⁵ Cuvelier further analysed this image first of all in the context of a long standing tradition of urban popular culture attacking credit in periods of economic and financial unrest (2011b: 21). Second, he believed it says something about rural-urban migration and the possibility, but also physical and psychological barriers, of 'going back to the village' to start over again. Third, the image for Cuvelier also reflects the "ambiguous position of the ruined shopkeeper" as "someone living in the margins of society, having no clear position in the social structure, looking for new sources of revenue and searching for new ways of being a man" (idem: 28).

sites. In her research Meagher (2010) also argues that shoe manufacturers have become less eager to hand out credit as a consequence of the shift from ethnic and community-based ties to impersonal market ties, which are according to her much more exploitative.

With respect to the traps in granting and taking credit, my research shows that problems especially arise when debtors are unable to reimburse due to external pressures. This could be observed for example during the ban on artisanal mining activities. Although production continued to a certain extent, albeit in an illegal way, it was seriously affected. As a consequence, debt relations came under serious pressure. Both miners and traders were worried about the possibility to repay the debts and to leave the mining site⁶²⁶. "I am completely stuck here. I have so many debts and don't even have the money to go home", a shaft manager in Lugushwa said⁶²⁷. Similar concerns were registered in Luhwindja, where the arrival of Banro had pushed many artisanal miners out of the mining sites by early 2011⁶²⁸. The outstanding debts proved to be a large burden for both miners and traders. In interviews miners expressed the hope – in vain - that Banro would cover the incurred debts⁶²⁹.

9.3. PROFESSIONAL NORMS: FRIENDSHIP AND TRUST

Having explained how and why these relationships are built, and how they materialise into credit and debt relations, I now analyse how they are maintained, reinforced and regulated, which allows us to uncover some specific norms. Let us take the example of a miner who steps into a small buying office, advertising its services in Kamituga's main street. The miner tells the agent that he is working in a mining shaft, and that he needs a sponsor. The first time, the agent will give him a small amount, for example a few hundred Congolese franks to buy some food or a beer. If he comes back and has something to sell, the miner may receive a higher amount the second time. Step by step the relationship is built and reinforced, as the following quote by a commission agent demonstrates:

"In order to have customers first you need to sponsor them. You need to create a relationship. When they come here, they tell you: "We would like to go into the job, but we don't have money to buy this and this." So you give them. You take a risk by giving them, because they can run away. But when they get something [gold], they must come back to you. Then the friendship is going on"⁶³⁰.

There are two important points here. First, these relationships are built up gradually: "If you give him something for the first time you must urge him not to forget you and come back tomorrow"⁶³¹. Second, interviewees often characterise this relationship as 'friendship'. "We are friends in the first place, after that I am also his client", a miner stated⁶³². This does not

⁶²⁶ Group interview with miners, Lugushwa, 25/01/2011; focus group with traders, Kamituga, 01/2011.

⁶²⁷ Interview with shaft manager, Lugushwa, 26/01/2011.

⁶²⁸ Group interview with miners, Luhwindja, 10/2011.

⁶²⁹ Interview with miner, Luhwinjda, 01/2011. See also an official memo by a miners' cooperative in Mukungwe, addressed to the Provincial Governor in which they ask him to lobby with Banro for the repayment of their investments: *Memo des propriétaires des puits d'or PDG dans le carré minier de Mukungwe en groupement de Mushinga/ territoire de Walungu*, 17/03/2011.

⁶³⁰ Interview with commission agent, Kamituga, 13/08/2009.

⁶³¹ Interview with commission agent, Kamituga, 11/08/2009.

⁶³² Interview with miner, Kamituga, 07/08/2009.

only play between miners and traders, but also between commission agents and 'patrons': "When you have been working together for some time [with the same patron] you become friends"⁶³³. But how can these statements be interpreted? To what extent are these expressions of friendship related to affection and empathy and to what extent is it a matter of risk calculation and instrumentality (see Wolf, 1966: 10 and MacGaffey and Bazenguissa-Ganga, 2000: 111)⁶³⁴? In the interview data I find evidence of a subtle hybrid of 'affective' and 'instrumental' friendship.

The first aspect relates to the moral economy that was already discussed in the previous chapter. In the gold sector, there definitely is a sense of 'belonging together' and 'sharing experiences'. Keith Hart (1988: 191) defined friendship as "the negotiated order of free individuals joined by affection and shared experience rather than by legal sanction or the ties of blood". In his research on gold mining in West Africa, Tilo Grätz (2009: 16) indeed found that the cohesion among miners is based on "the development of moralities and risk sharing arrangements in the work sphere; comradeship and friendship ties in peer groups of migrants; the sociability of shared leisure time in the mining camp; and common modes of communication and consumption". Grätz argued that friendship ties among miners cannot be simply reduced to "instrumental aspects of companionship and rationalities of material exchange" (idem: 14). There is a strong affective dimension to these relationships. In this respect Jeroen Cuvelier (2011: 55) relied on the work of Turner on 'liminality', saying that "people in a condition of liminality tend to develop 'communitas' or 'antistructure', that is, they create a rudimentarily structured and relatively undifferentiated community, while they interact in a spirit of spontaneity, friendliness and equality". The miners Cuvelier studied in Katanga indeed disregarded each others' social and ethnic backgrounds and treated each other as equals, 'comrades' (idem). Also in Kamituga, Luhwindja and Mukungwe this sense of unity and cohesion seems to be particularly strong among miners, as well as for miners and traders who work and live in the same spaces. As chapter eight demonstrated they develop a common lifestyle, a social and moral world that adheres to its own norms about social status, loyalty, work ethic and so on. But this does not mean that instrumental dimensions are absent in these friendships.

MacGaffey and Bazengouissa-Ganga (2000: 12) stated that the (trade) networks they studied are dependent on personal networks which are activated when needed, in contrast to traditional analyses of ethnic-based trading networks. Mitchell (cited in MacGaffey and Bazengouissa-Ganga, 2000: 12) labeled such networks "instrumentally-activated personal networks" and wrote that "a network exists in the recognition by people of a set of obligations and rights in respect of certain other identified people. At times these recognized relations may be utilized for a specific purpose". Raeymaekers (2007: 85) noted that "all friendly relations entail some sort of obligations", like mutual help or insurance against unexpected calamities, which is definitely also the case in the gold network under discussion. These obligations, Raeymaekers continued, are carried out within a framework of "diffuse solidarity", which are neither characterised by formal contracts, nor by family and kinship relations only.

⁶³³ Interview with commission agent, Kamituga, 12/08/2009; interview with commission agent, Kamituga, 13/08/2009.

⁶³⁴ Wolf (1966: 10) distinguishes between two kinds of friendship: emotional and instrumental. In the latter form, each person is a 'sponsor' of the other and access to resources becomes crucial in the relationship. Yet "a minimal element of affect remains an important ingredient in the relationship".

In these contexts friendship relations "can create a separate realm of intimacy and trust" (idem: 86). The previous analysis has shown that especially in the emergence of these relations, the instrumentalist dimension is crucial, as the relations are created out of a mutual need to do business and primarily serve a commercial aim. But this need does not disappear as the relationship evolved, on the contrary. The longer a credit and debt relationship lasts, the greater the investments and the greater the risks, the greater the losses may be and so the more important it becomes to maintain a good relationship. Indeed, as these credits between miners and traders are not formalised, as I discuss later, there are few guarantees. The characterisation of a business partner as a friend may then reduce the risk of being deceived.

Yet creditors employ other techniques as well in their attempts to reduce these risks. In this way, they show that the credit and debt relations also involve a considerable degree of rational risk calculation. Credit is not automatically granted to whoever comes to knock on the door of a buying office. Before a trader gives a larger amount of money, he must find out "where the debtor lives, whether he owns a house, whether he is no swindler ('escroc')"⁶³⁵. It also requires some experience to be able to make a good assessment⁶³⁶ and evaluate whether he is a "kind and reliable or an unkind person"⁶³⁷. So the qualities and weaknesses of a client are carefully considered, but his project and mining shaft are scrutinised too:

"So before launching the adventure, I already know that this man has found some gold. He just has some difficulties to continue the work. In this case, I can support his shaft, because I know that at least something will come out. He only needs a sponsor. In brief, if you know the shaft, you can support the owner. We do not invest randomly"⁶³⁸.

Some patrons check their agents in a similar way, as a commission agent said: "My boss knows that I own two houses in Bukavu and that I have a bank account. He knows how much that is worth, and so if I make a loss he will recover it"⁶³⁹. The access to background information about an individual, his family and his assets serves as a kind of guarantee, or at least a 'stick' with which the debtor can be encouraged or forced to pay.

This introduction of guarantees for cooperative behaviour can be interpreted as a consequence of the distrust mechanism. Distrust is in fact the expectation that others will not act in your best interest, that their behaviour might even harm you. These risks can be mitigated by taking some precautions, in this case gathering information about the person and his project. 'Trust' is then usually defined as the incorporation of risk in the decision whether or not to interact, based upon information gathered from repeated interaction with this person (see Coleman, 1990: 91; Luhmann, 1988: 95; Molm et al, 2000: 1422 and Tilly, 2004: 4). 'Trust' is also a concept that needs to be carefully scrutinised in this context. Interviewees very frequently used the word trust – they actually used the French word 'confiance' -, but what exactly do they mean when they declare that "the gold sector is entirely characterised by

⁶³⁵ Interview with commission agent, Bukavu, 23/07/2009.

⁶³⁶ Interview with commission agent, Kamituga, 08/2009; interview with trader, Kamituga, 07/08/2009; interview with commission agent, Kamituga, 11/08/2009.

⁶³⁷ Interview with commission agent, Kamituga, 08/2009.

⁶³⁸ Interview with a commission agent, Kamituga, 07/08/2009.

⁶³⁹ Interview with commission agent, Kamituga, 08/2009.

trust"⁶⁴⁰? I argue that trust is first of all built up in the context of a repeated inter-personal relationship. But more than that, trust is part of the professional ethic that prevails in artisanal gold mining and trade. As Bryceson (2010: 21) showed, trust in workplace relations is grounded in the shared experience of living and working together, in contrast to other forms of trust based on religion, gender and age or ethnicity.

Indeed, trust (in a particular person)⁶⁴¹ is something that builds up over time, as Granovetter (1993: 27) also emphasised. It is the result of a repeated interaction and, according to my interviewees, something you need to deserve: "if you deliver a good service, I will grant you trust"⁶⁴², or "someone who brings his production to me four times in a row, wins my trust"⁶⁴³. In this sense Meagher (2010: 83) refers to a quote by Humphrey and Schmitz (1996: 30), saying that when networks change from strictly community and kinship-based to more 'diffuse solidarity' (Raeymaekers, 2007: 85, see above), the foundation of trust is also changing "from trustworthiness being ascribed to being earned". But once trust has been 'deserved' and someone from within the gold network considers another person to be honest, the latter becomes an 'honourable client' ('client d'honneur')⁶⁴⁴, and specific norms apply to transactions with an honourable client. For example, at this point the norm prescribes that the creditor can ask no written agreements anymore. Even more, this would be considered as an insult:

"If you ask a receipt at that moment, they will think that you are a swindler"⁶⁴⁵.

"If I come to your place to ask a credit, even if it is worth USD 100,000 and you immediately ask to write it down, you won't see me anymore. Even more, I can go and tell everyone you want me to sign this document. You won't be able to buy anything anymore"⁶⁴⁶.

When asked whether it had ever happened to him that a debtor ran away with the money, a trader in Bukavu was surprised. "I thought I already said that we only grant loans to honourable clients", he said, implying that the likeliness for this to happen with honourable clients is extremely low. The interviewer then asked this trader how someone becomes an honourable client.

"If we have seen him ever since 2006 for example until now. That's what we call honourable. Since 2006 he has never left us, so we will give him money whenever he needs it. We can even give USD 10,000 if he wants. He will later bring his production to us"⁶⁴⁷.

⁶⁴⁰ Interview with commission agent, Kamituga, 08/2009; interview with loutrier, Kamituga, 08/2009; interview with trader, Bukavu, 08/2009; interview with commission agent, Kamituga, 08/2009; interview with commission agent, Kamituga, 14/08/2009; interview with trader, Kamituga, 08/2009; interview with trader, Kamituga,

⁶⁴¹ There is some discussion on how to use the concepts "confidence" and "trust". Seligman (1997) for example makes a distinction between bilateral and multilateral relations:, whereby 'confidence' relates to particular persons, whereas 'trust' relates to a social system, institutions, general norms and roles. I will not go deeper into this discussion here.

⁶⁴² Interview with commission agent, Kamituga, 20/08/2009; interview with commission agent, Kamituga, 08/2009.

⁶⁴³ Interview with commission agent, Kamituga, 13/08/2009.

⁶⁴⁴ Interview with trader, Kamituga, 08/2009; interview with commission agent, Kamituga, 14/08/2009.

⁶⁴⁵ Interview with trader, Kamituga, 21/01/2011.

⁶⁴⁶ Interview with commission agent, Kamituga, 14/08/2009.

⁶⁴⁷ Interview with trader, Bukavu, 28/07/2009.

Another agent explained :

"You need to get to know each other. He comes by, he appreciates how you weigh the gold, he likes the price, and he comes back. At a certain moment we start to become familiar, and then it goes well"⁶⁴⁸.

Yet even beyond the bilateral relationships, 'being trustworthy' seems to be a condition sine qua non to do business in the gold trade. This hints at a professional ethic and a norm which is also justified on a moral basis, prescribing what the quality of a 'good trader' is. A Bukavu based trader declared:

"We are all men of trust : we give trust, we receive trust and we deserve trust. That is how we do our business"⁶⁴⁹.

A trader who wanted to launch himself in the gold business summarised this as follows:

"Apparently you have to lend out money in a climate of trust in this business. And you must be honest, because if you are dishonest in this business, your life is in danger. I find it difficult to believe that you can give someone you barely know USD 500,000 like that, how will you know he will come back? But it seems that this is the way it works." He continued: "It is a trust network ('réseau de confiance'), fed by a trust that, I can say, is almost blind. Transactions are sometimes done at the airport, or in the car, or near the lake. My agent always has his electronic scales with him, everywhere he goes. [...] You need to take your time to discuss with the client, you need to respect him and give him time [...] Embezzlement ('escroqueries') happens, but if you work with someone who is part of the network, who is really prepared to sacrifice himself for the network, there will be no embezzlement.⁶⁵⁰"

If one wants to build a good reputation though that allows to 'grow' in the business, one needs to be trustworthy. This is well illustrated in a story about one of the largest traders in Bukavu, who used to be a commission agent and rose from the ranks, in part thanks to his trustworthiness:

"One day armed groups set fire on his car on the steep road near Ngomo [between Bukavu and Bujumbura]. But he managed to save the gold he had with him. If he were not an honest man, he would have told everyone that the gold was lost and kept it for himself. But he didn't. That is how he built up his trustworthiness. He wouldn't be where he is now, if he had not been honest. Now he gives out millions of US dollars on the sole basis of trust"⁶⁵¹.

In other words, 'honesty' is considered to be an extremely important quality for gold traders and being honest has evolved into a moral norm. The following quotes confirm this observation:

⁶⁴⁸ Interview with commission agent, Kamituga, 11/08/2009.

⁶⁴⁹ Interview with trader, Bukavu, 29/07/2009.

⁶⁵⁰ Interview with master trader, Bujumbura, 17/03/2010.

⁶⁵¹ Interview with trader, Bukavu, 28/07/2009.

"It is a good occupation if you have the financial means and if you are honest. There are many dishonest people in this business, thieves. They are too capitalist. But if you are honest, you see, otherwise I would not have been able to build my house, or to study. If they pay me a salary of USD 500, how can I provide for my family? But with this work, if you have some gold worth USD 20,000, you can easily make USD 3,000 or 4,000 profit"⁶⁵².

"If I have learnt one thing in this business, it is that the ones who are cheating will not progress. They go bankrupt"⁶⁵³.

"The secret of attracting suppliers is to be honest. I am honest in my weighing and pricing, and therefore people come to sell here"⁶⁵⁴.

"Personally I had a client in Butembo who brought me gold worth USD 500 to 600,000. He left it with me and went on. Sometimes he told me: don't give me the money yet, in one month I will call and instruct you where to send the money to. It is really a matter of trust. We played the role of a bank at the time. [This matter of trust, is it something typical for the gold sector?] Yes it really is typical for the gold business. [What is so important about it?] It is a matter of honesty, to pay a fair price to someone, and to pay him for goods he had delivered. Take for example the Belgian who was here and who has been kicked out: if you entered his office as a small businessman, he was sitting there, behind a blacked out desk, there was no direct contact and two German shepherds were sitting beside him. If the trader asked him how much he was going to pay for his gold, he said USD 100. Then he went on to purify and said: 'Your gold is not pure enough; I can give you only 85'. The supplier wanted to take his gold back and present it in another comptoir, but the Belgian demanded USD 200 for the purifying process alone. That is not an honest way of working. You need to work in a transparent way, to purify the gold in the supplier's presence, to negotiate and come to an agreement"⁶⁵⁵.

As I already said the gold business takes place in an extended network tying all these people to one another. A master trader in Bujumbura for example said:

"This business is a network ('un réseautage'). [...] You can only work if you know it inside out. You have to infiltrate"⁶⁵⁶.

His words again underscore the importance of building relationships. But contrary to what this statement might suggest, these networks are not hermetically closed. Both miners and traders have the freedom to make transactions with other people, as long as they respect their clientelist relationship as well. This means that they continue to bring (a part of) the production to the creditor or to give (small or larger) credits to the miner. Both at the local level and at the level of regional trade examples were found of people who, despite the fact that they had taken a loan from someone, made transactions with other traders as well, because the latter offered a better price: "A client can still go elsewhere to see whether they

⁶⁵² Interview with trader, Bukavu, 08/02/2011.

⁶⁵³ Interview with trader, Bukavu, 04/01/2011.

⁶⁵⁴ Interview with trader, Bukavu, 24/07/2009; interview with trader, Kamituga, 11/08/2009; interview with commission agent, Kamituga, 12/08/2009.

 $^{^{655}}_{\rm err}$ Interview with former master trader, Bujumbura, 23/03/2010 .

⁶⁵⁶ Interview with master trader, Bujumbura, 17/03/2010.

will give him a better price"⁶⁵⁷. Another indication of this is the fact that buying offices in Kamituga's main street attract clients with boards advertising "here we buy gold" ("ici achat d'or") or "gold for a good price" ("or bey nzuri"). This suggests that although many transactions are based on personalised supplier-buyer relations, there is still room for transactions beyond these relations, so for a certain deviance from the norm. If all economic transactions were to be confined to already established bilateral links, there would not be so much need for advertisement appealing to new clients.

In conclusion it can be argued that for traders trust is a way to decrease their transaction costs and find guarantees for successful future transactions. In order to understand why this is so crucial, I must refer back to some of the points that were raised in part one and two. First, engagement in this sector is a way to escape from state intervention, which is considered to be illegitimate as it only implies more taxation and control. Traders frequently complain about the multiplicity of taxes (harassment or 'tracasseries'), for which they see no redistribution. They would surely be willing to pay, provided that the state was to dispense public services in return. This relates to earlier discussions on the 'moral economy' and legal rights-based mechanisms⁶⁵⁸. Nevertheless, traders are constantly moving between unofficial and official ways of doing business. On the one hand, they are reluctant to formalise because of a limited confidence in the state. But at the same time they may decide to comply with some official regulations in order to avoid trouble. They may, for example, register part of their production, just in order to avoid excessive state interference. Second, there is hardly any public infrastructure in the mines, of any kind: roads are bad, flights are expensive, electricity is insecure, water is scarce, banking facilities are absent and so on. Besides there is still a lot of insecurity. Traders are afraid of being robbed at home⁶⁵⁹ or along the roads on which they travel. They usually hold a lot of cash money and when they travel, they prefer to hide their cash and their commodities (which is easy for gold, at least much easier than for cassiterite, coltan or copper). In other words, it can be concluded that the space in which traders operate is highly insecure. Therefore they prefer doing business 'on the quiet' and with trusted partners only. They seek proximity (through commission agents and through personalised relations) in order to reduce uncertainties in these relatively remote and insecure spaces. Moreover, the social, moral and professional norms regulating their transactions increase predictability. But as I have said trust can be violated and there are definitely incentives for cheating. A miner for example may run away and leave his shaft and his debts behind. This may be difficult in a situation where your background and your family are known by the creditor. It is easier if you are a migrant in the mining site, if the creditor won't be able to find you and you can go back to your family. Similarly, traders have the possibility to 'walk away'. Commission agents may leave with the money of their 'patron'. But in both cases, this will ruin their reputation and undo their chances of working in the mining sector. In the next section I will further analyse this and illustrate it with a few cases.

⁶⁵⁷ Interview with commission agent, Kamituga, 07/08/2009; interview with trader, Bukavu, 29/07/2009; interview with trader, Bukavu, 04/01/2011.

⁶⁵⁸ See Bryceson (2010: 16) and Grätz (2004: 151) for similar arguments.

⁶⁵⁹ Interview with trader, Bukavu, 28/07/2009.

9.4. PROFESSIONAL NORMS: SANCTIONING

The credits under discussion are not 'formalised', in the sense of officially recognised and legally enforceable. When asked whether they 'write down the agreement', trading agents said they did not. Certainly for small amounts there is no written agreement. Yet all traders keep a record of their outstanding credits and thus establish a considerable level of control as well. They write them down in a notebook, in order "not to forget"⁶⁶⁰. But this is also another way to reduce uncertainties and to respond to the distrust mechanism. Commission agents make notes of the small credits in order to justify their expenses to their boss and to keep the accounts⁶⁶¹, because small amounts may become large debts in the long run:

"There is no writing, because if you find someone with a USD 1000 debt, he did not borrow that amount at once. Today he comes and asks USD 5, tomorrow he comes back, the work is not going well, and he needs another sum. He is a client. The next day he can come with 5 g of gold, but then he might borrow another USD 10. And thus the amount becomes larger, until you realise you are at USD 1000. There are no receipts. [...] Those small amounts, you just write them in your notebook"⁶⁶².

Yet sometimes both parties do sign a written agreement. This may happen in the case of larger investments⁶⁶³, or when the trader and the miner do not know each other very well (yet)⁶⁶⁴:

"If I know that he has already found some gold and he asks me money to process his production for example, I cannot write it down because I know that he will bring me something. But if he has no production yet, it is better to write a document"⁶⁶⁵.

Another possibility is to make an oral convention in front of a witness, like for example a customary chief. This way you can make your agreement official, but "leave pen and paper behind"⁶⁶⁶. A written agreement may also be required when problems arise between the two parties⁶⁶⁷: "When he starts to hide away from us, we ask him to make an agreement"⁶⁶⁸.

A mining project that fails is indeed no exception. It can happen because of internal reasons – no reserves, no output - or because of external factors. Changes at the national (state intervention) or at the global level (price fluctuations), or changes in accessibility or security may seriously affect production. But even when debtors are clearly not able to reimburse, the relationship will not be easily ended, since both parties need each other if they want to have any hope of having some output in the future:

⁶⁶¹ Interview with trader, Kamituga, 08/2009.

⁶⁶⁰ Interview with commission agent, Kamituga, 11/08/2009; interview with loutrier, Kamituga, 19/08/2009; interview with trader, Kamituga, 14/08/2009; interview with commission agent, Kamituga, 11/08/2009; interview with loutrier, Kamituga, 09/2009; interview with trader, Kamituga, 07/08/2009.

⁶⁶² Interview with commission agent, Kamituga, 14/08/2009.

⁶⁶³ Interview with trader, Kamituga, 12/08/2009; interview with commission agent, Kamituga, 20/08/2009; interview with commission agent, Kamituga, 07/08/2009.

⁶⁶⁴ Interview with trader, Kamituga, 13/08/2009.

⁶⁶⁵ Interview with commission agent, Kamituga, 08/2009.

⁶⁶⁶ Interview with commission agent, Kamituga, 17/08/2009.

⁶⁶⁷ Interview with trader, Kamituga, 08/2009.

⁶⁶⁸ Interview with trader, Kamituga, 19/08/2009.

"Once you have granted someone the money to buy some fuel, batteries or other tools, and the shaft is not producing, you cannot blame him. The shaft has in a way become a shared property. If we continue to be on speaking terms and follow up on the evolution of the work together, then there is no problem, we will continue until the end"⁶⁶⁹.

This is exactly the incentive for maintaining the relationship, as was pointed out in section 9.1. Even when it takes an extremely long time for a shaft to enter the production stage, the trader will not easily withdraw his financial support:

"If he fails to produce you may even want to kill him. But even if he borrowed USD 1000 or 10,000, you cannot but be patient until he finds something"⁶⁷⁰.

Even more, "you rather have to make a bigger effort and increase the investment"⁶⁷¹. Only then will the shaft start producing again:

"Traders have a lot of outstanding credits, there is so much money invested in the shafts. And if the shaft does not produce, the money is gone. You can summon the debtor before court, but he will say that he did not embezzle the money, that it is the fault of the shaft. He will probably ask you for even more money, saying that he needs to do more investments in order to be able to produce⁶⁷²".

This engagement thus requires a lot of patience, "until God blesses us so that he finds and pays us; we are patient"⁶⁷³. But traders are certainly not passively watching and waiting for their investments to become profitable. They also supervise the works in the mining shafts. They often go on-site in order to verify how the works are proceeding⁶⁷⁴. Some even hire someone to supervise the mining activities⁶⁷⁵. These observations again bring up a discussion that featured in chapter eight on the relative importance of luck on the one hand and rationality on the other hand. Whereas miners' statements often referred to extraction projects as 'a matter of luck' in finding a rich gold vein or not – and this certainly plays a major role – my analysis indicated that experience and rational calculations matter as well for the outcome of a project. Moreover, this outcome seems to depend a lot on the availability of financial capital to invest in the mines and to overcome a number of technical and material constraints. The present chapter again evidences the importance of access to financial capital and the way in which this access is established, namely through the creation and maintenance of social relations.

But these social relations may be destabilised if one of the parties breaks the agreement. A local trader, asked about deceivers, told us the following:

"They are many! A first case was a shaft near Kilobozi. This shaft manager had become my 'honourable client'. At a certain moment he had a dispute with one of his workmates. This colleague now summons him in court. Well, I have supported my client in this trial, because you

⁶⁶⁹ Interview with commission agent, Kamituga, 07/08/2009.

⁶⁷⁰ Interview with trader, Kamituga, 08/2009.

⁶⁷¹ Interview with commission agent, Kamituga, 08/2009.

⁶⁷² Interview with commission agent, Kamituga, 11/08/2009.

⁶⁷³ Interview with trader, Kamituga, 12/08/2009.

⁶⁷⁴ Interview with commission agent, Kamituga, 07/08/2009.

⁶⁷⁵ Interview with trader, Kamituga, 08/2009; interview with miner, Kamituga, 01/2011.

know here in the DRC you need money to win a case [...] So when the case was brought before the mining police, the dispute was really going bad. He started to take even more money from me to pay for the legal costs... up to a debt of 4 tolas, so about USD 1400 [in Kamituga a tola was worth USD 300 to 350 in 2009]. But his production has fallen ever since. Today he keeps hiding from me. We don't get along anymore. This was the first case. A second case is K. He has owed me money for about three years. I have already given him material support [tools and so on] worth 18 tolas. But with his limited production he is not able to repay these investments. But we still get along very well because he brings me whatever he has [small quantities]"⁶⁷⁶.

The last sentence emphasises the value that is put on the long-term relationship and exemplifies the delicate mixture of affective and instrumentalist friendship: as long as there is at least the intention to continue the collaboration, the relation will not simply be broken. But there are many stories about cheating. In Bukavu, for example, famous stories are told about traders who 'ran away' with other traders' money:

"One master trader in Bujumbura lent someone USD 85,000, and what did the man do? He bought a nice house in Bukavu with that money and went to tell his financier that the money was lost. It is unbelievable!"⁶⁷⁷.

"Once I was a victim of a fraud ('escroquerie'). But it was not only me, many traders were involved. The owner of the comptoir S. one day disappeared with the money of many traders. We had put our material at his disposal, but he told us he did not have the money at that moment, and that he would pay us later. But he ran with the gold. Until now we haven't received any compensation"⁶⁷⁸.

"[We have heard about a comptoir, S., that ran away with the money of gold traders, have you heard of this?] Yes, I was among the victims. It has been several years now since they promised that they would pay us back, but they never did. People are tired of waiting and talking about it"⁶⁷⁹.

Also in the mining sites small traders frequently complain about clients who do not honour their obligations⁶⁸⁰. "Some people abuse your trust: they go and sell at someone else's place"⁶⁸¹, they said, or other debtors "just pack their things at night and flee"⁶⁸². Commission agents may misappropriate the funds they received from their boss to work with:

"I opened this office in Kamituga in 1997 or 1998, in the middle of the war. At the time I had USD 8000 of working capital, which was a lot. But the agent who was working in this office granted a lot of credits to miners and lost USD 5000, so I was left with 3000. In order to restart

⁶⁷⁶ Interview with trader, Kamituga, 12/08/2009.

⁶⁷⁷ Interview with trader, Kamituga, 06/01/2011.

⁶⁷⁸ Interview with trader, Bukavu, 24/07/2009

⁶⁷⁹ Interview with trader, Bukavu, 28/07/2009

⁶⁸⁰ Interview with commission agent, Kamituga, 08/08/2009; interview with commission agent, Kamituga, 10/08/2009; interview with loutrier, Kamituga, 08/2009.

⁶⁸¹ Interview with commission agent, Kamituga, 07/08/2009; interview with commission agent, Kamituga, 08/2009.

⁶⁸² Interview with commission agent, Lugushwa, 26/01/2011.

my business I added another USD 1000 and sent another agent over there. But he also lost USD 2800. Eventually I was obliged to go over there $myself^{\%683}$.

So in the absence of formal contracts, what are the sanctioning mechanisms the traders have at their disposal? Asked about their options to deal with this kind of behaviour, some traders responded that there is not much they can do: "You can only regret"⁶⁸⁴, "you just need to be patient"⁶⁸⁵ or "just let it go. It often happens that money disappears like that"⁶⁸⁶. Yet further examination reveals that traders do take action against these fraud cases and that they do this in different steps: "You don't immediately go to court, you first try to talk and negotiate"⁶⁸⁷. Another trader added:

"As a first step you should talk to him. If he does not respect your conventions, you must call him, talk to him and ask him to sign a receipt. If he agrees to that, it will be fine. If he has something to give as a collateral, that is another possibility. The last recourse is to go to court, because often there you won't find the solution either. [Is there a justice system in the DRC?] Here in Kamituga in any case there is none"⁶⁸⁸.

In other words, if problems start to arise, traders first try to make a written agreement, as was already indicated before. In addition, or instead of signing a receipt, a creditor may also accept collateral from the debtor⁶⁸⁹. This is not officially regulated, but it is common practice in the mining sites, as the following quotes demonstrate:

"If they don't find [gold], your money is lost. But when they have something, some goods at home: a radio, a television, stereo, they can say: as I am unable to pay, ok, take this. If they don't have, your money will be lost forever"⁶⁹⁰.

"You can make an arrangement, can't you? And if he lacks USD 50 but he has something to give you instead, a radio for example, you can take it. You have to understand each other"⁶⁹¹.

In some buying offices in Kamituga, you can indeed find a wide array of electronic equipment, which have been given as collateral. In more extreme cases, creditors threaten to confiscate the debtor's house⁶⁹². If these sanctioning mechanisms do not work, one could think of bringing the debtor to court. Yet this seems to be difficult in the absence of formal contracts. Judges may decide that there is no legal basis for the credit⁶⁹³. Besides, the justice system has a reputation of being corrupt and unreliable. Many traders complained that they cannot rely on the court or the police⁶⁹⁴. The judges, judicial officers and policemen are easy to corrupt:

⁶⁸³ Interview with trader, Bukavu, 06/01/2011.

⁶⁸⁴ Interview with commission agent, Kamituga, 11/08/2009.

⁶⁸⁵ Interview with loutrier, Kamituga, 18/08/2009.

⁶⁸⁶ Interview with commission agent, Kamituga, 08/08/2009.

⁶⁸⁷ Interview with trader, Bukavu, 28/07/2009.

⁶⁸⁸ Interview with commission agent, Kamituga, 12/08/2009.

⁶⁸⁹ Interview with commission agent, Kamituga, 11/08/2009; interview with commission agent, Kamituga, 20/08/2009.

⁶⁹⁰ Interview with commission agent, Kamituga, 13/08/2009.

⁶⁹¹ Interview with trader, Kamituga, 21/08/2009.

⁶⁹² Interview with loutrier, Kamituga, 08/2009; interview with trader, Bukavu, 31/07/2009.

⁶⁹³ Interview with trader, Kamituga, 12/08/2009.

⁶⁹⁴ Interview with commission agent, Kamituga, 10/08/2009; interview with commission agent, Kamituga, 08/2009.

"These judges will start to ask you money themselves, this is Congo!" ⁶⁹⁵

"When you summon the debtor to court, he will corrupt the judicial officers. Besides, the state does not exist here. You can take someone to the police. The commander will reassure you that they will arrest him, but after you leave, the police will be corrupted and set the detainee free"⁶⁹⁶.

"You may have a dispute with someone, and he immediately runs to the solicitor. When you want to summon him to court, you'll find that the solicitor and the police commander have already become his friends"⁶⁹⁷.

Other traders say that the small amounts that are often claimed are not even worth the effort⁶⁹⁸ or that in any case you will not see your money back, because the debtor has nothing that can be taken from him⁶⁹⁹:

"Can I leave this office and waste my time in court for USD 50? The answer is no!"⁷⁰⁰. "Putting someone in prison here is not worth the effort, you tire yourself out for no reason"⁷⁰¹.

A fourth possible sanction, apart from written guarantees, collateral and court cases, is the refusal to grant credit to individuals with a bad reputation (Clay, 1997: 508). This 'reputation mechanism' is an incentive for people to behave in a reliable and honest way, for they could lose the benefits of future exchange if they cheat (Kranton, 1996: 831). But it also affects their social position and trustworthiness in the business. In the case of the gold trade this is illustrated by the following quotes:

"[So you ask no written guarantees? And what if afterwards he goes somewhere else?] That is his problem then. He will lose, because he will not be able to rely on you anymore in the future"⁷⁰².

"If I do not live up to my promises, I know I destroy my own work"⁷⁰³.

The use of reputation as a sanctioning mechanism has been extensively described in the literature (Platteau, 2000: 241; Greif, 2006: 86). In the context of long distance trade between Central Africa and Europe, MacGaffey and Bazenguissa-Ganga (2000: 124) found this sanction to be relatively weak, in any case if compared to sanctions among for example West African traders, where religious sanctions may lead to ostracism from business as well as from the entire community. In the international and urbanised context the authors were studying, it

⁶⁹⁵ Interview with commission agent, Kamituga, 11/08/2009.

⁶⁹⁶ Interview with commission agent, Kamituga, 13/08/2009.

⁶⁹⁷ Interview with trader, Kamituga, 12/08/2009.

⁶⁹⁸ Interview with trader, Kamituga, 21/08/2009; interview with trader, Kamituga, 23/08/2009; interview with commission agent, Kamituga, 08/2009. Cleaver (2001: 34) said: "very few cases of conflicts over resources reaching court, reflecting a strong desire amongst people to resolve these at the lowest possible level".

⁶⁹⁹ Interview with trader, Kamituga, 14/08/2009; interview with commission agent, Kamituga, 07/08/2009.

⁷⁰⁰ Interview with commission agent, Kamituga, 12/08/2009.

⁷⁰¹ Interview with loutrier, Kamituga, 19/08/2009.

⁷⁰² Interview with commission agent, Bukavu, 27/07/2009.

⁷⁰³ Interview with trader, Kamituga, 28/07/2009.

was more difficult to exclude individuals from the community and thus completely ostracise them. Yet MacGaffey and Bazenguissa-Ganga (idem: 125) described a number of strategies that were used for enforcing compliance. The first was a "mourning ceremony for one's money", in which creditors went to the debtor's house and made a big fuss, loudly complaining about the outstanding debts and thereby damaging a trader's professional reputation. If this strategy failed, creditors may have resorted to violent enforcement with the help of a 'strongman' (idem). The latter may well be applied in the gold trading network as well, but I have no reports of particular cases of violence. Just like in the case of the transcontinental trade, ostracism or exclusion from the entire community is difficult in the gold trade because miners and traders can easily move to other places. Yet their professional reputation in the gold business may be ruined if they cheat. And since the gold trading network has connections across different places, mines and trading hubs, the possibility that a deceiver will not be able to remain active in the gold sector is quite big. In any case the interview material suggests that among all the instruments available (written guarantees, collateral and court cases), the reputation mechanism is the strongest.

9.5. CONCLUSION

This chapter provides an analysis of relational access mechanisms used by miners and traders to negotiate their access to financial capital (miners need financiers to invest in the shafts) and to the market (miners need to sell their products and traders need a steady supply of gold). The analysis leads to a number of conclusions on agency, power relations and norms.

The personal relationships under study are not void of power imbalances. As Cleaver (2001: 28) noted, "socially embedded forms of interaction also strongly reflect prevailing distributions of power". Indeed, a situation of indebtedness implies that the debtor becomes obliged and in a way subordinate to the creditor. So the latter is supposed to be in control. Yet as I said, miners have possibilities for cheating, embezzling money, running away or selling to another trader. Sometimes this behaviour is sanctioned – with sanctioning mechanisms varying from negotiations or compromises over collateral and court to reputation - but it may also be tolerated, albeit within reasonable limits. Moreover the debtor's bargaining position may be strengthened if he has a significant quantity on offer, or if the creditor is in short supply. In this sense the creditor is also dependent on the debtor, his supplier. All this suggests that indeed, individuals hold bundles of powers including both mechanisms for access maintenance and control. Actors at the bottom of the 'commodity chain' are not necessarily powerless. Whereas some actors have incentives to act in an oppressive way, others have incentives to cheat. However, all these incentives are balanced by the mutual dependency and the long-term relationships that need to be protected. In the long run it is more beneficial to cooperate than to disrupt the relationship because all actors in the network are taking smaller or greater risks, which render all actors quite vulnerable.

The development of professional norms in the gold sector proves that it is characterised by a significant degree of organisational coherence, in contrast to what the often used term 'informal' suggests. These professional norms deal with a number of challenges that are inherent to gold mining, such as shortages in supplies, needs for investment and incentives for cheating. But they also facilitate interaction and transactions in the particular institutional

context of South Kivu by introducing some certainty and predictability. For example, credit and debt relationships depend on repeated interaction through which business ties may evolve into friendship, which apart from a purely commercial and instrumentalist dimension also has an emotional, affective dimension. This is captured under the notion of 'honourable clients', people who have 'earned' trust by having acted in an honest and reliable way throughout repeated transactions and about whom traders speak with much appreciation. Yet honesty is also a necessary condition for doing business in gold, which means that it is part of a professional norm and work ethic. The same goes for trust, which is a way of seeking proximity and certainty. Through repeated interaction, creating a familiar context in which trust can emerge, traders seek to reduce their transaction costs and find guarantees for successful future transactions. Their engagement in this sector can also be considered a way to avoid illegitimate state intervention. Yet traders may partly comply with official requirements, again in order to avoid trouble and thus handily move between official and non-official ways of doing business. This way of handling the gold also helps them deal with the insecure institutional and infrastructural environment. Trust is thus necessary to 'survive' in this context, leading Meagher (2010: 79) to the observation that "in the face of extreme pressure on markets and livelihoods, the line between trust and desperation has become increasingly blurred". Following up on this observation I argue that the gold network has developed norms in order to deal with internal pressures on the gold market. Still, in the face of external pressures access may come under serious pressure and miners and small traders may need to renegotiate it. However, they do not necessarily have the right instruments to benefit from this renegotiation, as will become clear in part four.

"Nous palpions cet or avec bonheur, convaincus que les *placers* n'étaient pas une chimère, mais bien une brillante et sonnante réalité. Pour sûr, nous allions bientôt tous faire fortune et Dieu sait quels châteaux nous bâtissons en Espagne!" (p.102).

> "We happily collected the gold, convinced that the placers were not an utopia anymore, but a shiny and resounding reality. We would make our fortune soon and God knows which castles we were going to build in Spain!" (p.102).

Having studied access mechanisms at the level of the mining sites this chapter examines access at different levels in the gold trade and starts from the question how traders benefit from gold trading activities⁷⁰⁴. The 'gold value chain' is often presented in a simplified way as a set of well-delineated actors and a commodity moving in a well-determined direction: from the mining shaft to the end consumer, such as in figure 25. Yet as Dan Fahey (2008) already stated in an article on gold in Ituri, the metaphor of a river or a flow is actually more appropriate to understand the dynamic processes at work. In reality, there is no 'chain' consisting of solid connections between actors and spaces. Instead, the gold trade can be seen as a complex flow involving a multitude of actors and relations, norms, negotiations and manipulations. Figure 25 already indicates that the value added from producers to the end consumers is small (about 14 percent). This has a number of consequences that will be dealt with in the chapter.

Figure 25. Simplified gold value chain (the price data are based on the author's calculations as from October 2011, which will be explained in section 10.1.1)



Source: Author's own presentation

Analytically the chapter focuses on access and thereby brings in issues of power, agency and norms. As was said before, one of the main characteristics of this trade is that an estimated 98 percent of it is unrecorded and hence has been qualified as part of the 'informal sector'. Going back to the debate on 'informality' (section 1.3), which has evolved from 'fending for oneself' and 'disengagement' accounts to 'power (ab)use' and 'criminalisation', researchers now concentrate on the following central question: can engagement in the gold trade be considered as a 'weapon of the weak', allowing marginalised and subordinate actors to survive and even accumulate outside of the oppressing, or ill-functioning, framework of the state; or as a 'weapon of the strong', providing wealthy and powerful actors with opportunities for

⁷⁰⁴ There are surprisingly few academic studies on the gold trade and its micro-functioning. Apart from many historical studies, for example on the gold trade in Ghana (Ashanti), Mali, Sudan or the Trans-Saharan gold trade; there are almost no detailed and local-level studies of contemporary gold trade, but see Grätz (2004; 2009) on West Africa (Benin).

private rent-seeking at the expense of the marginalised groups in society, or even for 'criminalisation of the state'. Yet an access analysis shows that this distinction may not be that helpful, as access mechanisms are used by and 'work for' particular actors in different ways.

The chapter pays attention to the practices of different groups of traders ('négociants' in French). While the boundaries between these categories are undoubtedly fluid, I will talk about 'small traders' (who may work independently or be tied to a particular larger trader), 'commission agents' (who work with financial capital provided by a larger trader), 'buying offices' ('maisons d'achat' in French, where gold is sold), 'bosses' (larger traders who own buying offices, 'patrons' in French), 'master traders' (larger traders buying considerable quantities and exporting and/or smuggling gold) and 'export offices' (officially registered 'comptoirs'). My analysis will also cut through the distinct geographical 'levels' and acknowledge the multiple links between them. The terms 'local', 'provincial'⁷⁰⁵, 'regional' and 'global' are used so as to allow the readers to better situate themselves in the 'flow' of gold in section 10.1. However, I want to stress that this distinction is merely functional and not analytical. The empirical account will also be richer for the local and provincial levels, since that is where I have done most of my research, while regional and global aspects of the gold trade have been studied elsewhere, notably in the reports by the UN Group of Experts, OECD and international NGOs. The access analysis in section 10.2 includes access to markets (10.2.1), to financial capital (10.2.2), to vertical relations with power holders (10.2.3), to horizontal relations between supplier and buyer (10.2.4), to information about prices (10.2.5), to technology (10.2.6), to trickery (10.2.7), to smuggling (10.2.8), to foreign currency (10.2.9), to alternative markets (10.2.10) and to the state regulatory framework (10.2.11).

10.1. GOLD TRADE FROM THE LOCAL TO THE GLOBAL

First I describe how the gold 'flows' from the mines to the world market and which actors are involved at each level.

10.1.1. Local gold trade

Small gold traders can be found in and around all mining sites in South Kivu. There are different categories of gold buyers though. Some are mobile and hang around near the shafts or pits, waiting for someone to offer them gold concentrate or actively searching for the pits with the best production. Others are more resident and open up so-called 'maisons d'achat' or buying offices. In Mukungwe most traders are mobile. They may stay in Maroc for a while and then move on to neighbouring mines or to Bukavu to sell their purchases. They live in temporary sheds and rarely have established buying offices. The 'managers' as they are locally called, buy bags of sand ('makaru') from the miners and proceed to process them with the help of 'twangeurs' and 'panneurs', in order to obtain the gold concentrate⁷⁰⁶. In Kamituga the situation is different. Here you can find about 17 large and 70 small buying offices⁷⁰⁷. The

⁷⁰⁵ I use provincial and not national since I am restricting this study to South Kivu and Bukavu as a hub. Apart from this, gold also flows through Bunia (Oriental Province) and Goma (North Kivu), but those circuits will not be discussed. From Bukavu, the provincial capital, the gold flows directly to Bujumbura or Kampala, so to the region. ⁷⁰⁶ Group interview with traders and miners, Mukungwe, 01/06/2012.

⁷⁰⁷ Figures as from August 2009. I managed to identify at least 80 percent of all operational buying offices in Kamituga and in Lugushwa. I did not identify the local traders who are operating besides the buying offices and

largest offices, where considerable volumes of gold are traded, are to be found in wooden and stone sheds alongside the main road. Smaller gold buying offices may be situated on the same main road, while others are located in the narrow lanes of popular neighbourhoods. In Lugushwa I identified about 50 buying offices⁷⁰⁸, which function in approximately the same way as the ones in Kamituga. As argued before, the particular institutional context and resulting (in)security may explain why traders are either mobile (Mukungwe) or rather resident (Kamituga).

The prices of gold at these local markets keep up with the world market price, which significantly increased over the last decade, but fell in 2013. Between 2003 and 2012 it increased by 18 percent per year on average, but in the first half of 2013 it decreased again by 17 percent⁷⁰⁹. The price, set on the London gold market, is expressed in USD/ troy ounce whereby one troy ounce equals 31.1034768 grammes⁷¹⁰. On the basis of this 'fixing' a standard formula (table 17) can be applied to calculate prices at the regional, provincial and local level⁷¹¹. As the remainder of this chapter will make clear, however, this formula is applied by traders with the knowledge about it, but it is not utilised as such by most provincial and local gold traders. It can thus be considered as a 'model'. Let us take an example from October 2011, when the London gold price was USD 1682/ troy ounce or USD 54.08/gramme. On the Dubai market the price would then have been USD 51.19/gramme; in Bujumbura USD 49.67/gramme; in Bukavu USD 48.76/gramme; and in Kamituga USD 46.86/gramme⁷¹².

combining the purchase of gold with other economic activities, such as the women at the market. The differentiation between 'big' and 'small' offices is made on the basis of different pieces of information obtained during fieldwork: over 70 interviews with local traders (asking people to mention the 'big traders' in town), a survey carried out among 20 buying offices in Kamituga, interviews with local state agents and observations. The 'size' of a buying office must be understood in terms of purchased volumes. Official data from local bureau of the Mining Division, 09/2009.

⁷⁰⁸ Figures as from January 2011, a period during which many of them were not operational though because of the mining ban.

⁷⁰⁹ See http://www.goldprice.org.

⁷¹⁰ See http://www.lbma.org.uk/london/mktbasics.

⁷¹¹ Interview with trader, Bukavu. Interview with former master trader, Bujumbura, 18/02/2011.

⁷¹² In Bukavu, one tola thus consists of 8 renge. In the mining sites however, the weight of one tola is conventional and is said to be 10 renge. Thus, the real weight of one tola would be 14.4 grammes. This explains why in the table, the price per tola in Kamituga is higher than the price in Bukavu. Yet the price per unit (gramme) is lower.

| LONDON GOLD FIXING (example of 13/10/2011) | | | |
|--|--|--|--|
| USD 1682 / troy ounce | 1 troy ounce= 31.103 grammes | | |
| 1682 / 31.103= USD 54.08 / gramme | | | |
| | | | |
| DUBAI MARKET | | | |
| 1682 – 6 =1676 | Conventional (profit, varies acc. to | | |
| | quantity) | | |
| 1676/ 31,1035 = 53.88 | 1 troy ounce= 31.103 grammes | | |
| 53.88 x 0,95 = 51.19 | If grade is for ex. 95% | | |
| USD 51.19 /gramme | | | |
| COMPTOIR BUJUMBURA | | | |
| 1682 - 5 = 1677 | Conventional (profit of comptoir, | | |
| | varies acc. to quantity) | | |
| 1677 / 2.845 = 589.455 | Conventional | | |
| 589.455 x 95 = 55,998.242 | If grade is for ex. 95% | | |
| 55,998.242 / 95.5 = 586.37 | Conventional | | |
| 586.37 – 7 = 579.37 | Conventional (profit of comptoir, | | |
| | varies acc. to quantity) | | |
| 579.37 / 11.664 = 49.67 | Tola / 11.664= gramme | | |
| USD 49.67 /gramme | | | |
| | | | |
| COMPTOIR BUKAVU | | | |
| 1682 / 2.845 = 591.21 | Conventional | | |
| 591.21 x 93 = 549,982.776 | If grade is for ex. 93% | | |
| 549,982.776 / 95.5 = 575.736 | Conventional | | |
| 575.736 -7 = 568.736 | Conventional (profit of comptoir, | | |
| | varies acc. to quantity) | | |
| USD 568.736 / tola 568.736 / 11.664= 48.76 | One tola = 8 renge= 8x 1.4 grammes | | |
| USD 48.76 / gramme | | | |
| USD 48.767 gramme | | | |
| MAISON D'ACHAT KAMITUGA | | | |
| 568.736 x 1.22 = 693.86 | Conventional | | |
| 693.86 - 4% = 666.11 | Loss | | |
| 666,11 – 10 = 656.11 | Conventional (profit of the buying office) | | |
| USD 656.11 / tola | One tola= 10 renge = 10x1.4grammes | | |
| USD 46.86 / gramme | | | |
| Source: Author's | colculation | | |

Source: Author's calculation

Many formulas in this table are conventional, such as profits made at different levels. The losses made because of impurities in the gold should also be taken into account in the calculations. With respect to the grades or purity, there are standards corresponding to the different sites of origin which are based on the traders' longstanding experience⁷¹³. These standards more or less correlate with the average grades, for example the gold concentrate from Kamituga is said to be about 92 to 93 percent pure, from Lugushwa 96 to 97 percent⁷¹⁴. Nevertheless, there is a potential for error margins of several percentage points. In addition, purity is determined by simple visual inspection, which may of course result in some variation too.

⁷¹³ Personal communication, Paris, 02/05/2013.

⁷¹⁴ Interview with trader, Bukavu, 08/02/2011.

In the table the standardised measure of USD per gramme is used. Locally, however, different measures are utilised (see table 18) and traders work with manual scales. The tola is a traditional South Asian unit of measurement that has now been standardised as 11.6638083 grammes or 3/8 troy ounce⁷¹⁵. It was in use in British India, as well as in Zanzibar, from where it spread over the whole of eastern Africa to measure gold and silver. In Bukavu, the tola is the measure of reference and prices are usually expressed in USD per tola, which is equal to 11.664 grammes (rounded). At the local markets the renge is generally used as the standard unit of measurement. As a weight instrument, traders use a 1 franc coin dating from the colonial period, the 'kitchele'. Its conventional weight is 1.26 grammes (somewhat over one tenth of a tola), but its actual weight may go up to 1.4 grammes (somewhat over one eighth of a tola)⁷¹⁶. As I argue later this is a very important point: it means that traders actually buy more than what they pay for and it relates to a number of access mechanisms that I will discuss in more detail. As table 18 and figures 26-27 show traders use a range of weight instruments, including a range of coins, matchsticks and toothpicks. Apart from the tola and the renge as units of measurement, they also handle kanta, half a renge, and mishale, one tenth of a renge.

| Unit of | Approximate | Weight instrument | | |
|---------------|-------------|---|--|--|
| measurement | weight | | | |
| Mishale | 0.14 | 1 match stick or 1 tooth pick | | |
| 2 Mishale | 0.28 | cover of a galvanic battery | | |
| Kanta (half a | 0.7 | 10 sengi (1/100 franc congolais - Belgian | | |
| renge) | | Congo) | | |
| Renge | 1.4 | 1F (one franc congolais 'kitchele' ⁷¹⁷ - | | |
| | | Belgian Congo) | | |
| Renge-Kanta | 2.1 | 5F (five franc congolais - Belgian Congo) | | |
| 4 Renge-Kanta | 6.3 | 5K (five makuta - Zaire) | | |
| 9 Renge | 12.6 | 20K (twenty makuta - Zaire) | | |

Source: Author's representation

10.1.2. Provincial gold trade

In Bukavu hundreds of gold traders are active and they are a heterogeneous group. The smaller ones work in typical small and obscure backrooms in the narrow lanes of popular neighbourhoods like Essence and Buholo. They do not advertise their activities, but suppliers know where to find them: "They just know, they ask around"⁷¹⁸. These traders act as intermediaries between the small traders coming from the mines and the master traders or 'comptoirs' in town. Another category of traders buys the leftovers after the materials have been 'cleaned' at the level of the trading houses:

"If a supplier comes with a quantity of gold he wants to sell, I orient him to the trading house. There the gold is burnt in nitric acid, and in this process some leftovers are produced, which still

⁷¹⁵ Midende, G., *Cours d'économie minière, Unités de poids et de teneurs*.

⁷¹⁶ This was confirmed by the Group of Experts in UN, 2014: annex 67.

⁷¹⁷ In Ituri the term 'kitchele' is also used for indicating the unit of measurement; the 'renge' is not known (UN, 2014: annex 67).

⁷¹⁸ Interview with trader, Bukavu, 28/07/2009. Some discrete asking around by us researchers also led us to them, although suspicion was quite high.

contain minuscule gold particles. Well I buy these leftovers and try to find the tiny bits of gold that are left in there. [What do you do when there is nothing left in the sand?] Then I lose, it's a matter of luck. [How do you process the leftovers?] I wash them with white mercury. You see [he opens his socks], I walk around with my mercury, because mercury makes alloys with gold. That makes it possible to recuperate even the smallest particles. So if I find a couple of mishale, I sell them to the trading houses"⁷¹⁹.

The smaller traders operating at the provincial level may cross the border and sell their gold directly in neighbouring Bujumbura, or they may sell to master traders or export offices in Bukavu. The possibility of smuggling can be considered as an access strategy for smaller traders, as I argue in section 10.2.8. Yet for a number of reasons that will be outlined in section 10.2.1, the provincial flow of gold is very much concentrated in the hands of a small number of master traders. The largest master traders in Bukavu (Buganda Bugalwa, Mange Namuhanda, Bashi Jules) are quite commonly known and have been publicly cited in the successive reports of the UN Group of Experts, which accuse them of continuing to buy gold from areas controlled by various armed groups (UN, 2012: par. 187; UN, 2014: par. 172). They are said to sell their gold respectively to a master trader in Bujumbura (Mutoka Ruyangira) and in Kampala (Rajendra Kumar) (UN, 2012: par. 187).

As for the export offices, over the last decade there have been very few officially registered gold 'comptoirs'. Currently (2012) there are two comptoirs: Mining Congo and Namukaya. Namukaya is the only one that has been registered for several years in a row. Yet the quantities they officially export are relatively low. As table 3 in section 2.3 showed, quantities go down from about 91 kg in 2007, 57 in 2008, 70 in 2009 and 30 in 2010 to 23 kg in 2011. In the latter two years the effect of the mining ban imposed by the government can obviously be seen. Still, these official figures stand in sharp contrast to the real estimated exports from South Kivu. From this observation we thus need to derive the hypothesis that most of the gold trade is taking place unofficially. Several sources – in UN reports and in interviews – confirm that Namukaya's owner, Evariste Shamamba, is also involved in this circuit, smuggling gold across the border to Bujumbura and Kampala in order to take advantage of tax incentives. The fact though that his business also operates under an official license is a good illustration of the constant entanglement of 'formal' and 'informal' spheres I already indicated. On the one hand, traders do purchase official permits and comply with the official regulations to a certain extent, because it offers them some security and protection. On the other hand, the nonfavourable tax regime and numerous harassments in the DRC constrain them to smuggle their goods to neighbouring countries in order to make their business profitable.

The career of Evariste Shamamba actually offers a good illustration of the gold business in the region⁷²⁰. In the mid-1990s Shamamba came into contact with the Belgian gold trader Goetz who was operating from Bujumbura and held a near monopoly on the gold trade. He started working for Goetz as a commission agent and quickly learned all the tricks of the gold trade. He also got to know many gold suppliers in Bukavu, as well as customs officials and military who could offer him protection. At the beginning of the second war in 1998, Shamamba made

⁷¹⁹ Interview with trader, Bukavu, 29/07/2009.

⁷²⁰ Evidence for this story was drawn from: Interview at Namukaya, Bukavu, 27/03/2008; interview with trader, Bukavu 28/07/2009; interview with trader, Bukavu, 05/02/2011; interview with trader, Bukavu, 04/01/2011; interview with master trader, Bujumbura, 18/02/2011.

agreements with RCD, who had seized the province of South Kivu, agreeing that he would continue to bring the gold across from Bukavu to Bujumbura under their protection. With his boss he agreed that a share of the profit would be his. In this way he quickly made a lot of money.

Eventually Shamamba set up a branch office for Goetz in Bukavu, which was named 'Congocom'. The same happened in Butembo, where businessman Kisoni Kambala managed the export office and airline Congocom, which were both listed by the UN Sanctions Committee for having violated the arms embargo, until he was murdered in 2007 (UN, 2009: 33; Geenen, 2010: 22; De Koning, 2011: 14). After Goetz got in trouble with the Burundian regime in the mid-1990s, he left the country in 2000 and left Shamamba in charge of Congocom in Bukavu. In 2007 its name was changed to Namukaya. Currently Shamamba reportedly works with his own capital and sells the gold in Kampala or Bujumbura or directly in Dubai. He has been able to accumulate an impressive financial capital and expand his business activities to other sectors, mainly domestic air transport (New Congocom Air) and road service (Ngomo Express). As figure 28 illustrates, through its business Namukaya also sponsors a football team and propagates values like patriotism, equal rights for women, unity, discipline and efficiency. The gold 'comptoir' is still commonly referred to as 'Congocom' despite its official name change. According to two of my respondents about 50 traders are regular suppliers of Namukaya⁷²¹.

10.1.3. Regional gold trade

The regional patterns of the gold trade already emerged in the 1970s⁷²². With the liberalisation of the gold sector in 1982 Mobutu aimed at increasing public revenues by regaining control over the unofficial mining sector and turning it into an official one. Therefore individual Congolese were allowed to apply for licences to trade in minerals and official export offices could purchase and export gold, diamonds and other minerals. However, the result of the liberalisation measures would not be a formalisation of the sector, on the contrary. At the level of the mines, there was a real 'gold rush' as thousands of mainly young men went to try their luck. In trading centers such as Bukavu, groups of traders established their own networks and went to sell in Kampala's or Bujumbura's 'comptoirs' where prices were higher. In the mid-1980s Dupriez (1987: 101) already noted a significant drop in the officially declared gold that was exported from the Bukavu 'comptoirs', meaning that more and more gold was smuggled across the border. Raeymaekers (2007: 81) mentioned how at the end of the 1960s a limited group of independent traders called 'fraudeurs' had emerged in Butembo, North Kivu. In the 1980s they "re-oriented their business on the trafficking of gold between Congo and its eastern neighbours". Gradually they also established cooperation with state and military agents who became complicit and also personally profited from the trade. Under their protection, these Nande traders were able to increase their business and to diversify their activities (idem: 83).

In the early 1980s the gold from eastern DRC primarily flew through Kampala, but after Museveni took power in Uganda in 1986, traders increasingly concentrated their business in

⁷²¹ Interview with trader, Bukavu, 05/01/2011; interview with trader, Bukavu, 04/01/2001.

⁷²² See chapter five.

Bujumbura, Burundi. The attractiveness of Bujumbura as a regional trade hub was enhanced by the introduction of a free-trade regime by President Buyoya in 1992⁷²³ (Nkurunziza and Ngaruko, 2002: 25). Under this 'export processing zone', with tax exemption for precious metals, many foreign buyers of gold, including Indians, Pakistanis, Lebanese, West Africans and Europeans, came to settle in Bujumbura. The gold refinery Affimet owned by Belgian businessman Antoine Goetz was the biggest gold buyer at that moment and had privileged relations with the regime (Belgische Senaat, 2003: 118)⁷²⁴. However, the June 1993 elections in Burundi changed the political landscape and brought a Hutu-dominated government into office. The new regime decided to withdraw Affimet's authorisation to refine and export gold under the export processing zone licence and demanded a restitution of USD 3 million of unpaid taxes. This, of course, irritated powerful people both within the company and within the previous regime who had facilitated the deal and may have been one of the signs for the October 1993 coup and assassination of President Ndadaye (Reyntjens, 1994: 263). After a long procedure before the International Center for the Settlement of Investment Disputes in which Burundi was eventually ordered to pay compensation of USD 2,989,636, Goetz left Burundi in 2000. He remained active in the gold sector and now operates a refinery in Antwerp, Belgium and a buying office in Dubai, United Arab Emirates⁷²⁵. The other export offices that were operational in Bujumbura gradually left after the sanctions regime had been put in place in 1996.

After this much of the gold trade was again reoriented to Kampala⁷²⁶. This central position helped Uganda control and monopolise the minerals trade in large parts of northeastern DRC during the 1998-2003 war, and even after the end of the war (Fahey, 2009). Nowadays gold from Ituri District (through Bunia) flows to Kampala, as well as part of South Kivu's gold production (UN, 2009, 2012 and 2014). Official exports from Uganda went down after the Security Council imposed sanctions on the two largest Ugandan buyers in 2007 (UN, 2014: par. 182). The large buyers however continued their operations illegally (UN, 2014: par. 183-186).

Part of South Kivu's production thus flows to Kampala, part transits via Lake Tanganyika to Tanzania (especially from the south of the province), but a large part also flows to Bujumbura (UN, 2014). In Bujumbura, a variety of big and small gold traders is currently active. In popular neighbourhoods like Bwiza and Buyenzi there are a lot of small jewelry shops ('bijouteries'). In Bwiza there are about 100 of them, mostly owned by Senegalese and other West Africans who have done this work since the early 1980s⁷²⁷. Here small traders from the DRC come and sell their gold – usually small quantities – at prices that are slightly higher than in Bukavu. The jewelers say they also buy domestic production (gold from Cibitoke and Muyinga), but "the

⁷²³ Décret-loi n° 1/30 du 31 août 1992 la République du Burundi.

⁷²⁴ See ICSID (International Center for the Settlement of Investment Disputes) (1999) "Antoine Goetz and others versus Republic of Burundi" (ICSID case no. ARB/95/3). The family also owned an off-shore bank, ABC Bank (closed mid-2000) and an airline, City Connection Airlines (Belgische Senaat, idem) and they operated several buying offices for gold in Congolese mining and trading centers until the late 1990s (personal communication Alain Goetz, 02/05/2013). Between April and July 1993 for example Affimet reportedly exported 1,079 kg of gold worth 12 million USD. Nkurunziza (2002: 11) estimated that every week about 100 kg of gold were processed here. Interview with former master trader, Bujumbura, 23/03/2010; interview with Congolese trader, Bujumbura, 17/03/2010. ⁷²⁵ Personal communication, Paris, 02/05/2013.

⁷²⁶ Interview with former master trader, Bujumbura, 23/03/2010.

⁷²⁷ Interview with jewelry shop owner, Bujumbura, 18/03/2010; interview with former master trader, Bujumbura, 23/03/2010.

better quality gold comes from the DRC"⁷²⁸. They do make jewelry items, but a lot of what they buy is also sold on to master traders or export offices.

In 2010 seven gold export offices were officially registered in Bujumbura, but they officially exported a total of only 129 kg in the first six months of the year⁷²⁹. In 2014 17 comptoirs exported 2,539 kg of gold (UN, 2014: par. 190), so there seems to have been quite a rise in official exports. According to the UN experts, this may be related to the less prominent role played by Mutoka Ruyangira, who since the early 2000's has dominated the gold trade in Bujumbura. Mutoka started his career working for Affimet. Thanks to the contacts he established there, the departure of potential competitors during the war period and the establishment of close relationships with very influential people in Burundi, Mutoka acquired a near monopolistic position⁷³⁰.

"He was already close to the network, so when Affimet was closed, he had the necessary contacts with suppliers. He started to work as a commission agent talking to suppliers and directing them towards other master traders. The latter, however, stopped their business at the start of the war, and Mutoka benefited from that situation. He had the political contacts and he had access to financial capital through his continuing relationship with Goetz, so he granted credits to suppliers and made a lot of money in a short period of time. He used to be the driver, now he is a euro-millionaire"⁷³¹.

After Affimet's closure, Mutoka opened his own export office, Berkenrode, which changed its name in 2011 to Ntahangwa Mining (UN, 2012: 45)⁷³². In 2013 he informed the UN experts that he was no longer involved in gold trade (UN, 2014: par. 191). This has opened up the market for competitors.

The other major regional player, Rwanda, is historically not such an important trading hub for gold from South Kivu, in contrast to other minerals like coltan, cassiterite and wolframite which have for a long time transited through Rwanda. Gold smugglers I interviewed prefer not to travel via Rwanda, although the shortest way between Bukavu and Bujumbura by road is now via Rwanda, since border controls are stricter over there⁷³³. Yet there is one gold trading network that operated and operates through Rwanda, and that is the militarised network, involving RCD during the war period, later RPF and CNDP, and M23 more recently (UN, 2012: 41). This network reportedly feeds a "parallel circuit operating under the couverture of the authorities", and Congolese traders are afraid to infiltrate it because it is all protected by the Rwandan regime⁷³⁴. It seems that the militarised network for gold exploitation and trade has even been reinforced as a consequence of recent traceability and certification measures

⁷²⁸ Interview with jewelry shop owner, Bujumbura, 18/03/2010; interview with jewelry shop owner, Bujumbura, 17/03/2010.

⁷²⁹ S.C.E.M., Berkenrode, Alpha CD Technology, Phicor, Société Azur, Burundi Mining, Omni Distribution (Direction de Géologie, Bujumura, Burundi). Data from the Mining Administration in Bujumbura.

⁷³⁰ See Hibou (1997: 86) on links with the civil war in Burundi: "The three main gold-purchasing bureaux in Burundi are all connected to specific politicians and have financed political factions or parties, especially extremist ones, and have thus made a direct contribution to the funding of massacres".

⁷³¹ Interview with master trader, Bujumbura, 17/03/2010.

⁷³² According to the UN Group of Experts, the company officially exported 958 kg of gold to Dubai during the first half of 2012, representing 65 percent of total gold exports from Burundi (UN, 2012: 45).

⁷³³ Interview with trader, Bukavu, 28/03/2010.

⁷³⁴ Interview with former master trader, Bujumbura, 23/03/2010.

shifting production and trade away from coltan and cassiterite, more in the direction of gold which is less affected by these measures and easier to smuggle (UN, 2012; 2014)⁷³⁵.

10.1.4. Global gold trade

In the 1980s and 1990s the Kampala and Bujumbura-based traders used to sell their gold to Belgian and Swiss refineries. The gold bars were transported by Sabena, the former Brussels Airlines, in so-called 'valises de valeur'. Switzerland occupied a key position in the international gold trade because it provided specialised banking services in a confidential environment, and large refineries were – and still are – operating in and around Zurich. Yet the direction of international gold flows has changed. Zurich still is one of the important gold markets worldwide, in addition to London (where the gold price is set), New York and Hong Kong. But about 20 to 25 percent of global gold trade is now estimated to pass through Dubai in the United Arab Emirates (Enough Project, 2012: 10; Global Witness, 2014: 4). In 2009 Dubai ranked third in gold exports worldwide (after USA and Australia) and second in gold imports (after India, which alone accounts for about 25 percent), which means that it has become an important trade hub (Emirates 24/7, 2011). The city is indeed conveniently located to supply the most important consumer markets for gold, namely India, the Far East and Turkey. It now attracts the majority of gold traders from the Great Lakes Region (UN, 2014: par. 198).

Traders whom I interviewed gave a number of reasons for having shifted their business from Belgium, the former coloniser, to Dubai. First, financial transactions in Europe have become increasingly regulated, so that smuggling has become difficult⁷³⁶. As one interviewee said, in Europe you can no longer walk around with cash⁷³⁷. Another reason was the growing frustration around the issue of 'conflict minerals', which makes trading in the West increasingly difficult⁷³⁸. A master trader said that for him personally, it has become too complicated and uncertain and he prefers to wait for some certainty on the legality of this trade:

"Because the circuit of armed groups in the trade still exists, and for us it is difficult to know whether a supplier from Congo comes from the 'normal' circuit or from the militarised network. I first wait for peace to come, so as to be able to trade in a legal way"⁷³⁹.

The Dubai gold market actually consists of two main markets: the 'gold souk' and the Dubai Multi Commodities Centre (DMCC). The latter is the authority that governs the Jumeirah Lakes Tower Free Zone (JLT). As announced on their website, it has "created custom built infrastructure and services to support the international precious metal trade, by integrating the refining, manufacturing and trading of gold and precious metals in accordance to the highest global standards"⁷⁴⁰. DMCC thus offers facilities and spaces where businesses can start up gold refineries. The organisation collaborates with the OECD on issues of due diligence and has set up a 'DMCC guidance for responsible sourcing'. They present themselves as a

⁷³⁵ See chapter eleven.

⁷³⁶ Interview with former master trader, Bujumbura, 23/03/2010.

⁷³⁷ Interview with master trader, Bujumbura, 18/02/2011.

⁷³⁸ Interview with master trader, Bujumbura, 17/03/2010.

⁷³⁹ Interview with master trader, Bujumbura, 17/03/2010.

⁷⁴⁰ See http://www.dmcc.ae/jltauthority/gold/dubai-city-of-gold/.

responsible player staying far away from 'conflict gold'. Yet in a 2014 report Global Witness accused DMCC of having altered its audit guidelines after a negative evaluation by Ernst and Young. A report pointing at serious failures at the refinery was never published (Global Witness, 2014). Moreover, the shiny, corporate buildings and websites seem to cover only a very small part of the gold business that is going on in Dubai⁷⁴¹. The 'real activity' takes place in the gold souk, in the typical Arab labyrinth of small lanes and shops where primarily Indians and Pakistanis manage jewelry shops. The jewelry manufacturing companies located here make rings, necklaces, bracelets and earrings. It is here that large turnovers are made, and it is here that Congolese traders come to sell their material. According to the UN Group of Experts (UN, 2012: 46) Mutoka, for example, sent gold to the UAE twice a week "in hand-carried loads of around 30 kg". A former master trader in Bujumbura estimated: "When I talk to my contacts in Dubai they say that at least 100 kg of gold from here [Bujumbura] passes there every month, at least, so I think that real exports can go up to 200 or 300 kg per month"⁷⁴².

In Dubai the gold is either processed at a refinery to be sold in bars – mainly in Europe (Switzerland) and the US – or it is made into jewelry for sale in the Middle East, India or the Far East (Enough, 2012: 2-3). As table 19 shows, over the 2008-2012 period jewellery made up almost half of global gold consumption, while investment accounted for more or less 40 percent and industrial use for about 10 percent.

| | 2008 | 2009 | 2010 | 2011 | 2012 |
|--|-------|-------|-------|-------|-------|
| Jewellery consumption | 2,304 | 1,816 | 2,020 | 1,975 | 1,893 |
| Industrial and dental | 461 | 410 | 465 | 452 | 407 |
| Electronics | 311 | 275 | 326 | 320 | 285 |
| Other industrial and decorative | 95 | 82 | 91 | 89 | 84 |
| Chemistry | 56 | 53 | 48 | 43 | 39 |
| Investment | 1,204 | 1,414 | 1,569 | 1,715 | 1,590 |
| Physical bar investment | 622 | 498 | 886 | 1,197 | 998 |
| Official coins | 192 | 234 | 213 | 245 | 200 |
| Medals and imitation coins | 70 | 59 | 88 | 88 | 113 |
| Investment in Exchange Traded Funds and related products | 321 | 623 | 382 | 185 | 279 |
| Total | 3,970 | 3,640 | 4,055 | 4,142 | 3,890 |

Table 19. End-use gold consumption 2008-2012 (in tonnes)

Source: Thomson Reuters (2013: 9)

⁷⁴¹ Personal communication, Paris, 02/05/2013.

⁷⁴² Interview with former master trader, Bujumbura, 23/03/2010.

10.2. ACCESS MECHANISMS IN GOLD TRADE

As table 17 has shown, the price differences between the local, provincial, regional and international gold markets are relatively small. Sometimes traders operating in mining sites are even able to offer higher prices than those offered in Bukavu, or Bukavu prices are barely below the world market price. This makes gold quite particular in comparison to other value chains, for example in agricultural products, where differences between local farm prices and international prices are much larger. It also raises some questions about benefits in the gold trade. The following sections thus seek to provide an answer to the question how traders benefit from gold. Given the relatively small profits margins, which factors determine, enhance or constrain their ability to benefit from the gold trade and which access mechanisms do they use? This section makes clear that all access mechanisms are complementary, which renders it difficult sometimes to follow a strictly demarcated structure. It also shows that access mechanisms are ambiguous, as they may function both as constraints and as opportunities, depending on the actors, the circumstances and the scales. I first analyse how traders gain access to the market, defined as "an institution in which a significant number of commodities of a particular, reasonably well-defined type are regularly exchanged" (Johnson S., 2013: 9). It will be demonstrated that the gold market adheres to particular norms.

10.2.1. Access to markets

The fact that profit margins in the gold business are relatively small means that money is not so much made on profit margins but on trading in large volumes. This implies that success in the business requires a large working capital and a steady supply of goods⁷⁴³. At the top of the pyramid that forms the gold trading network, there are a few master traders in whose hands large volumes of gold and financial capital are concentrated. At this level, in other words, the gold trade is quite centralised and a limited number of traders hold an almost monopolistic position. As a Burundian trader told me:

"In the gold business profit margins are small⁷⁴⁴. In order to have a larger profit you need a larger capital. In one kilogramme you may earn USD 500 to 700, which is not much. [...] So suppose you export 30 kg per month, that means USD 500 times 30, so a profit of USD 15,000 per month; USD 180,000 after 12 months. That is already a considerable profit! And it is not unrealistic. One master trader here [Mutoka] even exports 80 to 100 kg per month, so imagine how much he earns! He has no competition so far"⁷⁴⁵.

In order to enforce a position on the market and guarantee the best supplies at the best possible price, it is thus important to push competitors out of the market. For that reason it may be rational to strategically use information about suppliers and buyers and withhold this information from potential competitors. This may be interpreted as a strategy of access control, whereby traders aim to maintain their position as intermediaries and block other people's access. In other words, buyers/ financiers are wary of sharing information about their suppliers, because they need to guarantee their own supplies. Vice versa, suppliers may be

⁷⁴³ Interview with commission agent, Kamituga, 08/2009.

⁷⁴⁴ This was already observed by Dupriez (1987: 103). He contrasted the situation for gold with the one for cassiterite, where local prices remained far below the world market prices. ⁷⁴⁵ Interview with trader, Bujumbura, 16/03/2010. See also section 10.4.

reluctant to share information about where they sell, since they have an interest in maintaining a relative scarcity and thus pushing up the price, as well as having a privileged relationship with a buyer/ financier.

A gold trader in Bukavu, who used to be one of Namukaya's regular suppliers but also crosses over to Bujumbura, said he never told the export office that he sold "on the other side", because "that would be the end for me"⁷⁴⁶. This statement suggests that the export offices exert a control over their suppliers and require the relationship to be exclusive. It seems to be dangerous to by-pass them and if you want to smuggle your gold across the border, you must do it in secrecy. So although these practices of access control do not completely stop traders from smuggling and by-passing the link with their 'fixed' buyers⁷⁴⁷, it is clear that doing so involves a risk, both a security risk and the risk that the trust relationship will be broken. For 'new' comptoirs presenting themselves at the Bukavu market, it seems to be extremely difficult to gain access as well. In 2007 for example two new gold export offices appeared on the list of the Provincial Mining Division: one (Cotracom) was owned by a former diamond trader with Egyptian and Italian roots, while the other one (Aurex) was managed by a German businessman⁷⁴⁸. Both had to close down their offices after three years and one year respectively since they never managed to establish the necessary relationships with suppliers, nor with political and military power holders⁷⁴⁹.

But whereas the flow of gold at the regional level is concentrated in the hands of a handful of master traders, at the local level it is very fragmented. Here the network flares out over a multitude of intermediate and small traders, for whom it is very difficult to trade in considerable volumes and establish monopolies. This is due to the fact that the gold extraction is quite dispersed: there are many mining shafts and alluvial sites, miners sell their production individually and tend to do this directly on the spot⁷⁵⁰. For this reason the system of commission agents is widespread at the local markets.

Commission agents work with the financial capital put at their disposal by their boss, usually based in Bukavu. Some bosses send their agents off to different mining sites in an attempt to find the best supplies. One interviewed trader for example has at least 10 agents who he gives money to and sends to different mines. On their return he centralises the purchases⁷⁵¹. For this strategy though a considerable financial capital is needed. Most bosses open up at least one buying office near a gold mine where one or two commission agents are resident. Bosses may open up these buying offices for three particular reasons. First, it allows them to officially register only one office and pay one 'carte de négociant', while in reality operating more than one⁷⁵². Second, it is a strategy to diversify the supply and thus guarantee a constant supply of gold. The small quantities of gold concentrate that are gathered in the different buying offices are centralised at the level of the main office⁷⁵³. Third, it is a strategy to minimise risk, as big

⁷⁴⁶ Interview with trader, Bukavu, 04/01/2011.

⁷⁴⁷ See section 10.2.10.

⁷⁴⁸ This 'comptoir' later concluded the deal with SOMICO that was discussed in chapter five.

⁷⁴⁹ Personal communication at Cotracom, Bukavu, 08/2009; personal communication at Aurex, Kamituga, 08/2009 and 02/2011.

⁷⁵⁰ See chapter eight.

⁷⁵¹ Interview with trader, Kamituga, 07/08/2009.

⁷⁵² Interview with trader, Kamituga, 18/08/2009.

⁷⁵³ Interview with trader, Kamituga, 08/2009.

offices in the mines where all purchases are centralised may be more vulnerable to robbery and theft or to state control⁷⁵⁴. To make the office operational, the 'patron' places a sum, varying from USD 1000 to 20,000, at the commission agent's disposal. This money may come from his own funds, or may in turn have been borrowed from a master trader. In any case the buying office needs to have a constant stock of cash in order to pay the suppliers.

This section gives a first impression about how the gold market is organised, with a concentration at the 'top' and a fragmentation at the 'bottom', where big traders work with smaller traders in order to diversify supplies, minimise risk and escape state control. The section also introduces a number of access mechanisms that will be further explored in the next sections, such as access to the state's regulatory framework (registering buying offices), to smuggling (case of the Namukaya supplier), to information (about suppliers and buyers), to vertical and horizontal relations (power holders and commission agents) and to financial capital.

10.2.2. Access to financial capital

As was said in the previous section master traders are able to reinforce their position and to accumulate so much financial capital because they can trade in large volumes, and they can trade in large volumes because they have access to financial capital. They also have a financial buffer and the possibility to build up reserves, so that they can anticipate and play upon fluctuations in the world market price. In case of falling prices, these traders continue to buy and stock gold purchased at a lower price, in order to sell it later when prices will have risen. This was explained by an employee of Namukaya:

"The price of gold on the world market may change any day, any hour. So we wait for the price to be favourable before we sell. We do not necessarily immediately export the quantity we buy today, but we wait until we have a sufficient quantity"⁷⁵⁵.

Their access to financial capital also enables the big traders to offer higher prices to suppliers. This causes a lot of competition. 'Comptoirs' for example are legally only allowed to buy gold from officially recognised 'négociants', but traders complain that these export offices buy from anyone, including non-registered small traders and miners, and that they raise the price:

"They take everything. Some suppliers prefer to go and sell there, because the 'comptoirs' offer a higher price. And so they put us out of business"⁷⁵⁶.

It also creates competition at the local level, as large traders from Bukavu can go directly into the mines, set up buying offices and offer the same prices as in the capital, thereby cutting out intermediaries, distorting the local market and disadvantaging independent small traders⁷⁵⁷. A similar phenomenon occurred during the war period, as Vlassenroot and Raeymaekers (2005: 136) illustrated, although the current situation is somewhat different. Vlassenroot and Raeymaekers (idem) described how "local traders have lost their control over most of the local

⁷⁵⁴ The latter two reasons are also advanced by Grätz (2004: 163).

⁷⁵⁵ Interview at Namukaya, Bukavu, 27/03/2008.

⁷⁵⁶ Interview with trader, Bukavu, 24/07/2009.

⁷⁵⁷ Interview with trader, Kamituga, 08/2009; interview with commission agent, Kamituga, 11/08/2009.

economic transactions, because the (sub)regional gold trade (the only dollar-generating economic activity) has increasingly become dominated by businessmen from Bukavu and by army commanders". The authors referred to the 'coltan boom', during which army commanders tried to cut out all intermediary traders and got directly involved in the trade by offering the same prices as in Bukavu and directly shipping the coltan ore to Kigali (idem: 135). In the same way, they argued, commission agents from urban traders in Bukavu and Goma started to buy directly in the mining sites and set local prices, thereby "cutting the periphery off from its principal source of economic exchange" (idem). This clearly describes a situation in which access to the gold market is 'a weapon of the strong', more particularly of the large, wealthy traders.

Vlassenroot and Raeymaekers' account of the situation in Kamituga must be interpreted in the context of war. During this period the 'periphery' as the authors call it, was extremely isolated and all transport to Kamituga had to be carried out by air⁷⁵⁸. The big traders, who had enough financial capital to charter flights or to even buy their own planes, benefited from this situation and established monopolies. They were mainly of Bashi origin and operated at the regional level. The preferential relationships that some of them had with the military administration also facilitated the monopolisation of the mineral trade (through access to social relationships). In addition, the insecurity on the countryside affected the self-sufficiency of subsistence farmers (idem), so that local production went down and all goods needed to be imported. This again played into the hands of the large master traders who started importing food and consumer goods and accepted minerals as a payment, which they then directly shipped out of the mines.

This context changed with the end of the war. Following up on Vlassenroot and Raeymaekers' account three observations can be made. First, the system of buying offices and commission agents indeed shows that a big part of the gold trade is controlled by bosses with their base in Bukavu. But they do not always apply the Bukavu prices in Kamituga, since agents also take a commission on the purchasing price⁷⁵⁹. Moreover, there are also independent small traders, who are not necessarily tied to one 'patron', active at the local market. They make arrangements with different larger traders in order to obtain the necessary capital⁷⁶⁰. It is not the case either that the owners of these buying offices are all Bashi traders. The large traders operating at the Kamituga market are both of Bashi and Balega origin, so the competition must not be primarily seen in ethnic terms⁷⁶¹. It is rather a question of big traders who have been able to accumulate, often thanks to their long experience in the sector, and smaller traders who have not been able to do so.

A second observation relates to the changes in physical access (the 'isolated periphery' described by Vlassenroot and Raeymaekers). As said in chapter five the rehabilitation of the main road connecting Kamituga and Bukavu considerably reduced transportation costs and thus made it easier for traders and miners to travel. It favoured in other words those actors that had been physically 'cut off' during the war period. For the traders who previously operated the airline companies, this also meant a big change. Yet they had already been forced

⁷⁵⁸ See chapter five.

⁷⁵⁹ See section 10.2.5.

⁷⁶⁰ Interview with trader, Kamituga, 17/08/2009; interview with trader, Kamituga, 12/08/2009.

⁷⁶¹ Interview with commission agent, Kamituga, 20/08/2009.

to abandon most of their aviation activities after a ban on flying Antonov planes, which was reinforced after an October 2007 plane crash (Cros, 2007)⁷⁶². The same airline owners now set up road transport companies. By 2009 almost 10 different road transport companies, like Arc en Ciel, Azmat, Don de Dieu, Tanganyika, Kivu Express and Namalengo Express were operating minibuses on this route⁷⁶³. By turning to road transport they thus maintained their economically important position at the local market. In this sense the improved physical access had ambiguous effects and held some opportunities both for small and big traders.

A third observation relates to physical security (violence). The end of the war has not ensured an end of violence, although the security situation has considerably improved. Over the course of the last few years there have still been regular pillages and ambushes on the main road⁷⁶⁴. Gold traders are thus at risk, especially since they are transporting valuable parcels of gold or cash. In this sense it seems reasonable not to transport too much gold or cash at once. One trader also explained that when he sends money to his commission agent, he consigns it to a person he trusts. But he will not always use the same transporter as that may raise suspicion⁷⁶⁵. Yet also in this regard changes may be on the way, since in 2012 the first local Western Union office was opened in Kamituga, which of course opens up a lot of additional possibilities for transferring money⁷⁶⁶. Other traders have become victims of theft in their offices or homes⁷⁶⁷. One Kamituga-based boss reported having lost USD 50,000 at once⁷⁶⁸. To the question why he kept so much money in his house, he responded that he could not but keep it there, since it was money he had to work with, and which had to be immediately available. Traders holding larger capital or larger amounts of gold thus also run higher risks.

This section shows how larger traders with better access to financial capital can enforce a stronger position in the market. Yet changing contexts may also provide opportunities for small traders, and in any case it is difficult for large traders to establish complete monopolies in local markets because of the nature of gold exploitation and because of the existing relationships in the network of miners and traders, as said in chapter eight and nine.

10.2.3. Access to vertical relations

Access to relations is important. That was already clear. Yet in this section I want to elaborate on a particular kind of relations, namely 'vertical' relations with power holders. These facilitate access to markets, provide protection and may help in cutting out potential competitors.

The cases of Shamamba and Mutoka illustrate very well that access to and protection by power holders is crucial. Shamamba, for example, managed to establish the 'right' connections during the war period, when he collaborated with RCD. But also after the war he retained good contacts with high-level political elites. Currently his wife Kindja Mwendanga is a member of

⁷⁶² Interview at Namukaya, Bukavu, 27/03/2008.

⁷⁶³ Fieldnotes, Kamituga, 08/2009.

⁷⁶⁴ Interview with trader, Kamituga, 24/07/2009; interview with trader, Kamituga, 07/08/2009; interview with commission agent, Kamituga, 11/08/2009.

⁷⁶⁵ Interview with trader, Bukavu, 23/04/2008.

⁷⁶⁶ Personal communication, 10/2012.

⁷⁶⁷ Interview with commission agent, Kamituga, 13/08/2009; interview with commission agent, Kamituga, 12/08/2009.

⁷⁶⁸ Interview with trader, Kamituga, 28/01/2011.

Provincial Parliament. For Mutoka it was already said that he had high-level political contacts. More particularly, he was protected by Adolphe Nshimirimana, Burundi's Head of National Intelligence⁷⁶⁹. Nshimirimana reportedly watched over the maintenance of Mutoka's monopoly and thereby did not shrink from using force, intimidation and violence. Other gold traders I interviewed in Bujumbura indeed expressed the fear of being intimidated by Mutoka's network because "he does not like competition"⁷⁷⁰. They indicated they had to be really prudent positioning themselves on the market, and in turn they also tried to establish relations with high ranked politicians and military in order to buy protection from them⁷⁷¹.

Apart from Shamamba's Congocom there were two other export offices for gold active in Bukavu in 2000: Shenimed and Panju. They both played a crucial role during the war period, but were afterwards forced to stop their gold trading activities precisely because of this involvement. Panju Zulfikar Ali was accused of smuggling minerals and financing RCD-Goma and FDLR (Belgische Senaat, 2003; UN, 2009: 42). In 2004 he was arrested in Belgium with a large quantity of smuggled gold (Tegera and Johnson, 2007: 89). As a result of all this, he stopped buying gold at the end of 2005, while he remained active in cassiterite, coltan and wolframite trade. The owner of Shenimed, Aziza Kulsum Gulamali, is a notorious businesswoman in the region. According to the UN (2001: 7) she was actively supporting Hutu rebels during the Burundian war, making alliances with the Kigali regime and RCD-Goma and thus obtaining the position of manager of SOMIGL, which was granted a monopoly on the commercialisation and export of coltan under RCD rule⁷⁷². In this way she got involved in the coltan, cassiterite and gold trade. The accusations against her, however, forced her to stop these activities after the war and to concentrate on her other businesses, among which the import of cigarettes. These two cases show that the vertical relations may also turn out to be a constraint for traders. Their involvement with the power holders at one particular moment had negative consequences for them when circumstances changed. These circumstances may even involve external actors such as the international community, which is very closely watching the prominent players in the gold business.

The importance of vertical relations has been evidenced in other studies about the region as well. In his study on the intensive cross-border trade between Uganda and northeastern DRC, Titeca (2012) described how this trade came to be centralised in the hands of a few 'tycoons' who enjoyed preferential treatment and protection from the government and military in exchange for a share in the profits. The involvement of high-level state agents, he argued, helped to protect the tycoons against possible confiscations of large consignments of goods by particular state agencies, and also allowed them to push competitors out of the market (idem: 53). A similar process was described by Raeymaekers (2010) in his study of the Nande traders linking up with the rebel movement in order to protect their economic assets, which resulted in a new and relatively stable but 'heterogeneous' governance framework (idem: 569). Both Titeca and Raeymaekers, along with proponents of the 'governance without government'

⁷⁶⁹ Interview with tader, Bujumbura, 18/02/2011. Ellis and MacGaffey (1996 : 31) also made the point that "the major operators in unofficial trade [...] are]often] directly connected to holders of political office and their ability to trade on a large scale depends on the quality of their political contacts".

⁷⁷⁰ Interview with master trader, Bujumbura, 18/02/2011.

⁷⁷¹ Interview with master trader, Bujumbura, 17/03/2010.

⁷⁷² See chapter five.

approach⁷⁷³ argued that these new regulatory frameworks are thus not in complete opposition to the state, but that state agents "are at the heart of the informal cross-border trade" (Titeca, 2012: 55). Yet protection from the state alone is not enough, and traders thus also establish good relations with local elders, traditional chiefs and the broader communities in a quest for 'legitimacy' (idem: 57-58). This view thus differs from the accounts on 'criminalisation' or 'privatisation' of the state, in that it acknowledges that the state's legal system is constantly challenged, including by individual state agents "who might put their particular understanding of the purpose and opportunities of their position above the formal rules of the state" (Raeymaekers, 2010: 582). These emerging governance practices may not exemplify a privatisation of the state, but rather a "different mode of governing" (idem). However, the examples from the gold business show that the big traders, not the small ones, can benefit from their relations with power holders. The access mechanism is thus working in two ways: the more economic power you have, the easier your connections with political and military power holders are; and the better your vertical relations, the stronger your economic position will grow. Big traders may therefore be capable of smuggling much larger volumes across the border and lowering the risks of confiscation.

10.2.4. Access to horizontal relations

In chapter nine I illustrated in detail how credits and personal relationships are instrumentalised for getting access to the local market. I argued that commission agents can be recruited on the basis of kinship, friendship or familiarity. These are 'horizontal relations', but they are very important for traders' ability to benefit. This section provides some insights in how commission agents, whom I consider to be 'small traders', may benefit from their activities.

Some bosses pay their agents a monthly 'salary', but this amount is seldom considerable. My interviews revealed an average of about USD 50, which is "insufficient", as bosses and commission agents themselves acknowledged⁷⁷⁴. Interestingly, this salary does not really count though. What does matter, are the additional benefits that are not included in the salary. Interviewees referred to them as "premium"⁷⁷⁵, "favours"⁷⁷⁶, "something that helps me"⁷⁷⁷, or even "gratitude" ('remerciement')⁷⁷⁸. These 'favours' may first of all represent a share in the profits⁷⁷⁹. At the end of the month the boss evaluates his profits and gives a percentage of this back to the commission agent(s)⁷⁸⁰. As the following quotes reveals, this share may vary:

"When the gold arrives here in Bukavu I go and sell at the 'comptoir'. Suppose I have a parcel worth USD 5000 and they give me USD 5200. I know that from the USD 200 I first have to

⁷⁷³ See section 1.3.

⁷⁷⁴ Interview with trader, Bukavu, 31/07/2009; interview with commission agent, Kamituga, 14/08/2009; interview with commission agent, Kamituga, 13/08/2009.

⁷⁷⁵ Interview with trader, Bukavu, 31/07/2009.

⁷⁷⁶ Interview with trader, Kamituga, 07/08/2009..

⁷⁷⁷ Interview with commission agent, Kamituga, 13/08/2009.

⁷⁷⁸ Interview with commission agent, Kamituga, 08/2009.

⁷⁷⁹ Other kinds of 'favours' are the possibility to make money on transactions and the possibility of trickery, which will both be discussed later.

⁷⁸⁰ Interview with trader, Kamituga, 11/08/2009; interview with commission agent, Kamituga, 11/08/2009; interview with trader, Kamituga, 11/08/2009; interview with trader, Kamituga, 11/08/2009; interview with trader, Kamituga, 08/2009.

deduct my costs, like nitric acid, which is used for cleaning the gold and letting it shine. People who do this work should wear masks, but they rarely do. The 'patron' buys these things. Other costs entail the transportation and accommodation costs of the person whom is sent to the sites with the money. If at the end of the month I have spent, let's say, USD 100, I will do my calculations. If I have a profit for example of USD 300, I'll take a part for myself, a part for the agent and a part for the person who cleans the gold. Profits are not always shared in the same way; it depends"781.

The extras depend on the total profit made and also on the relationship between the two individuals: "There is no fixed percentage, he just gives me what he wants"⁷⁸²; "We don't have fixed contracts, just arrangements, we are friends"⁷⁸³; or "We work like family"⁷⁸⁴. One boss said it is a family business, where everyone gets a share of the benefits according to his needs: "I can give him a premium of USD 10 or 20, so that he can pay for new trousers. He is my own son"⁷⁸⁵. Again the notions of 'friendship' and 'family relations' can be discussed⁷⁸⁶. In general I observed that relations in the gold business often include an element of emotional and affective friendship, but that this 'friendship' or 'family tie' may also come to an end if the economic transactions come under pressure or are halted. The following quote testifies of a good relationship between a commission agent and a 'patron':

"He pays very well. I even have social advantages, like medical costs, food, all that is not included in the salary, it's extra. He just gives it to me. At the end of the week he may even give me USD 30 and tell me to have a beer or a soda"⁷⁸⁷.

Most agents confirmed they collaborate very well with their boss:

"We never had any problem. If there is a loss of say USD 50, he just encourages me to work hard in order to repay"788.

But some also accused him of not sharing enough:

"I can work with the same 'patron' for five years, but he will never invite you to his home and tell you to share in the profits. You will only see him leaving for Burundi and build his house in town, but you will never see the big profits"⁷⁸⁹.

The relational mechanism is thus used by commission agents to maintain access and obtain some profit. As was argued in chapter nine personal relations in the gold trade can be quite sustainable because of the dependencies and debts created. But when a commission agent is not working to a boss's satisfaction, it is easier to end this relationship than it is for example to end a relation with a shaft manager. Between agents and bosses, transactions are more short-

⁷⁸¹ Interview with trader, Bukavu, 23/04/2008. This account was confirmed by one of his commission agents in Kamituga: interview with commission agent, Kamituga, 12/08/2009. ⁷⁸² Interview with commission agent, Kamituga, 11/08/2009.

⁷⁸³ Interview with commission agent, Kamituga, 13/08/2009.

⁷⁸⁴ Interview with commission agent, Kamituga, 14/08/2009.

⁷⁸⁵ Interview with trader, Kamituga, 12/08/2009.

⁷⁸⁶ See chapter nine.

⁷⁸⁷ Interview with commission agent, Kamituga, 20/08/2009.

⁷⁸⁸ Interview with commission agent, Kamituga, 08/2009.

⁷⁸⁹ Interview with commission agent, Kamituga, 13/08/2009.

term: working capital is put at the former's disposal and when this is exhausted, the relation can more easily be ended, although a family tie may again complicate the matter somewhat. Nevertheless it regularly occurs that agents are dismissed⁷⁹⁰. This means that the relationship is also fragile to some extent. It seems as if eventually everything depends on the goodwill of the boss, as he may decide to give his agents a share in the profits or not. Consequently, he is in a very powerful position. Yet this is only part of the story, as there are other ways in which commission agents and small traders can benefit from the activities they are doing. These include notably making money on transactions by playing upon the price difference and cheating by playing upon balances and weights. In the next sections these strategies will be further illustrated.

10.2.5. Access to information about prices

This section explains the price setting at different levels in the gold trade, which is an important aspect on which traders may either gain or lose a lot of money. Therefore access to information about the prices is so important. The section demonstrates that small traders' access to information has been significantly improved thanks to the introduction of mobile technology and that negotiations open up room for manoeuver. But access to information is also unequally divided, as some have the knowledge of more complicated and more accurate formulas to calculate prices, while others use simple formulas and may neglect a number of factors that are nevertheless important for the ability to benefit.

In table 17 I integrated a standard formula for calculating prices on the basis of the London Gold Fixing, as it was provided to me by a Bukavu-based trader (the boss of several buying offices in the gold mines) and a master trader in Bujumbura. Yet many traders are not knowledgeable about these formulas. That also means that they do not make detailed calculations to anticipate losses due to impurities or price fluctuations, but it does not mean that they randomly set prices. Most traders use somewhat simplified formulas to determine at what price they will buy. A trader in the Essence neighbourhood in Bukavu explained that he divides the world market price (which they locally call the 'fixing') by three. That gives him the price per tola. He added that "there are other, more complicated ways to calculate, but I don't know them"⁷⁹¹. As can be seen in table 17, the correct formula would be to divide by 2,845 and then calculate the grade and incorporate the profit margin. In the calculation of this profit margin, traders should in principle take into account the fluctuations of the world market price, so as to avoid selling at loss⁷⁹².

While their information may not be perfect, traders do have access to and use information on prices and grades, which strengthens their bargaining position. Studies have indeed shown that sellers are in a weaker position if the goods they sell are not standardised, if they cannot assess their value, or are not aware of the prices that are paid at the world market (Altenburg, 2006; De Herdt, 2002; Panella, 2010). For gold though, unlike for other minerals like cassiterite, coltan or diamonds⁷⁹³, traders can more or less assess the purity value. After having used simple techniques to clean the material, adding nitric acid to burn impurities, the gold

⁷⁹⁰ Interview with commission agent, Lugushwa, 26/01/2011.

⁷⁹¹ Interview with trader, Bukavu, 28/07/2009.

⁷⁹² Interview with master trader, Bujumbura, 18/02/2011. See also Grätz (2004: 157).

⁷⁹³ See Mwaipopo (2014) who makes this argument for the case of diamonds in Tanzania.

concentrate obtains an average purity percentage somewhere in the mid 1980s to mid 1990s, depending on the mining site it comes from. Moreover, the world market price for gold is relatively easily accessible and communicated daily via radio, television and the internet. The introduction of mobile phones has significantly facilitated and accelerated the spread of information about prices⁷⁹⁴. Small traders, who may have no internet access, can and do now ask about the prices, daily if needed, via their mobile phone. This has dramatically strengthened their position in terms of power relations. According to a former gold trader in Bujumbura, two decades ago the small traders were not knowledgeable about the price. Nowadays they are well informed⁷⁹⁵:

"They listen to the BBC. There is a website they use. They now negotiate while knowing the fixing, and so we must directly apply the world market price. We cannot fool these Congolese traders anymore"⁷⁹⁶.

The latter was confirmed by a Bukavu trader who recounted that during the war, people were not informed about the fixing, so buyers could basically impose any price they wanted⁷⁹⁷. Yet nowadays traders are really following up on it. Even small traders who are based near the mining sites say they regularly check the price online, on their phone, or on TV5 Afrique: "Every morning around 9 a.m. TV5 broadcasts the prices for all commodities"⁷⁹⁸. An employee of Namukaya said they follow the world market price online, even several times a day, and they also communicate the price to the traders whom they work with⁷⁹⁹. Commission agents indeed said that the price is communicated to them by their boss:

"If the price has risen in Bukavu, he calls us and we also raise the price here. [So you are in daily contact with the patron?] Yes, every day. We have our phone. Every hour even if necessary"⁸⁰⁰.

Following the world market price and playing upon its fluctuations is a necessary strategy if a trader does not want to lose money, as the following respondents affirmed:

"Following the world market price is the least we can do. If you don't do it, you lose money. The traders also know and follow. It is not hard to find it: on the internet or on TV5"⁸⁰¹.

"It is very important to follow the price fluctuations. Last week for example I travelled to Bujumbura with a quantity of gold, but because the price had dropped, I decided not to sell it. I would have lost money. So I wait, one day the price will increase again"⁸⁰².

⁷⁹⁴ About ten years ago, when mobile phones were not so widely available yet in Africa, Grätz (2004: 157) still argued that local traders were unaware of the changes in gold prices. Now mobile phones are crucial in the exchange of information, money and remittances, military instructions and so on, see Smith, 2011: 20.

⁷⁹⁵ Interview with trader, Kamituga, 13/08/2009.

⁷⁹⁶ Interview with former master trader, Bujumbura, 23/03/2010.

⁷⁹⁷ Interview with trader, Bukavu, 04/01/2011.

⁷⁹⁸ Interview with trader, Bukavu, 23/07/2009; interview with trader, Kamituga, 28/01/2011.

⁷⁹⁹ Interview at Namukaya, Bukavu, 27/03/2008.

⁸⁰⁰ Interview with trader, Bukavu, 31/07/2009; interview with trader, Kamituga, 12/08/2009; interview with commission agent, Kamituga, 10/08/2009.

⁸⁰¹ Interview with 'comptoir', Bukavu, 21/03/2008.

⁸⁰² Interview with trader, Bukavu, 08/02/2011.

Yet the fact that the world market price sets a standard does not mean that the price at the local level is fixed. Negotiations about the price constantly take place, as the following quotes reveal:

"There are no fixed prices. If I see that my neighbour here buys at FC 25,000, I will do everything to set my price at FC 26,000. Prices cannot be the same. This is an activity of 'négociants' [French word for traders], so we negotiate"⁸⁰³.

"We all complicate the price. Nobody is really loyal to the fixing. You can do these transactions secretly, everybody does it"⁸⁰⁴.

"A businessman remains a businessman. He does not necessarily stick to this price. If one trader has got a lot of money at his disposal, he may offer higher prices than his colleagues in order to attract suppliers"⁸⁰⁵.

These examples suggest that there is a lot of competition at the local markets and that traders must offer prices that are high (enough) to attract clients, which refers back to the point on competition⁸⁰⁶:

"We have a fierce competition at the level of prices. We set higher prices in order to have more clients. It is better to make a profit of only USD 1 per renge and have many clients, than to have higher profits. The honourable clients of course get the best prices"⁸⁰⁷.

The quote indicates that certain categories of suppliers, like the 'honourable clients' are particularly advantaged⁸⁰⁸. The same is true for suppliers having larger quantities on offer. Their bargaining position vis-à-vis the buyer is stronger and they are more likely to obtain a better price (and to be paid in US dollars if they wish so):

"Imagine a client comes in with an important quantity of gold. You know that you will sell at USD 34 to 35 per renge, so you can raise the price a bit, but you have to make sure you will earn at least USD 0.50 per renge" ⁸⁰⁹.

Yet on the other hand, commission agents must also follow up on the prices paid by their boss and if possible lower the purchasing price so as to increase their own profit margins. For example, when the boss communicates that the price in Bukavu is at USD 350/ tola, the agent will try to buy at USD 340/ tola, so as to gain USD 10 for himself. This profit margin of USD 10 per tola or USD 1 per renge seems to be the average profit gained at this level and it more or less corresponds with the information collected in table 17^{810} . The margin is also needed to cover the losses made by the presence of impurities. The processed gold ore coming from the

⁸⁰³ Interview with commission agent, Kamituga, 12/08/2009.

⁸⁰⁴ Interview with trader, Kamituga, 07/08/2009.

⁸⁰⁵ Interview with trader, Kamituga, 13/08/2009.

⁸⁰⁶ See section 10.2.2. Interview with commission agent, Kamituga, 08/2009.

⁸⁰⁷ Interview with commission agent, Kamituga, 20/08/2009.

⁸⁰⁸ See chapter nine.

⁸⁰⁹ Interview with trader, Kamituga, 07/08/2009.

⁸¹⁰ Interview with commission agent, Kamituga, 12/08/2009; interview with commission agent, Kamituga, 08/2009; interview with commission agent, Kamituga, 20/08/2009; interview with commission agent, Kamituga, 05/04/2008; interview with commission agent, Kamituga, 10/08/2009.

mining shaft still contains dirt and other associated minerals like iron, copper and silver. As I said some of these have already been removed at the processing level (loutra), but at the level of the Bukavu trading house, the gold concentrate will be purified again and little losses will always occur⁸¹¹. The following two quotes illustrate these points in the words of a 'patron' and a commission agent respectively:

"If I leave him money for let's say one tola, so USD 350, the only thing I am interested in is that he realises that tola. I do not know whether he bought at 340, 345 or another price, so that he has a margin. This margin is also necessary, because suppose there are some impurities in the gold he brings to me, then I will deduct that from the total quantity and it will mean a loss for him"⁸¹².

"There is no fixed rule but we gain according to the purchases. If the patron asks you to buy a tola at USD 300 and you manage to pay only USD 290 or 295, you are lucky. If the supplier refuses you will be constrained to pay USD 300. That is why we say that only hard work and negotiation pays off"⁸¹³.

All these examples show that small traders do have some agency. They benefit by making money on transactions. They have some room for maneuver and can negotiate about the price. Thanks to mobile technologies that have quickly spread over the entire region, they also have better access to information about the world market price, which has significantly strengthened their position vis-à-vis the larger buyers. Yet on the other hand, small traders' ability to negotiate prices at local markets is constrained by large traders with more financial capital who directly buy in the mines and can thus offer higher prices.

10.2.6. Access to technology

In the price setting, the grade of the gold concentrate and the exact weight are important factors. In order to exactly determine these, appropriate technology is needed. Also in this respect there is a power imbalance between traders⁸¹⁴.

The biggest export offices use a gold density testing machine in which they place a sample of gold⁸¹⁵. The machine then reads a numerical value, which gives a corresponding gold purity value. In other export offices an Archimedes test for density is used for determining the purity of a gold concentrate⁸¹⁶. The gold is put on a scale, submerged into a recipient filled with water and weighed. This weight is compared with the weight outside of the water]. As other traders do not dispose of this technology, or do not have the knowledge required, they use standard estimations which vary from mining site to mining site, as said above.

⁸¹¹ Interview with commission agent, Kamituga, 08/2009; interview with commission agent, Kamituga, 13/08/2009; interview with trader, Kamituga, 08/2009.

⁸¹² Interview with trader, Kamituga, 14/08/2009.

⁸¹³ Interview with commission agent, Kamituga, 11/08/2009.

⁸¹⁴ James Smith (2011: 21) makes a similar argument for coltan, for which purity varies probably even more than for gold, and which is different to distinguish from other substances such as tungsten or tin. ⁸¹⁵ These machines are used in Kampala export offices (UN, 2014: annex 68).

⁸¹⁶ I witnessed this in two different export offices in Bukavu.

But if the level of 'impurities' (non-precious metals like copper which are present in the gold concentrate) is high, this leads to an overvaluation of the gold concentrate. In Bukavu I observed the example of a trader who had bought a quantity of 114.7 grammes of gold (80 renge)⁸¹⁷. After having burnt the substance in nitric acid 113.8 grammes remained. This means that he lost 0.9 grammes or about USD 30 on this quantity, which actually is a small loss. According to the Bukavu traders a loss of between 1 and 4 percent is normal. If you go beyond that, it means that you have concluded a bad transaction⁸¹⁸. Therefore, it is important for the traders that the gold is cleaned well at the level of the shaft, loutra or local buying house. This problem became apparent during the 2010-2011 mining ban. Since all artisanal mining activities were prohibited during that period – but this prohibition was frequently ignored – it was difficult to purify the gold with nitric acid, as the smoke and the smell would betray the activities taking place. As a consequence traders were buying gold with a lot of impurities and made many losses, which forced some to stop their activities.

As for the weighing, most traders use manual scales. As the next section shows these allow for a lot of manipulation and interpretation. Electronic scales are only used in 'comptoirs' and by a handful of traders in Bukavu (see figure 29). But since it allows them to know the exact weight (or almost exact, because the scales are not necessarily well calibrated) of a gold parcel, it puts them in a stronger position vis-à-vis the other traders.

10.2.7. Access to trickery

This section shows how traders who lack the access to appropriate technology may nevertheless make use of their knowledge of the measurement system and manage to 'play upon' this system by manipulating scales and weights⁸¹⁹. The juggling with measures and weights is ubiquitous and has become the norm in the gold trade. It thus offers traders opportunities for 'trickery' (Bayart, 2000) or cheating. This may be conceived as an access mechanism. Yet cheating occurs at different scales and big traders profit from it as well.

Although there are standardised measures, as said earlier, the system of measurement is extremely untransparent and scales do not seem to use uniform measurement systems across places. According to some interviewees, the price difference between Bujumbura and Bukavu for example is not so much to be found in the fixing, but in the calibration of the scales. Despite the standardised measure of 11.664 the weight instrument for one tola in Bukavu equals 12 grammes, while in Bujumbura it may be 12.5 or 12.8 grammes. "That becomes interesting, because if you have a few 100 grammes, it easily adds up", one trader in Uvira, the Congolese town at the DRC-Burundi border, said⁸²⁰. Especially with the manual scales most traders use, the calibration is extremely important. These manual scales are just taken between thumb and finger, so the way in which you hold the cord determines the exact weight⁸²¹. Besides the gold is weighed against a coin, but this coin may not have the exact conventional weight. For example it is commonly accepted that 1 renge equals 1.26 grammes.

⁸¹⁷ Fieldnotes, Bukavu, 09/02/2011.

⁸¹⁸ Interview with trader, Bukavu, 08/02/2011.

⁸¹⁹ Interview with commission agent, Kamituga, 08/2009.

⁸²⁰ Interview with trader, Uvira, 24/03/2010.

⁸²¹ Interview with trader, Kamituga, 08/2009.

appeared to be 1.4 grammes⁸²². This is of course beneficial for the buyer, because he buys more than he pays for. A commission agent in Kamituga made the following observation:

"Gold is complicated. My 'patron' is in Bukavu, so I send him the parcels. When he weighs them, he can never obtain the exact same weight as I did. You may weigh, but when the cord of the scales bends a tiny little bit, that already means a loss or a surplus. Besides these coins do not have identical weights. I weigh here and he weighs a second time, if his result is a little bit lower, he may think that I withheld some"⁸²³.

This fact can thus constitute a constraint for small traders, but it could just as well be an opportunity and increase their agency. One commission agent for example explained that a coin of one kanta should normally weigh 0.7 grammes. Yet to make some extra profit, he would manipulate the coin to weigh 0.9 or 1 gramme. The 0.7 is transferred to the boss, and the agent keeps 0.2 or 0.3 for himself. He concluded that "a commission agent must be a bit of a thief"⁸²⁴.

Although more than one respondent referred to these tricksters as 'thieves'⁸²⁵, the access mechanism is actually widely known and regarded as legitimate, both by miners and traders. It is thus a professional norm which all actors in the gold sector know and tacitly accept, and which is also partly rooted in a moral economy. Indeed, a miner coming to sell his gold must be careful. But when he is a little bit experienced, he also knows how to 'play the game'. The commission agent first cleans the gold in two possible ways: by using nitric acid, and/or by going over it with a magnet, so that iron particles are at least removed. Then he puts the gold concentrate on scales which he holds between thumb and forefinger. He balances the amount of gold with suitable weights. This step usually takes some minutes, as the seller will try to put some different weight instruments on the scales in an attempt to achieve a better equilibrium. Seller and buyer discuss for a few moments and eventually agree on a weight, and thus a price. I never observed a transaction that was broken off at this point. This fact highlights the importance of bargaining, which is influenced by a number of factors. Apart from experience, there is also the issue of having large volumes on offer, which gives the seller a better bargaining position, and the personal (credit/debt) relation between buyer and seller.

Trickery is thus one of the ways in which commission agents can benefit from the gold trade. In this sense it may be considered as a 'weapon of the weak'. Yet there are also limits to what is judged legitimate, because when cheating occurs on a larger scale and is believed to be exaggerated it is no longer accepted. For example, jewelry shops in Uvira have a bad reputation because they are said to juggle with the weights and try to mix real with false material⁸²⁶:

"They play with the scales! How? You bring your gold. They put it on a plate to clean with acid. They make many moves, and in the end you'll find that your initial 10 tolas have become 9 or 8.

⁸²² See section 10.1.1. This was confirmed in UN (2014: annex 67).

⁸²³ Interview with commission agent, Kamituga, 11/08/2009.

⁸²⁴ Interview with commission agent, Kamituga, 14/08/2009.

⁸²⁵ Interview with commission agent, Kamituga, 08/2009.

⁸²⁶ In Uvira there are three large buying offices that do not have their own licence, but operate under the licence of trading houses in Bukavu. Apart from that there are also a number of jewelry shops, as can be found in Bujumbura as well, which buy gold and sell jewelry. Interview with trader, Uvira, 24/03/2010.

The rest they have put aside, but they will tell you that it consisted of impurities. They also mix with fake gold. They steal and they cheat. They have no financial capital of their own. The only profits they make are the quantities they steal"⁸²⁷.

Some traders indeed try to sell counterfeit material. One of the ways to produce such a material that looks like gold, is to flake off copper and process it in order to obtain the form and colour of gold flakes, for example by whirling it around in a container filled with sand and cooking the material in palm oil⁸²⁸. The nitric acid test should help to discover these frauds. But counterfeiting is definitely not morally accepted⁸²⁹. As said in chapter nine, honesty is considered to be an indispensable quality in the gold trade, so deceivers transgress the professional norm. They ruin their reputation and are unlikely to last in the business.

10.2.8. Access to smuggling

Another, related access mechanism is access to smuggling. If we think of this as a rights-based access mechanism, we are very much in line with the 'flight' and 'disengagement' accounts that were discussed in chapter one and that consider involvement in the 'informal' trade as a 'weapon of the weak'. This section shows how smuggling can indeed be an access strategy applied by small traders, but also how it can function as a 'weapon of the strong'.

As table 17 showed the price difference between Bukavu and Bujumbura was almost USD 1 per gramme, which is about USD 10 per tola and USD 1000 per kg. This can be partly explained by the difference in tax regimes⁸³⁰. However, in 2013 the Burundian government adopted a new Mining Code, which increased the tax on exports of precious minerals from 0.3 to 2 percent, thus coming a bit closer in harmonising with the DRC. The law foresees in large penalties for gold smugglers as well (UN, 2014: par. 193). Yet with a price different of USD 1 per frame, it made a lot of sense to cross the border, even with small volumes. According to one of the Bukavu traders who regularly crossed the border with smuggled gold, a ticket for public transport cost only USD 15 and one needed about USD 50 to spend the night and eat in Bujumbura, so when you had about 7 tola with you, the costs you made for the round trip were already covered⁸³¹. The traders have developed creative ways of smuggling gold, taking advantage of the fact that gold is low in volume and high in value. They may either try to take the gold parcel across unnoticed, bypass the official border points, or underreport and make agreements with customs officials.

First, traders may hide the gold under the hood of a car⁸³², or as the volume is so limited, they just take it with them on the bus and try to attract as little attention as possible:

"I travel by bus. That is less suspicious. At the outgoing border post in Uvira I say that I come from Uvira, not from Bukavu. In Burundi I say that I come to visit family. If you behave normally, everything will be ok. You must never tremble or show anxiety"⁸³³.

⁸²⁷ Interview with trader, Uvira, 24/03/2010.

⁸²⁸ Personal communication, Paris, 02/05/2013.

⁸²⁹ Interview with trader, Kamituga, 11/08/2009; interview with trader, Bukavu, 23/07/2009.

⁸³⁰ Interview at Mining Administration, Bujumbura, 17/03/2010; focus group with traders, Kamituga, 22/01/2011.

⁸³¹ Interview with trader, Bukavu, 28/03/2010.

⁸³² Interview with transporter, Gatumba, 20/03/2010.

⁸³³ Interview with trader, Bukavu, 21/01/2011.

As in other forms of small cross-border trade, women, children or disabled are frequently mobilised as well (Titeca and Kimanuka, 2012)⁸³⁴. The women bind the gold parcels in a small pocket around their belly, which is the way in which they typically carry money, so people tend to think it is just cash⁸³⁵. These women are reportedly paid USD 20 to 30 to bring a package across the border, where the gold trader is waiting for them⁸³⁶. Second, traders may bypass the official border points. For example, they cross Lake Tanganyika in praus at night⁸³⁷. Both strategies actually involve both a physical security risk and a financial risk. The security risk comes with practices like crossing the border at night, in shaky praus, and passing through areas where criminal groups are active (see also Titeca and Kimanuka, 2012: 41). Another risk is that a trader is caught, his goods are confiscated and/ or he has to pay a fine, as one Bukavu trader exemplified:

"There are always risks in business. A while ago one of us was caught with a package worth about USD 15,000; he had to pay a USD 7000 fine. That happens"⁸³⁸.

More specifically, this may happen when the trader has not made a priori arrangements with the border officials, since the latter offer protection against confiscation. They are easily corrupted and are complicit with much of the cross-border smuggling. What smugglers often do, is to bribe the customs officials and then underdeclare the goods they are transporting so as to evade taxes:

"Everything depends on you. You may say for example: I have 2 kilos, while in reality you have 10. Then they will say: give me USD 100 or 200, they may even give you an escort to your house for USD 100"⁸³⁹.

The research shows that mainly larger traders make these kinds of agreements with border officials since they can afford to invest more money in it on the one hand, and since they run higher risks because of the volumes and amounts of cash they transport on the other hand. In other words, they are more constrained by the way in which this cross-border trade is organised. But they also have better access to mechanisms to protect themselves.

On the way back from Burundi to the DRC traders take either manufactured goods or foodstuff⁸⁴⁰, or US dollars⁸⁴¹. As will be illustrated later these US dollars are very important and supply the market in eastern DRC with foreign currency. Once in the DRC they are used to purchase tradeable goods or they are reinvested in the network, which means that the cash is sent to commission agents or to smaller traders, who at their turn pre-finance shaft managers or miners. New and crispy US dollar bills are preferred, since they also have the advantage of being smaller in volume and thus taking less space than the Congolese francs, as one Burundian trader explained:

⁸³⁴ Interview with civil society member, Uvira, 19/03/2010.

⁸³⁵ Interview with transporter, Gatumba, 20/03/2010.

⁸³⁶ Interview with trader, Bukavu, 04/01/2011.

⁸³⁷ Interview with Congolese trader, Bujumbura, 17/03/2010; interview with trader, Bujumbura, 16/03/2010.

⁸³⁸ Interview with trader, Bukavu, 04/01/2011.

⁸³⁹ Interview with trader, Bujumbura, 16/03/2010; interview with trader, Bukavu, 28/03/2010.

⁸⁴⁰ Interview with jewelry shop owner, Bujumbura, 18/03/2010.

⁸⁴¹ Interview with master trader, Bujumbura, 17/03/2010.

"So these Congolese hide the new US dollar bills in their trousers, their pockets and their underwear. One day I had paid two Congolese, who started to undress in my office and spread the bills all over their body"⁸⁴².

From the side of the border officials, participating in the cross-border smuggling generates good profits. Moreover, Burundi as a state also benefits from this trade, as Congolese gold is exported and taxed as Burundian gold⁸⁴³. Therefore, some respondents said that on the Burundian side of the border there is no interest at all in containing the inflow of Congolese gold⁸⁴⁴. The resigned answer of a Burundian policewoman at the Gatumba border point (at the Uvira-Bujumbura border) at least did not seem to contradict this:

"[What are you doing here?] We have to control the Gatumba-Bujumbura road, control the passengers in the cars, make sure there is no fraud... [What kind of fraud?] Oh, it's a bit vague... [Is there any gold passing?] Not much. [Or maybe you don't find it?] Yes, maybe we don't find it"⁸⁴⁵.

Given the extent and the frequency of these practices one may wonder whether this crossborder trade in gold can be analysed in terms of a moral economy, a "legitimate source of survival", like Titeca and De Herdt (2010) did for cross-border trade between northeastern DRC and Uganda. This issue can be looked at both from the side of the state agents involved and from the side of the traders. The state agents levy illegal taxes and demand bribes for their private gain, or to complement their incomes which are insufficient and irregularly paid. But "all this does not necessarily run against the interests of the national state" (idem: 589). On the contrary, so Titeca and De Herdt (idem) argued, the state (Ugandan in this case) gains a political advantage from accommodating these smuggling activities and conserving the 'practical norms' that surround them, and these practices and norms are "essential to the functioning" of the state (idem). In the case under discussion here it can be argued that the Burundian state has no interest in halting these smuggling activities either, since it benefits from the Congolese gold exports through taxation and licences purchased by 'comptoirs'. The Congolese state does seem to have an interest in curbing these fraudulent exports, as it now loses out on a lot of potential revenues. Yet first of all the rents that can be generated on industrial mining are larger, so that is what the national government currently prioritises. Besides, for individual state agents the artisanal mining sector and mineral trade present an opportunity to substitute for their salaries and are a source of "personal survival" (Trefon, 2011), which in a way frees the state from the responsibility of paying their salaries.

The gold traders I interviewed expressed a clear preference for the unofficial taxes over official ones, an observation that was equally made by Titeca and Kimanuka (2012: 39). Despite the fact that they try to evade the former as much as possible, traders know that sometimes they have to 'play the game' and make payments to customs officials and policemen. But these payments are seen as negotiable, which is considered to be an advantage, and at least they get something in return for these payments, namely a certain protection from confiscation or

⁸⁴² Interview with master trader, Bujumbura, 17/03/2010.

⁸⁴³ See export statistics in section 2.2.1.

⁸⁴⁴ Interview with trader, Bukavu, 28/03/2010.

⁸⁴⁵ Personal communication with policewoman, Gatumba, 20/03/2010.

arrest. The negotiation of taxes for cross-border smuggling is thus an access strategy, or as Hibou (1997: 81) wrote:

"Customs evasion or smuggling, then, cannot be considered in isolation as an activity which is simply illegal or criminal, but is better seen as one among a larger variety of techniques designed to exploit opportunities offered by the state and to gain access to the profits generated by operating between the local and international sectors."

Nevertheless, two remarks must be made in this respect. First, larger and wealthier traders are better equipped to make the necessary connections and to pay for this protection. They make agreements with higher-level officials, so that they can smuggle larger volumes and make greater profits. Second, the question may be asked whether smuggling as an access strategy is sustainable and developmental. This question will be discussed in section 10.2.11. A circuit that is not being further analysed in this research is the militarised network of the gold trade (but see reports of the UN Group of Experts). Although it falls beyond the scope of this study, it is clear that smuggled gold is also used to finance less kosher operations, such as the arms trade (UN, 2009 and 2012) or money laundering (Hibou, 1997: 81). In 2011, for example, four foreigners from the US, France and Nigeria were arrested on allegations of smuggling at least 436 kg of gold on the Goma airport. They allegedly purchased the gold from a military officer close to Bosco Ntaganda (BBC News, 2011; RNW, 2011; Stearns, 2011).

10.2.9. Access to foreign currency

I started this part with the observation that profit margins in gold are quite small, and the subsequent question whether there are other ways for traders to benefit from gold. In the following two sections two of these ways will be discussed. First, trading in gold provides easy access to foreign currency. Second, because it is accepted as a hard currency, it also provides access to markets in other tradable goods.

Gold has a number of qualities which make it well suited to be used as "the material of money" (Marx, 1859). It has a relatively homogenous, pure quality which makes it useful as a standardised means of exchange, as equal quantities represent equal values. It can be found in nature in a relatively pure form. It can be easily decomposed and recomposed without losing quantity. It represents considerable weight and labour time in a relatively small volume, which facilitates transport. It is durable, does not oxidise when exposed to air, does not dissolve in acids other than aqua regia and has aesthetic qualities (idem). In the context of eastern DRC, it is still used as a hard currency. It is also sought after in the region because it is a source of foreign exchange. As De Herdt (2002: 686) explained, the post-independence period in Zaire-Congo has been characterised by an unstable local currency, and a subsequent dollarisation of the economy. He estimated that in the early 1980s about two thirds of the monetary mass in Zaire was foreign money, mainly US dollars (idem: 687). It was mainly procured by traders involved in illegal cross-border trade (Ellis and MacGaffey, 1996: 32). The period 1990-1996 was one of hyperinflation due to "Mobutu's announcement of the end of the one-party state, [...] the virtual bankruptcy of the banking sector, the withdrawal of foreign direct aid flows and the implosion of the copper sector" (De Herdt, 2002: 686). Consequently, it became increasingly important to make use of US dollars. The fraudulent export of raw minerals, in the 1990s mainly diamonds, remained the most important source of this foreign currency (Geenen

and Marysse, 2008). The same was true in the early 1990s in Burundi, where the export earnings from gold exceeded those of coffee, which was traditionally considered to be the main provider of foreign currency (Nkurunziza, 2002: 11). This gold was primarily sourced from eastern DRC and transited through Burundi's export processing zone. According to Nkurunziza (idem) during this period about 100 kg of Congolese gold worth about USD 1,200,000 were weekly sold in Burundi: "Of this amount, one-fourth to one-third was spent in Burundi through the parallel market" (idem). Nkurunziza also noted that contrary to other exporters, exporters of gold were not required to surrender their export income to the central bank. A former master trader in Bujumbura explained how these export offices played the "role of a bank" themselves:

"Sometimes we needed cash money. Our suppliers who brought gold for a value of let's say USD 20,000, they demanded to be paid cash, in US dollars, not in Burundian francs. If we needed it, we asked our clients, like Metalor, not to put the money in our bank account, as we usually did, but to send us cash. They did it through the same channel: by sending us US dollar bills with a Sabena airplane. At the time, an individual was not allowed to keep US dollars in Burundi, everything had to be deposited at the Central Bank. But we had an arrangement with the Central Bank. They allowed us to keep the cash, on the condition that we paid 5 percent of the value to the Bank."⁸⁴⁶.

In her work on the 'criminalisation of the state' Béatrice Hibou (1997: 83) referred to the case of the gold (and ivory) trade, commodities which are regarded as "sources of revenue and suitable forms of saving or raising capital or for use in the acquisition of other goods, in other words as forms of money". For certain groups of people these commodities became "virtually the only link between the local and international economies in situations where currencies are unconvertible and where hard currency is scarce or is allocated only to those with political connections" (idem). Ellis and MacGaffey (1996: 31-32) also highlighted the importance of access to foreign currency in a context where so many goods need to be imported, and more significantly, the importance of access control by powerful actors. They argued that "government ministers and officials regulate access to hard currency either by their control of the state, or by going into business themselves or through nominees including members of their own families, or indirectly, by forming alliances with traders. The interplay of the resulting trade and clientelist networks is an ingredient in most successful political careers in Africa" (idem).

Since 2003 the DRC has experienced economic growth and has managed to get a better grip on inflation (Marysse and Tshimanga, 2013: 1). The exchange rate is performing well and the national currency has been relatively stable over the past few years. This means that there is a large influx of foreign currency, which is nowadays mainly sourced via the export of copper and cobalt, for which industrial production and official exports are rising above the peak levels of the 1970s (idem). Yet despite this relatively good macroeconomic performance, 89 percent of the monetary mass in Congolese bank accounts is still in US dollars instead of Congolese francs. Therefore the government in 2012 declared a start to the process of 'dedollarisation' of the economy, encouraging all Congolese to use national currency in their transactions (Le

⁸⁴⁶ Interview with former master trader, Bujumbura, 23/03/2010.

Potentiel, 2012). For mineral export offices, the Mining Code⁸⁴⁷ stipulates that they can open a bank account at any Congolese bank and retain the right to have it in foreign currency, without any obligation to convert it into national currency. However they are required to repatriate at least 40 percent of the proceeds of the exported goods within 15 days. The remaining 60 percent can be deposited in a foreign bank account, but all details must be communicated to the Central Bank of the DRC. Still many Congolese remain suspicious vis-à-vis the dedollarisation measures⁸⁴⁸. Traders continue to have more confidence in US dollars and carry on complaining about the shortages. An employee of a Bukavu 'comptoir' for example explained that the repatriation of foreign currency needs to go through the Central Bank, which distributes it among the commercial banks, resulting in perpetual shortages⁸⁴⁹. When there is no cash available in the export office suppliers may just leave their gold and await their payment later⁸⁵⁰. As the export figures for gold and data about registered 'comptoirs' displayed, the government has not yet convinced the gold traders to send their production through official channels⁸⁵¹.

The appreciation for gold as a hard currency or a safe-haven even grew in the wake of the recent financial crisis, which eroded confidence in traditional hard currencies like the US dollar and the euro. As a consequence investors and banks tried to buy as much gold and other precious metals as possible since these were regarded as a stable store of value and hedge against inflation. This of course made prices rise. Traders in the region also realised this, as the following quote demonstrates:

"Buying gold is also a way to stabilise the money. People like to buy gold because if you keep gold, you keep cash. It is not like US dollars, because that currency is not stable. That is why the prices are rising so high; even banks want to buy nothing but gold now"⁸⁵².

Access to foreign currency definitely is important for the large traders operating at regional and global markets as they can use their access to US dollars to trade in all kinds of manufactured goods and this way accumulate even more capital. But also at the local level access to foreign currency is valuable. Local gold traders may function as intermediaries in transactions involving the conversion of local into foreign currency. In a buying office I encountered a woman coming straight from the Kamituga food market and putting piles of Congolese francs on the table. The commission agent explained:

"She has sold her stuff and brings her Congolese francs here. We are going to use it to buy gold. We send the gold to Bukavu and in Bukavu we can pay her [or her family] in US dollars. With these US dollars she can buy new merchandise. That is an example of how it works"⁸⁵³.

In the absence of functioning banking systems, these exchange practices have proven to be very effective.

⁸⁴⁷ Mining Code, T. 10, Ch. 2, Art. 266-272.

⁸⁴⁸ Interviews with students, Bukavu, 10/2012.

⁸⁴⁹ Interview at Namukaya, Bukavu, 23/07/2009.

⁸⁵⁰ Interview with trader, Kamituga, 20/08/2009.

⁸⁵¹ See section 2.2.1.

⁸⁵² Interview with trader, Bujumbura, 16/03/2010.

⁸⁵³ Interview with commission agent, Kamituga, 18/08/2009; interview with commission agent, Kamituga, 20/08/2009.

10.2.10. Access to alternative markets

At all levels in the gold trade, traders use gold in order to gain access to markets in other tradable goods. Gold is then used as a means of payment or exchange. In Kamituga one trader told me that besides his gold buying office he operates a beer selling point, thanks to which he has a constant flow of Congolese money. He uses this money to pay the gold suppliers and when he goes to Bukavu and sells the gold there for US dollars, he can use that money to buy new beer⁸⁵⁴. Some 'patrons' in Bukavu send agents to the mining sites with consumer goods or foodstuffs to sell against gold. The gold concentrate is then transferred to Bukavu and the money from the sales is used to buy more goods⁸⁵⁵. At the food market gold is accepted as a means of payment too, so customers may pay for their daily beans or salted fish with small quantities of gold. This is not appreciated by the local gold buyers, who feel it is unfair competition⁸⁵⁶. It evidences that gold is used as a general equivalent to pay for all kinds of goods. This practice explained by a FEC representative in Bukavu:

"You first have to realise that the exploitation of minerals in done in rural environments. With the liberalisation of the mining sector the villagers have started to exploit. And from a certain moment on, one could observe that in places like Lulingu and Lugushwa, there were no banknotes anymore. All market transactions were done in coltan, cassiterite or gold. It was almost a barter system. It means that villagers and farmers exchanged rice and flour with miners against coltan and cassiterite. And the villagers paid their wax [cloth], tiles, medicines and so on with minerals. In my village for example everything was paid in minerals, including school fees and medical costs. At the end of the month, every pupil paid a 'kikonke' [a small tin of tomato purée] for the school fee. A man whose wife was pregnant already started to keep some coltan under his mattress, in order to be able to pay the costs for the hospital or the midwife on the big day. And those traders selling wax, tiles, or salt in our villages went on to sell the minerals in Bukavu at the trading houses. With that money they again bought clothes, jeans, flour and what do I know, to take it again to the mining sites. That brought along a whole commercial dynamic"⁸⁵⁷.

Also between Burundi and the DRC and Burundi and Dubai the trade in gold is often combined with trade in other goods. From Bujumbura for example, Congolese traders take fish (from Lake Tanganyika), manioc flour and sugar, soap (at Savonor), beer and soft drinks (Brarudi brewery), fabric and clothes (Cotebu) and construction material (cement, tiles and nails)⁸⁵⁸. From Dubai electronic goods and computers as well as cars have become extremely popular. In addition to being complementary to the trade in gold, the trade in other goods may also be a useful cover for illegal transactions, as a Bujumbura based trader explained:

⁸⁵⁴ Interview with trader, Kamituga, 08/2009.

⁸⁵⁵ Interview with commission agent, Bukavu 29/07/2009; interview with trader, Kamituga, 13/08/2009. See also Ellis (1997: 65): Congolese traders who want to purchase consumer goods in South Africa cannot bring cash since their currency is almost worthless, so "they sometimes acquire small quantities of gems, gold, ivory, rhino horn, local works of art or any other goods which are easily transportable and which they take to South Africa as a form of currency rather than as a commodity".

⁸⁵⁶ Interview with commission agent, Lugushwa, 26/01/2011.

⁸⁵⁷ Interview at FEC, Bukavu, 11/02/2011.

⁸⁵⁸ Interview with transporter, Gatumba, 20/03/2010.

"When you want to trade minerals officially, you have to do a lot of administration and pay a lot of taxes. Most try to keep it secret. They officially trade in other goods, for example fuel. So the fuel I import from the Middle East, I can transport it to Congo. But as a payment, I am not going to ask for money, but for gold. So when I leave for the Middle East, I don't leave with cash money, I leave with gold. And when I arrive there, I know that someone will be at the airport and the transaction will be concluded in secrecy as well"⁸⁵⁹.

In brief, traders do not just trade in gold in order to make a profit on the gold, but because it is a widely accepted means of exchange. The aforementioned examples illustrate that both small and large traders make use of this quality and employ gold to gain access to other goods.

10.2.11. Access to the state regulatory framework

The observation that elites have better access to the state regulatory framework has frequently been made in this dissertation. Thanks to their access to information, vertical relations and financial capital and technologies, they are more likely to have their claims recognised by the state. They can thus use structural access mechanisms to support rights-based access mechanisms and in a context of formalisation their rights tend to be better protected. This section reports on how different traders use their access to the state regulatory framework.

At the level of the 'comptoirs' I already said that the number of officially registered offices has remained quite low. Apart from the difficulties of gaining access to the market as displayed earlier, this is also a consequence of the high costs for opening a 'comptoir'. Having been fixed at USD 50,000 per year before⁸⁶⁰, in December 2008 the fees were reduced by 90 percent (i.e. to USD 5000 per year). But this did not seem to have an effect on new export office openings in the province. Other taxes and contributions that are applicable to export offices can be found in table 1. To these taxes and contributions, all kinds of unofficial payments need to be added, for example to state agents for the receipt of certain documents. The UN Group of Experts (UN, 2012: 195) quoted Evariste Shamamba on this issue, who said that "these costs amount to ten percent of the value of officially exported gold". Yet it can be observed that large master traders like Shamamba and Mutoka do purchase official licences for their export offices, while continuing to do part of their business in an unofficial way. This partial compliance is a strategy that protects them from harassment and excessive state involvement.

At the level of the Bukavu traders the majority is not officially registered. Yet the number of 'cartes de négociant' sold seems to be mounting year after year. Data from the Provincial Mining Division presented in section 2.2.2 showed that in 2012 87 traders had bought such a traders' permit, against 72 in 2011, 41 in 2010, 42 in 2009 and 34 in 2007. In 2008 a ministerial decree had prescribed a reduction in prices to USD 500 for a card category A (permit to buy gold in Bukavu) and USD 150 for category B (permit to buy gold outside Bukavu). From the 87 registered traders in 2012, 44 fell under category A, 37 under category B, and for 6 there were no specificities. But these traders are also forced to pay a range of unofficial payments to various public services:

⁸⁵⁹ Interview with trader, Bujumbura, 16/03/2010.

⁸⁶⁰ Interview at Namukaya, Bukavu, 27/03/2008.

"I am a trader category A because I have an office in town. I pay a card for USD 500. They say 500 but it really is 530. They will write down 500 and 'eat' ('bouffer') the USD 30. It disappears in their pocket. But that does not prevent them and other services from coming by and asking you all kinds of things"⁸⁶¹.

"We fight against the harassment ('tracasseries') by the administration and politicians. For example we need to pay taxes to the foreign trade service ('commerce extérieur'), but that should not be applicable to us traders, because we have nothing to do with exports. Then there is ANR, DGI and so forth. Everyone asks something from us, at least 13 different services"⁸⁶².

At the local level even fewer gold traders are officially registered. In the period between September 2008 and August 2009, documents from the local Mining Division in Kamituga indicated that between 20 and 25 traders were registered. The figures slightly varied from month to month. In Lugushwa it was estimated that about half of the offices (50 in total) were registered. But what does it mean to be 'registered' at this level? It certainly does not imply that they are also officially recognised at the Ministry of Mines or that they bought a traders' permit with one year validity, as the Mining Code requires. In fact the probability is almost non-existent, as figures from 2007, 2010 and 2012 respectively (Provincial Mining Division) showed that only four, one, and two traders based in Mwenga territory had bought such a permit. What is 'official' about these buying offices' status is the fact that they have been identified by the local bureau of the Mining Division and that they make certain payments and contributions. These payments are not legally anchored, but result from the 'legal command' (Englebert, 2009) state agents, such as the agents of the Mining Division and of Saesscam, have.

State agents – working for the mining services like Mining Division or Saesscam, but also the 'chef de poste', policemen, soldiers or the magistrate – use their 'state uniform' to impose all kinds of payments on the traders (just like on the miners)⁸⁶³. Payments are also imposed by non-state agents, in this case particularly the customary chiefs who, as I have argued, preserved part of their 'command' in the domain of control over access to land. However, they seem to even have extended this domain, since they also demand contributions from gold traders. Whether their demands are perceived to be legitimate in the eyes of those who have to pay, whether they are part of a moral economy, depends. While many people consider that the chief has the right to share in the profits from gold exploitation and trade, there certainly are checks and balances. When payments are believed to be too high, traders do negotiate, complain or protest⁸⁶⁴. In Mukungwe for example payments run up very high, with weekly contributions to the 'chef de groupement', but also to the 'chef de camp' and to the military⁸⁶⁵. In total they may run up to several hundreds of US dollars and although at the time of my field visits many people were afraid to speak out, there definitely was dissatisfaction with this state of affairs and some miners and traders had already complained⁸⁶⁶.

⁸⁶¹ Interview with trader, Bukavu, 29/07/2009.

⁸⁶² Interview with president of traders' association, Bukavu, 25/04/2008.

⁸⁶³ See chapter eight.

⁸⁶⁴ Interview with advisor of 'chef de groupement', Kamituga, 28/01/2011.

⁸⁶⁵ Interview with trader, Mukungwe, 01/06/2012.

⁸⁶⁶ Idem.

With respect to public institutions, Saesscam's mandate is to assist artisanal miners. Legally they should not get involved with trade. Nevertheless traders frequently complained that they paid monthly contributions of about USD 10 to Saesscam agents. An official traders' permit ('carte de négociant') costs USD 500 for category A (Bukavu based) and 150 for category B (based in the mines and commission agents)⁸⁶⁷. But in Kamituga traders pay an extra USD 30 to cover the 'administrative costs' of the bureau of the Mining Division⁸⁶⁸. They find these amounts to be relatively high and try to 'circumvent' them in different ways. They may, for example, buy permits for every other year instead of every year, or just pay part of the required contribution after a negotiation. Many offices also operate under the cover of an officially registered office, so one 'main office' may have various 'branches'. Many buying offices thus operate in a semi-official way, partly complying with the regulations imposed by different state services, partly escaping them.

In this sense it can be argued that these taxes and controls by state agents constrain traders' power. Yet faced with these constraints, the traders also use these taxes to protect themselves by complying with the official framework – to a certain extent – while simultaneously continuing their business in the unofficial trade. The advantage for partly complying with the regulations indeed lies in the fact that it provides a degree of security and protection from harassment. But that has nothing to do with a kind of 'social contract' in which contributions are paid in exchange for provision of services. There is a general feeling that the payments only serve the individual profit of state agents:

"We conclude it does not help, because the taxes we pay end up in the stomachs of those who make us pay"⁸⁶⁹.

Yet Titeca and Kimanuka (2012: 25) argued that the fact that these taxes are unrecorded and thus do not contribute to public revenues "does not necessarily mean that they make no contribution to public goods and services, for example by adding to the very low salaries received by public officials". Indeed, one may argue that they are essential for complementing the meagre and irregular salaries of state agents, as was said before. From the traders' side, the advantage of these kinds of taxes and contributions is also that they can be negotiated, as they are mostly exchanged in a transaction between two individuals, as Titeca and Kimanuka (2012: 39) also observed. Just as in the case of these cross-border traders (idem), the small gold traders expressed a preference for these unofficial taxes. In the formalised sector, taxes and contributions are believed to be even higher and control by the state would be much tighter, which as I have said before is not an appealing idea for the actors in the gold business. For the gold traders, it is also easier to escape taxation than it is, for example, for Titeca's cross-border traders who carry along all kinds of goods. Since gold is so easy to hide and has such a high value, it is possible to cross the border without having to pay any taxes or bribes at

⁸⁶⁷ See section 2.2.2.

⁸⁶⁸ Amounts of USD 30 are mentioned. Interview with trader, Kamituga, 12/08/2009; interview with trader, Kamituga, 07/04/2008; interview with commission agent, Kamituga, 11/08/2009; interview with trader, Kamituga, 20/08/2009; interview with commission agent, Kamituga, 10/08/2009; interview with commission agent, Kamituga, 07/08/2009; interview with trader, Kamituga, 10/08/2009.

⁸⁶⁹ Interview with commission agent, Kamituga, 12/08/2009. See also Titeca and Kimanuka (2012: 34): "Traders have the impression that the only aim of these taxes is to 'satisfy the hungry stomachs' of public officials".

all. On the other hand, I also said that it involves risks, especially when traders want to cross at non-official border points. Participating in a formalised system, including formal taxation, would make sense for gold traders only if it were to give them protection and access to better prices. But in that case prices would need to be monitored and harmonised by the governments of all the countries in the region, so as to make the unofficial market less attractive.

10.3. CONCLUSION

The chapter analyses the micro-functioning of the gold trade, looking at the norms regulating the gold trade at different and overlapping levels (local, provincial, regional, global) on the one hand, and at actors' strategies to deal with these on the other hand. The description of these strategies is structured on the basis of different access mechanisms, and the analysis allows us to draw some conclusions about power in the gold chain.

If we consider prices in the gold chain as presented in table 17, we see that margins are relatively small with the value added from producer to consumer being about 14 percent. But the benefits at the bottom of the chain are distributed among many actors, while at the top of the chain large volumes are concentrated in a few hands. Still the small(er) traders have a number of mechanisms at their disposal to maintain and enhance their access, such as access to horizontal relationships, to information and to trickery. Yet the same mechanisms can also be used by large(r) traders in order to control access. Indeed, the availability of mobile phones and the internet has significantly improved small traders' awareness of world market prices, but these traders may as well lose out because they are not capable of doing complex price calculations taking into account a range of uncertain factors determining the price, they do not have the technology to test the purity of the material they are buying and selling, and they may not dispose of the financial capital to buy new material. Similarly, small traders cheat with the balances and weight units in order to increase their own profit margins, but wherever they sell their gold they will probably be tricked as well. In this sense it is all a matter of scale. Large traders make big money by dealing in large volumes. Indeed, although the gold trade provides benefits to a multitude of actors at the local and intermediary levels, the higher up in the chain, the more the gold flow is concentrated in the hands of a limited number of extremely wealthy and powerful traders. Large traders also cheat on a large scale. But this means that in the case of smuggling for example, the risks are higher for them, and therefore they need to make very costly arrangements with and seek protection from high-level security people or politicians.

This shows that the 'ability to benefit' is never absolute or definitive, but the outcome of a continuous bargaining process and the product of a changing political-economic context. All access mechanisms are ambiguous: what constitutes a constraint for one particular (group of) actor(s) under a specific circumstance may be an opportunity for others. This could be observed during the war period, which created opportunities for traders who established the right political connections, while the same traders became discredited after the war. The 'changing political-economic context' is indeed important, for the gold sector does not only function according to its proper norms, but is also influenced by external evolutions, events and policies. This will be the subject of part four.

Figures 26-27. Coins and other weight instruments with their unit of measurement (left), manual scales (right)



Figure 28. Calendar of Établissements Namukaya



Figure 29. Electronic scales used by a Bukavu trader



Figure 30. Sign indicating the prohibition to enter the core area of the mining project



PART FOUR

CHAPTER 11. CHANGES IN ACCESS: FORMALISATION

"On procéda ainsi pendant trois jours, au bout desquels le bureau afficha les noms de ceux qui, ayant obtenu le plus de voix, accédaient aux postes à pourvoir. Cette nouvelle administration ne changea, pour le moment, rien à nos lois, us et coutumes" (p.130).

> "We continued like that for three days, after which the names of those elected in the powerful positions were posted. This new administration made no change to our laws, usages and customs for the time being" (p.130).

This part describes recent processes of formalisation and industrialisation and analyses them in terms of a (re)configuration of access mechanisms. In recent years the artisanal mining sector in South Kivu has come under a lot of pressure. The first problem is its persistent association with violent conflict and underdevelopment. The resulting policy recommendation, as was already discussed in chapter two, is to further regulate and formalise the artisanal mining activities. Once the artisanal mining sector is formalised, the government's vision is to evolve towards a semi-industrial or small-scale sector in which resources are efficiently exploited by cooperatives, using small machinery. A second pressure, however, results from the growing interest and presence of industrial mining companies. As was said before, international as well as national policies tend to favour the large-scale industrial sector, as it is believed to contribute most to growth and development. The tendency towards industrialisation will be discussed in chapter twelve. In this chapter I give an overview of regulation/formalisation initiatives taken by both international actors (section 11.1) and the Congolese government (section 11.3). Next, I analyse those initiatives as mechanisms of access control (section 11.2 and 11.4). In conclusion (section 11.5), the changes in access might lead to more dispossession of small-scale miners and traders, but they cannot be fully forced through because some practices and norms in the gold sector are resilient to change.

11.1. OVERVIEW OF INTERNATIONAL INITIATIVES

Over the past decade, a multitude of international actors have proposed a myriad of initiatives in order to better regulate artisanal mining. The actors include international organisations, national (western) governments, industry organisations, international NGOs and private companies. The initiatives are either voluntary or mandatory. They are often uncoordinated and sometimes ad hoc. But they have one common aim: stopping the involvement of armed groups in mineral exploitation and trade and breaking the direct link between minerals and conflict. The reasoning is thus based on the consensus that 'conflict minerals' still are the most pressing issue, and that in order to solve this issue, the artisanal mining sector must be further regulated and formalised. In section 2.2.1 I already critically discussed the 'conflict minerals narrative'. Here I want to give a brief overview of policy initiatives that have been proposed so far⁸⁷⁰.

⁸⁷⁰ For further discussion of the initiatives, see Areskog Bjurling et al (2012); Bafilemba et al (2012); Blore and Smillie (2010; 2011); Carisch (2012); De Koning (2011); Eurac and Fatal Transactions (2011); Geenen and Custers (2010); Global Witness (2011a); Johnson (2010; 2013); Johnson and Tegera (2005); Manhart (2013); Perks and Vlassenroot (2010); Pole Institue (2010); Pöyhönen et al (2010); Resource Consulting Services (2011); Seay (2012); Stearns and Hege (2010); Sullivan and Atama (2010); Tegera (2011); Triest (2012); Verbruggen et al (2011). See first the articles by Geenen and Custers; Perks and Vlassenroot; and Johnson for a critical discussion and a view from the ground.

The first UN report (2001) proposed an embargo on minerals trade, which was never executed because of a lack of political will and the increasing recognition that the effects were expected to be limited. In addition, the 'bad guys' would most probably find ways to circumvent these sanctions (Marysse and André, 2001). Subsequent UN reports and statements advocated for targeted sanctions. In 2003 for example, the Security Council adopted a resolution for an arms embargo to non-governmental troops and put in place a Sanctions Committee and a Group of Experts to oversee the sanction regime (UN, 2003). Yet by 2008 the discourse had shifted from sanctions (as a stick) to a discourse of due diligence (a carrot), focusing on the responsibility and moral obligation of consumers and buyers not to use, sell or buy minerals that contribute to conflict and human rights violations. The lead was taken by the UN and several NGOs, appealing to companies and consumers to adhere to due diligence guidelines and monitor the supply chain (UN, 2008 and 2010; Global Witness, 2010a and b). The OECD (Organisation for Economic Cooperation and Development) has also drawn the attention of companies and governments to a set of guidelines for responsible supply chains (OECD, 2011a and b). Most of these initiatives are voluntary guidelines, calling upon responsibility and moral obligation. Other initiatives, however, have been incorporated in legislation, and thus can be enforced. In July 2010 a law on financial reform passed in the US Congress, including a requirement for mineral buyers in the USA to perform due diligence on their purchases from the DRC and neighbouring countries, and thus make sure that they are not buying conflict minerals (Global Witness, 2011b; Johnson D., 2013; Resource Consulting Services, 2011; Seay, 2012)⁸⁷¹. The final regulations of the Security and Exchange Commission pertaining to this issue were approved in August 2012. Companies had to comply with the final regulations for 1 January 2013, with the first reports due 31 May 2014. The initiative, commonly called the 'Dodd-Frank Act' or the 'Congo conflict minerals act', inspired some EU parliamentarians to introduce a similar proposal for a joint motion⁸⁷².

The critical factor for these regulation initiatives - be they voluntary or legally enforceable - to have the desired effects is of course their effective implementation. And this implementation is dependent upon functioning traceability mechanisms. Due diligence requires a monitoring of the whole supply chain. It thus presupposes traceability and certification mechanisms, so that each 'parcel' can be traced all the way back to the mine and can be refused or accepted on the basis of well-established criteria. These criteria may range from non-involvement of armed groups to respect for human rights and labour conditions. Certificates would be granted if the mine fulfills these criteria. Such traceability and certification systems have been proposed and piloted by the German government through the Federal Bureau of Geo-Sciences and Natural Resources BGR – the initiative was called Certified Trading Chains or CTC - (Naeher, 2010), by a private company Met Trak (CENADEP, 2012) and by the ICGLR (Blore and Smillie, 2010). The ICGLR (International Conference on the Great Lakes Region) mainly serves as a discussion platform for the countries in the region. In 2006 they set up an initiative 'against the illegal exploitation of natural resources', aiming at regional cooperation and transparency in commodity flows (ICGLR, 2006)⁸⁷³. The initiative encompasses mineral tracking from the mine

⁸⁷¹ The final regulations of the Security and Exchange Commission can be found at http://www.sec.gov/rules/final/2012/34-67716.pdf.

⁸⁷² European Union (2010) Joint motion for a resolution pursuant to rule 110 (4) of the rules of procedure.

⁸⁷³ This research does not aim to assess traceability and certification initiatives. The aforementioned initiatives, which have been piloted in Rwanda and in North and South Kivu, target cassiterite and coltan, and have been delayed because of the temporary ban on artisanal mining activities (see chapter eleven), mounting violence, and

to the export point (traceability), regional tracking via an ICGLR database and third party audits. Initiatives have been taken by the industry itself as well. The International Tin Research Institute (ITRI) for example, which represents the tin smelters, launched a supply chain traceability initiative they labeled iTSCi (ITRI Tin Supply Chain initiative) in 2010⁸⁷⁴. The traceability system requires each bag of minerals to be 'tagged' so that the information can be sorted in a database which is accessible to auditors, companies and governments. Pilot projects were Bisie in North Kivu and Nyabibwe (Kalimbi mine) in South Kivu⁸⁷⁵. The latter was carried out in partnership with BGR, but faced significant challenges, particularly because of the 2010-2011 mining ban that will be discussed later. In 2012 the project in Kalimbi resumed with the assistance of the Dutch government under the so-called 'Conflict Free Tin Initiative' (OECD, 2013a: 44). In Katanga projects for 'closed pipelines' have now also been piloted, meaning a vertical integration of production, processing and export, all in the hands of one steering actor. The company Mining Mineral Resources (MMR), for example, is the key actor in Motorola's 'Solutions for Hope' project in Katanga (IPIS, 2012: 16; OECD, 2013a).

So far, most of these initiatives concern the so-called '3 T's', meaning cassiterite (tin ore), coltan (tantalum ore) and wolframite (tungsten ore). The high value/low volume characteristic of gold renders it more difficult to do this for gold. However, in 2012 the OECD adopted a special supplement on gold to its due diligence guidelines, acknowledging the specificities of the gold supply chain (OECD, 2012). After that, some projects for gold certification were piloted, for example by PAC (Partnership Africa Canada)⁸⁷⁶. The project aims to provide working tools and equipment and improving techniques for artisanal mining, so as to increase production output. The higher output is then supposed to compensate for the price, which is lower at the official market. The PAC pilot in Province Orientale found that artisanal production increased with about 30 percent (OECD, 2013b).

11.2. CERTIFICATION AND TRACEABILITY AS ACCESS CONTROL

The initiatives under discussion are part of a strategy which aims to bring artisanal mining and trading activities under the control not only of the Congolese government – which is believed to be incapable of enforcing its own legislation anyway – but also of international actors. The gold chain is thus supposed to become better governed and more transparent. Although the intentions behind this process are undoubtedly good (Jeroen Cuvelier [2013: 136] states that "the road to the Kivus is paved with good intentions"), this governance shift potentially has farreaching implications. Shifting the control to upstream actors in the commodity chain risks contributing to the dispossession of small-scale miners and traders at the 'bottom of the chain'.

Indeed, research on value chains has demonstrated that standards and certification establish barriers to entry for small-scale producers who often do not have the means to comply with

practical difficulties. In fact, not much happened at all, which became a pressing problem in late 2012, when the final regulations of the Dodd-Frank Act were approved. Other researchers are looking specifically at the effects of traceability and certification mechanisms, see for example the 'Mining and Governance' programme at the University of Wageningen.

⁸⁷⁴ ITRI, *DRC Ministry of Mines reconfirms official support for iTSCi mineral traceability project*, 11/06/2010.

⁸⁷⁵ See Cuvelier (2010); Johnson (2010); Pole (2010); Kilosho et al (2013).

⁸⁷⁶ See http://www.slideshare.net/OECD-DAF/pac-ppa-gold-oecd-nov-2013-1 (accessed 26/02/2014).

the standards (see Guthman, 2007 and Renard, 2005 for agrofood chains and Taylor, 2005 for forests). For Guthman (2007: 457) certification ('labeling') is typical of neoliberal regulation, as it is governed by multiple public and private actors, creates property rights where these did not exist before (the use of the label is a property right in itself), attaches economic value to ethical behaviour and devolves responsibility to consumers. Despite the fact that neoliberalism is frequently equated with deregulation, Guthman (idem) argued that it has actually produced re-regulation, introducing new rules, new rule-setting bodies and new spheres of rule-making which are less coercive and more indirect. The introduction of standards, labels, certificates for quality guarantees or for ethical practices – in this case to avoid conflict minerals – certainly fits this argument.

This can be illustrated by a brief analysis of the process by which the standards on conflict minerals have been set, and an analysis of the impact of the aforementioned initiatives on the ground. The conflict minerals issue was initially put on the agenda by the UN and some international NGOs and has significantly influenced policymaking, as the Dodd-Frank Act or the OECD Due Diligence Guidelines illustrate. The latter were designed and are monitored at annual multi-stakeholder forums organised by OECD⁸⁷⁷. Those meetings bring together representatives of governments, multilateral organisations, mining companies, processing industries and international and local civil society⁸⁷⁸. They are a perfect illustration of the 'new spheres of rule-making' and they create new markets for certified minerals. But they do not only – following neoliberal principles – create markets for the products. They have also created a market for research about conflict minerals. During my fieldwork in South Kivu, I found that many local organisations have seized the opportunities created by the ever increasing attention paid to conflict minerals and to the funding that comes with it. Many self-declared experts carry out consultancies, civil society organisations host seminars, conferences and workshops and dozens of reports are written. But those are not always based on thorough field research. Only a handful of organisations have built up a longstanding expertise in the mining sites and have been issuing reports on the matter for many years. Yet other organisations are entering the same lucrative market, which risks creating an atmosphere of competition for financial resources, rather than one of cooperation to achieve a common goal. One local observer, a geologist based in Bukavu, said:

"Most organisations are only active here in town [Bukavu]. They waste money, organise seminars and do nothing concrete. They set up a curtain [ils créent un rideau], they have their contacts and their consultancies, and they do not share that information. So I can say that among them there is little collaboration, it is rather a competition for donor money. These people do not know the real problems on the ground"⁸⁷⁹.

Apart from producing competition, the growing attention paid to the conflict minerals issue also runs the risk of introducing a bias in research. I found that some international NGOs explicitly ask local partners to look for 'conflict cases' and violence in and around the mines. As a local researcher, who was already quoted in chapter four, confessed: "these organisations already have a picture in mind they just want you to confirm. We know what they want to

⁸⁷⁷ See http://www.oecd.org/corporate/mne/mining.htm.

⁸⁷⁸ I attended the meeting in Paris in May 2013.

⁸⁷⁹ Interview with geologist, Bukavu, 08/10/2012.

hear, and we give them the stories"⁸⁸⁰. I am not saying that those reports are fictitious or false. They do reflect reality, but in my opinion only partially. Cases of conflict and violence are widespread, sadly enough. But a narrow focus on them risks distorting reality and diverting our attention away from other, often more complex problems. Moreover, it risks having negative effects, particularly on the people that are supposed to be protected by these kinds of initiatives. This has been illustrated recently by a number of studies on the ground⁸⁸¹. Observers argued that the process of access control and exclusion from certain mines from the certification process may have three possible effects (Pöyhönen et al, 2010 quoting Karen Hayes from the NGO Pact). First, it may lead to mine closure, resulting in a loss of livelihoods. Second, mining may continue but "with only illegal actors or buyers who are unscrupulous about their sourcing (idem: 25). Or third, there may be a move away from the '3T's towards "the more lucrative and secretive gold mines and markets where traceability is a huge challenge" (idem). It seems that all three effects have materialised.

The uncertainty around the implementation of Dodd-Frank, the delays in certification projects and the difficulties for actors in the mining sector to comply with all regulations, have resulted in a *de facto embargo* on minerals from eastern DRC as companies stopped sourcing minerals from this region (Tegera, 2011). Compliance with Dodd-Frank was expected to be costly (USD 3 to 4 billion for initial compliance and a further USD 206 to 609 for annual compliance; Johnson D., 2013: 22) and burdensome for companies and, according to some observers, the Security and Exchange Commission did not put sufficient measures in place to mitigate against the risk of causing a de facto embargo (idem)⁸⁸². In the official export figures, the de facto embargo is visible as they dropped below 50 kg. During and shortly after the ban, official exports fell close to zero as Bukavu comptoirs had to suspend their operations. The only exception were two Chinese export offices for coltan and cassiterite, TTT Mining/CCM and Huaying, which resumed activities in March 2012 since they traded with Chinese buyers that were not affected by Dodd-Frank⁸⁸³. Yet these two export offices were closed down by ministerial decree in May 2012 because they were accused of having purchased minerals of "dubious origin, thereby violating the Government's circular letter of 6 September 2011 concerning the application of UN and OECD due diligence guidelines"⁸⁸⁴. In July 2012 the Minister of Mines again authorised all export offices, including CCM and Huaying, to export minerals purchased in Maniema and in sites that had been declared to be 'clean' (UN, 2012: 46). It is true that this de facto embargo had an effect on production, but the second and third effect mentioned above was also in play: production and trade were pushed further into unofficial circuits⁸⁸⁵ and there was a shift from the '3T's, which are more difficult to smuggle, to gold (Spittaels and Hilgert, 2013; Triest, 2012; UN, 2014). This, of course, leads to an interesting observation: instead of restricting

⁸⁸³ Interview with cooperative leader, Bukavu, 26/05/2012.

⁸⁸⁰ Interview with local researcher, Bukavu, 26/07/2009.

⁸⁸¹ In what follows I will draw on some reports that have been published by Congolese and international organisations. Because these are very recent developments, I have not been able to study the impact of regulation in detail for this dissertation. Other academic researchers however are following up closely on the impact of certification and traceability initiatives on the ground, see for example research that is carried out within the WOTRO financed project on 'Mining governance, conflict transformation and sustainable development in the DRC', or PhD research by Christoph Vogel, University of Zürich.

⁸⁸² Global Witness (2011b) refuted the claims that Dodd-Frank creates a de facto embargo and that companies did not have enough time to prepare for its implementation.

⁸⁸⁴ Lettre du Ministre National des Mines au Ministre Provincial des Mines, CAB.MIN/MINES/01/0334/2012. See also UN, 2012: 46.

⁸⁸⁵ Interview with president traders' association, Bukavu, 20/10/2011.

fraud and enhancing formalisation, these regulation measures seem to have done the opposite, at least in the gold sector.

An additional effect of certification as access control is that power is concentrated in the hands of those who can comply with the standards, those who have both the financial means to do so and the necessary relationships. The aforementioned Mining Mineral Resources (MMR), for example, has obtained the monopoly on buying iTSCi certified coltan in Kisengo mine in northern Katanga. An evident motivation for this move was to direct more tax revenues to Lubumbashi. But some observers also interpreted this in terms of putting forward an image of 'clean' Katangese minerals as opposed to 'dirty' ones from the Kivus, and as an attempt by the Katangese government to push Kivu traders, who had a strong foothold in northern Katanga (which is the president's home area), out of business (Spittaels, 2010: 21). The granting of a monopoly and the creation of closed pipelines obviously pushed many other traders, middlemen and transporters out of business and reportedly created many tensions (idem: 21-22).

In brief, certification is analysed here as a form of access control. Setting standards implies excluding actors, more particularly through legalisation and territorialisation practices. Standards prescribe what behaviour and which practices are considered ethical or 'legal', while behaviour, practices or actors that do not adhere to these norms are criminalised. The responsibility to monitor and sanction this process is also conferred on a loosely defined group of mainly international stakeholders (multilateral organisations, NGOs, private companies, governments) and even on individual consumers (what Guthmann [2007: 472] called 'devolution'). The idea is that the international community can/should keep an eye on mineral production in the region and make sure that it no longer contributes to violent conflict, as the Congolese government is (currently) not able to do so. But at the same time, my analysis has hinted at some access maintenance strategies on the part of miners and traders. This is apparent in the continuation of mineral production, albeit in more insecure and risky circumstances, combined with the shift from the 3T chain, which is more disposed to external regulation, to the gold sector.

11.3. OVERVIEW OF NATIONAL INITIATIVES

In section 2.2.2 I discussed the legal framework governing artisanal mining since 2002. The Mining Code and Mining Regulations provide a number of regulations for artisanal mining, but many have not been into practice, as shown in section 2.3. This has been related to bad governance, the inability or unwillingness of the government to put the necessary resources at the public services' disposal and the lack of control over its economy and even its own territory. In this and the following section I discuss a number of initiatives taken by the Congolese government as examples of access control mechanisms.

In order to implement traceability and certification on the ground the Ministry of Mines issued a 'handbook', the 'Manuel des procédures' (2009)⁸⁸⁶. It contains detailed instructions on all the steps to be taken and all actors and services involved in tracing the origins of minerals,

⁸⁸⁶ Ministère des Mines, Ministère des Finances (2009) *Manuel des procédures de traçabilité des produits miniers, de l'extraction à l'exportation*. For a more detailed discussion, see Kilosho et al (2013).

certifying and taxing them. The handbook also establishes the 'routes' minerals should take from the mine to the export office, passing through 'centres de négoce' or centralised trading points⁸⁸⁷. In these trading points, miners are required to sell their products to registered traders under the supervision of the mining services, who issue certificates and levy taxes. In 2010 the national government made quite a radical attempt at accelerated implementation of these laws by temporarily – during six months – banning all artisanal mining activities.

In a speech he gave in September 2010 during a visit to North Kivu, President Kabila stressed his determination to pacify the province, more precisely Walikale territory, a mining area where the population was being "terrorized by unspecified armed groups, which finance themselves through mineral extraction" (Eyanga Sana, 2010). On 9 September 2010, during a dinner with local elites in Goma, the president declared a suspension of all mineral activities in Walikale. A few days later the troops of the national army (FARDC) moved into this territory to fight the rebels who were occupying the mining sites. On 11 September the national Minister of Mines issued a statement stipulating that the President's decision had been extended to the three provinces of North Kivu, South Kivu and Maniema⁸⁸⁸ (Radio Okapi, 2010a). A ministerial decree, specifying the parties concerned by the ban (artisanal miners, mining cooperatives, traders and export houses) followed on 20 September⁸⁸⁹ (Lutete, 2010). Only the industrial mining companies (in this case Banro in South Kivu, Loncor and Somekivu in North Kivu) were exempted from the ban (Radio Okapi, 2010b). The decree mentioned four official reasons for the ban: cutting the financing of non-state armed groups, reestablishing state control, fighting against fraud and fighting against the involvement of 'non-authorised people' in the sector. A second decree conditioning a set of 'accompanying measures' to move towards formalisation was issued on the same day⁸⁹⁰. In brief, the mining administration was instructed to make an inventory of all mineral stocks and ensure these were not exported and to send their agents inland to identify all operational sites and actors. The miners for their part were required to stop exploiting, to sign up for registration and to organise in cooperatives as required in the Mining Code. Yet hardly any additional financial, human or material resources were transferred to the services that were supposed to implement these measures.

During the ban the Mining Division initiated a mapping exercise estimating the number of mines, miners, and production volumes, but the outcomes were very limited⁸⁹¹. A more comprehensive and externally financed mapping exercise has been carried out by the Belgian research center IPIS (International Peace Information Service) in partnership with the mining services and civil society (Spittaels and Hilgert, 2013)⁸⁹². This exercise is intended to be sustainable, in the sense that it gives the Congolese mining services the capacity to monitor and regularly update the mapping according to changing realities on the ground. In 2012 the

⁸⁸⁷ The Provincial Mining Division of South Kivu, for example, listed the different mining sites and specified to which 'centre de négoce' they would be connected. See *Cartographie des sites miniers du Sud-Kivu par rapport aux centres de négoce*, 02/2012.

⁸⁸⁸ Ministère des Mines, Communiqué du ministre des Mines en rapport avec la décision du président de la République sur la suspension de l'exploitation minière, 11/09/2010.

⁸⁸⁹ Ministère des Mines, Arrêté ministériel n°0705/CAB.MIN/MINES/01/2010 du 20 septembre 2010 portant suspension des activités minières dans les provinces du Maniema, Nord-Kivu et Sud-Kivu.

⁸⁹⁰ Ministère des Mines, Arrêté ministériel n°0706/CAB.MIN/MINES/01/2010 du 20 septembre 2010 portant mesures urgentes d'encadrement de la décision de suspension des activités minières dans les provinces du Maniema, Nord-Kivu et Sud-Kivu.

⁸⁹¹ Division des Mines, *Cartographie des sites miniers du Sud-Kivu*, 2012.

⁸⁹² See http://www.ipisresearch.be/mapping.php (accessed 24/02/2014).

Mining Division also initiated a mapping (traceability) and certification exercise, in order to determine which mines are conflict-free, which mines respect the Mining Code, where there is no child labour and no unhealthy working conditions, and so on. There was an attempt to qualify sites as 'red' (if they do not meet the criteria), 'yellow' or 'green'⁸⁹³. The South Kivu list included eight green sites, but there was no follow-up to account for the potentially changing security situation. The national ministry of Mines also encouraged the provincial government to make the 'centres de négoce' operational⁸⁹⁴, but this did not happen. As described earlier not enough progress was made either with respect to the creation of artisanal exploitation zones. The official registration of cooperatives was also proceeding slowly. De facto, many cooperatives already existed, and many new ones were set up during the ban. This created significant tensions in some mining sites as cooperatives started to compete with each other and fight over who could legitimately represent the artisanal miners. Some cooperatives were also created by local businessmen, who considered it to be a perfect occasion for obtaining licenses. With respect to the number of 'cartes d'exploitant artisanal d'or' sold, the figures for 2011 and 2012 (69 and 60) increased as compared to 2009 (17), but were still low compared to 2007 (139). For gold traders though the sale of these permits seemed to be on the rise with 87 'cartes' sold in 2012, 72 in 2011 and 41 in 2010. When the ban was levied in March 2011 the government promised to further execute the 'accompanying measures' and set up a timetable with fixed objectives and operational guidelines⁸⁹⁵. Yet weak capacities and poor resources delayed their implementation.

Broader initiatives to promote artisanal mining and improve governance conditions in the sector have been limited so far. One externally-funded project is the World Bank's and DFID's (UK Department for International Development) technical assistance programme 'Promines'. Its aim is to "improve the legal status, working practices, and economic return of artisanal mining [...] whilst establishing mechanisms to sustainable reduce its negative impacts on society, security and the environment" (Pact, 2010: 8). The programme started from the assumption that artisanal mining can contribute to poverty alleviation and economic development "if practices, regulation and impact could be improved" (idem). The project did not realise any concrete output – apart from the baseline study carried out by Pact – until early 2014, but now seems to be taken up again and will soon enter a new phase.

Apart from the abovementioned official motivations behind the mining ban, some national and international observers speculated about more implicit reasons for taking this initiative. First and most evidently, the ban can be interpreted as a reaction against external pressures to stop the trade in conflict minerals, and more specifically the Dodd-Frank Act which had been voted in July 2010 (Braeckman, 2010). In this way, the president demonstrated his goodwill and show that he maintained control over the sector. Second, the ban has been interpreted as an attempt by the president to replace disloyal army units with more loyal troops who would give him more direct access to and control over the mining sites (Kivu Kwetu, 2010; Stearns, 2010a;

⁸⁹³ Arrêté ministériel n° 0189/CAB.MIN/2012 du 23 mars 2012 portant qualification et validation des sites miniers des territoires de Kabare, Mwenga et Walungu.

⁸⁹⁴ Ministère des Mines, Lettre aux gouverneurs des provinces de Maniama, Nord-Kivu et Sud-Kivu. Objet : déploiement des Agents des Mines et du SAESSCAM. N°CAB.MIN/MINES/01/0962/2010.

Ministère des Mines, Lettre aux gouverneurs des provinces de Maniema, Nord-Kivu et Sud-Kivu. Objet : déploiement des Agents des Mines et du SAESSCAM. Dispositions pratiques. N°CAB.MIN/MINES/01/1005/2010.

⁸⁹⁵ See Ministère des Mines, Chronogramme des mesures d'exécution de la decision de levee de suspension des activités milères dans les trois provinces, 2011.

Tegera, 2010). These maneuvers would, among other things, be linked to discussions between President Kabila and President Kagame of Rwanda, who would fear the formation of a new anti-Kigali coalition in eastern DRC (Stearns, 2010b and 2010c). According to a third hypothesis the ban was a tactic to ease the control by industrial companies over their concessions (Stearns, 2010a). In the case of Banro, the ban indeed seemed to have helped Banro 'occupy' its concessions and possibly even extend their boundaries since the area was cleared of artisanal miners. A fourth hypothesis suggests that a problematisation of the artisanal mining sector actually helped the Congolese government to divert attention away from another major problem: the issue of the industrial contracts. The bad negotiation of some big industrial contracts, and worse, systematic underselling of mining assets to off-shore 'shell' companies incorporated almost exclusively in the British Virgin Islands, as exposed by Eric Joyce (2011), put the Congolese government in an unfavourable light. By drawing attention to the problems in the artisanal sector, they were able to escape more delicate questions on the role of important politicians and key figures in the negotiation of these industrial mining contracts.

11.4. FORMALISATION AS ACCESS CONTROL

The mining ban had an immediate effect on the livelihoods of miners and their families, but also on petty traders and transporters, women selling vegetables on the market and school teachers in and around the mining sites. The impact was clearly reflected in the number of school drop-outs, because the parents and children (who sometimes went in the mines themselves to pay for their fees) could not afford the school fees anymore. In some mining sites malnourishment started to spread, and diseases occurred more frequently than before, while people were not able to afford the costs of going to hospital⁸⁹⁶. Part of the population in the mining sites, most of the time those who did not originate from the place, migrated back to their villages. But some miners also got stuck, not having the money to return to their families⁸⁹⁷. For that matter, the impact was not confined to the mining sites. The entire province was severely affected. First of all, the surrounding agricultural regions could not sell their products – flour, meat, fruit and vegetables – anymore in the mining sites. Second, the impact was also felt in Bukavu. Traders selling all kinds of goods - food, clothing, electronic equipment, and so on – on the large market of Kadutu, complained that as a result of the mining ban, the buyers were staying away. This was also confirmed by the figures of Agrefreco, one of the two main transport companies in South Kivu. On their domestic flights, the planes normally took food and consumer goods, while returning with minerals. The director of Agefreco confirmed that before the ban his agency had seven connections a week to Shabunda. During the ban this was reduced to four⁸⁹⁸. To the mining areas in Maniema province, the number of flights was reduced from three to one. According to the local branch of the FEC the artisanal mining sector injects more than USD 5 million a month in the provincial economy thanks to the flowing back of foreign currency. As I explained it is almost the only source of foreign exchange⁸⁹⁹. As a result, the US dollar rose from FC 880/USD at the declaration of the mining ban to FC 900 and FC 940 two weeks after (exchange rate on the black market in South Kivu and thus different from Central Bank).

⁸⁹⁶ Interview in health center, Lugushwa, 25/01/2011.

⁸⁹⁷ Interview with shaft manager, Lugushwa, 26/01/2011.

⁸⁹⁸ Personal communication to Gabriel Kamundala.

⁸⁹⁹ See section 10.2.9.

It was not the case that production completely stopped. In fact mining and trading activities continued, albeit on a smaller scale and at greater risks. In the mines under government control, the ban allowed FARDC and the police to establish a tighter control over production and trade:

"During the ban the activities were suspended, but only during the day. At night, the activities continued under the benediction of those who carry arms: the military and the police. Mobale mine is now under the control of these services: ANR, Mining Police, Military Tribunal, DGM. They now control the mine. They demand USD 5 from each miner who wants to enter and all services need to have a share in the profits. The miners go in at night and leave very early in the morning"⁹⁰⁰.

So instead of sanctioning non-compliance with the mining ban, individual soldiers and policemen made agreements with miners⁹⁰¹. The latter told me:

"It's a matter of agreement. We give them something, and they let us work. The ban is violated everywhere"⁹⁰².

Locally the word 'cooperation' was used, indicating that both parties consented to pay in exchange for protection⁹⁰³. In this way, miners paid amounts of up to several hundreds of US dollars a week to different power holders (FARDC soldiers, Mining Police, intelligence officers, people in the mining administration and magistrates). In exchange, they got access to a particular mining shaft (even if this shaft was being worked by some other miner) and could sell their production. If this production turned out to be higher than expected, the compliant power holder could claim a larger part, and so conflicts arose. Miners also ran the risk that individuals or services that had not been included in the 'cooperation' caught them and demanded additional bribes. These bribes were 'tailored' to the head of the client, as a local magistrate explained to me:

"How much they pay? That depends on the person. If I see you for example [SG] I will ask USD 1000, but for him [Congolese interviewer] I will demand USD 100 for example. Often the people who are forced to pay are the ones who have some kind of conflict with the police"⁹⁰⁴.

So miners and traders tried to maintain their access during the mining ban by 'playing the game', making agreements with security forces. Still their work became extremely risky, since having bribed one agent or service did not automatically mean protection from other harassment. Many of them therefore gave up and stopped their activities during a few months. Although the figures were almost impossible to verify, four of my informants estimated the volume of gold produced during the mining ban at 20 to 50 percent of the initial production, a decline of 80 to 50 percent in comparison to what was produced before the ban,

⁹⁰⁰ Interview with cooperative leader, Kamituga, 19/01/2011.

⁹⁰¹ The same phenomena have been observed in other areas by Braeckman (2010), Tegera (2010) and Mulumba (2011).

⁹⁰² Interview with miner, Lugushwa, 20/01/2011.

⁹⁰³ The same phenomenon was described by Vlassenroot and Raeymaekers (2004; 2005) in their work on Kamituga during the second Congolese war.

⁹⁰⁴ Interview with magistrate, Kamituga, 22/01/2011.

which was also unregistered. In Luhwindja the situation was particular, as the mining ban has intervened just after the main artisanal sites had already been closed down by Banro, as the next chapter explains. But people in Kamituga and Lugushwa felt quite desperate and blamed the president⁹⁰⁵:

"The president only thinks about his own interests. The entire population is penalised; it's as if they are in prison"⁹⁰⁶.

They were also indignant because they had not been warned:

"If you rent a house, you are at least given a warning when you have to leave. But suddenly like this? That's the reason why we find it's like murdering somebody"⁹⁰⁷.

To sum up, the mining ban can be interpreted as a mechanism of access control. Some of its explicit motivations – reestablishing state control, cutting the financing of non-state armed groups, fighting against fraud and fighting against the involvement of 'non-authorised people' in the sector – refer to territorialisation mechanisms and try to give the state greater control over the sector. Such control, so the ban seems to suggest, can only be established once complete *tabula rasa* has been made. After that, there is a vision to build up a new structure, which entirely conforms to official legislation. This legalisation strategy criminalises everyone who does not comply with the regulations. Even more, it dispossesses artisanal miners who do not and cannot obtain an official title, often to the advantage of actors with more financial capital, such as industrial companies and local elites. As such, it facilitates elite capture, for example by local businessmen who want to acquire or speculate on a mining concession. They use their financial capital and power to register a cooperative and obtain a title, but have no intention to develop a cooperative in the sense of a democratically run organisation with equal distribution of benefits⁹⁰⁸. It is also a privatisation mechanism, very much like in Ghana, where Hilson and Potter (2005: 109) observed that

"it appears that the legalisation of small-scale gold mining has been an integral component of the government's strategy to promote foreign investment in large-scale mining and mineral exploration, since control over who can register as small-scale miners and where they can operate puts the authorities in a better position to demarcate concessions to gold exploration and mining companies".

⁹⁰⁵ In November 2011 there were presidential elections in the DRC. Although Kabila was reelected as a president, in North and South Kivu he lost a lot of votes compared to the 2006 elections. This can of course not be attributed to the mining ban only, but this measure, which only targeted the eastern provinces, has certainly not enhanced Kabila's popularity. In South Kivu Joseph Kabila obtained 45 percent, Vital Kamerhe 42 percent and Etienne Tshisekedi 10 percent. In North-Kivu Kabila had 39 percent, Kamerhe 23 percent and Tshisekedi 21 percent. In Maniema, the third province targeted by the ban, Kabila clearly won with 87 percent.

⁹⁰⁷ Interview with cooperative leader, Kamituga, 19/01/2011.

⁹⁰⁸ See also Pact (2010: 50): "People in artisanal mining cooperatives don't always share the same objectives for forming or joining the cooperatives. In some instances, people are 'required' to join (with a high entry fee) as an effective 'license to operate' on the sites. Alternatively the cooperatives may be created by family groups. Equitable profit-sharing and collective risk taking which may be hallmarks of other cooperatives are not amongst the priorities or benefits of these groups".

It thus achieves exactly the opposite of what formalisation is supposed to do, namely enhancing security and efficiency for artisanal miners⁹⁰⁹.

From the perspective of artisanal miners and traders, the costs of formalisation are high and may entail a lot of paperwork, difficulties and bribes to obtain official documents. It means that their activities will be monitored by the administration, they will only be allowed to work in artisanal exploitation zones, their production should evolve towards a semi-industrial mode, involving higher investment costs, and finally it includes paying a lot of taxes. As was said in part three, miners and traders do make a lot of unofficial payments, but they consider it an advantage that these amounts are negotiable. Maybe more importantly, the benefits are unclear: prices offered on the official market are lower, artisanal exploitation zones are few, centralised trading points are not operational, requirements and conditions for cooperatives are obscure, the technical services of the Ministry of Mines lack the necessary resources to perform their tasks and it is not certain under which conditions individual state agents will give up their personal gains in the form of 'illegal taxation'. Still, the miners I interviewed said they are prepared to organise themselves in cooperatives, work in artisanal exploitation zones and declare their production, if only they were to be assisted and supported materially, technically and financially. The fact that the state does not provide any services for them legitimises the fact that they work even within the concessions and 'try to make a living', in an environment where there are virtually no formal jobs available. Almost all the actors concerned (Ministry of Mines, governors, civil society, mining cooperatives, public services and export offices) have committed themselves to the project of formalisation in a series of 'acts of commitment' they signed when the mining ban was levied⁹¹⁰. But miners and traders rightly demand incentives to join the formalisation project.

11.5. CONCLUSION

This chapter discusses the regulation initiatives by international actors (traceability and certification) and the Congolese government (formalisation) as mechanisms of access control. The motivations behind these policies – promoting an ethical trade that does not contribute to conflict in the former case; and enhancing security and efficiency in the latter – are laudable in themselves. Still, the initiatives have been problematised because in practice they produce exclusion. It is very difficult if not impossible, and probably not rational either, for miners and traders to comply with the regulations. During the period of the mining ban the power balance also clearly shifted in favour of the politico-military power holders who controlled the access to the mines. They hereby built further on some existing practices and norms, namely the 'taxation system' in which state agents and chiefs use their legal command and their power in order to profit from mining rents. The interviewees referred to this as a 'cooperation' system in which they had to bribe state and security agents in exchange for protection. This way of framing it already hints at an access maintenance mechanism as well. Miners continued to extract gold and they negotiated with those who were in control, although their agency was clearly constrained. Paradoxically this pushed the gold sector further into the clandestine circuits, increased smuggling and intensified violence in and around the mines.

⁹⁰⁹ See section 1.4.

⁹¹⁰ Acte d'engagement solennel des Gouverneurs des Provinces du Maniema, du Nord-Kivu et du Sud-Kivu, 2011; Acte d'engagement solennel de la Société civile, 2011.

Moreover, the personal relationships sustaining the network, as described in chapter nine, came under severe pressure during this period. As production fell and people were forced to pay many bribes, they were unable to repay their debts. For some miners this meant that they had to stay in the mines, sometimes far away from their families, because they did not have the money to return or because traders did not allow them to. For some traders it meant losing a lot of money because of all these unsettled debts. These facts should call our attention to the potential effects of formalisation on networks that have not a merely economic, but also a social function. Finally formalisation and certification risk 'cutting out' many intermediaries and people who are indirectly dependent upon artisanal mining and trade like the 'loutriers', 'biporistes', cooks and prostitutes, commission agents and so on by aiming for 'closed supply chains' and evolving towards semi-industrial production modes. The fact that implementation in the gold sector is so problematic, evidences that some practices and norms are resilient and difficult to change. In conclusion, it can be argued that changes in access, as described in this chapter, risk leading to more dispossession of artisanal miners and small traders. On the other hand, the control mechanisms can be challenged by maintenance mechanisms for which miners and traders rely on the existing practices, relations and (professional) norms present in the gold sector.

CHAPTER 12. CHANGES IN ACCESS: INDUSTRIALISATION

"Il en résulta que l'exploitation sur une grande échelle des terrains miniers devint possible: des sociétés de formèrent, concessionnèrent de vastes étendues de terrain [...] Comme, en ce moment, nous ne travaillions pas, Béranger me quitta et s'engagea à la journée pour le compte d'une de ces sociétés; il gagnait quatre dollars par jour" (p.116-117).

"As a consequence, the large-scale exploitation of mining sites became possible : companies were created and obtained large concession areas [...] As we were not working at that moment, Béranger left me and went to work as a day labourer in one of those companies; he earned four US dollars per day" (p.116-117).

Chapter one has demonstrated that industrialisation is being promoted as the best way to proceed towards development. Vast parts of South Kivu's territory have been carved up in industrial concessions with research or exploitation permits (see map 1). Within these concessions conflicts have arisen between the industrial and artisanal actors. In this chapter I specifically analyse the impact of Banro's installation on artisanal miners in the Twangiza concession. While chapter six already sketched the historical context and gave a comprehensive account of recent events, this chapter first analyses the events as an example of access control (section 12.1). It then concentrates on the question of how miners try to maintain their access under the increasing pressure of Banro's exploration and exploitation activities (12.2). Finally an analysis will be made of miners' perceptions on the benefits in artisanal mining, as compared to those from industrial mining (12.3). Section 12.4 concludes.

12.1. INDUSTRIALISATION AS ACCESS CONTROL

In this section I describe the changes that have taken place for artisanal miners in Luhwindja (Twangiza concession) since Banro's effective arrival in 2005⁹¹¹. I show that the process of industrialisation (or here, indeed, privatisation) was accompanied by other control strategies such as legalisation (ignoring those without an official title) and territorialisation (registration of artisanal miners), eventually producing exclusion and dispossession for many. Indeed, the control mechanisms were often quite subtle. The 'ugly' effects of outright violence and coercion were mitigated by a negotiated approach, a community development and alternative livelihoods programme.

During the exploration phase (2005-2011) Banro started drilling and taking samples in various sites, which disturbed artisanal underground activities. The exploration programme identified Mbwega hill as the core area for open pit mining with the construction of the processing plant and tailing dams nearby. This created a direct threat for the displacement of thousands of miners (an estimated 3000 to 6000 were active in Mbwega [OGP, 2008: 29]). In a 2008 survey carried out by Banro in the context of a 'Resettlement Action Plan' they registered 345 shaft managers and about 1725 miners⁹¹². These people received a card and were informed that they were to be displaced, without any further information on the time frame or terms of displacement. During a field trip in 2009 researcher Raf Custers (2013: 73) recorded several incidents whereby people were wounded or died in cave-ins caused by intensive drilling or because of rocks breaking loose. Very often, so he argued, Banro refused to pay or

⁹¹¹ See chapter six for an account of how Banro acquired the concession.

⁹¹² Banro, *Technical Report Twangiza. Social conflict arising from involuntary resettlement*, 2011.

compensate. All this caused a lot of discontent and protest in Luhwindja, to which the company reacted in quite a repressive way, putting so-called 'troublemakers' on a black list (idem: 74).

Yet the company came under severe pressure to improve relations with the community and preserve the 'social peace'. In 2009 they therefore decided to set up a 'community forum'. This forum consisted of four working groups, one of which was to be exclusively responsible for the displacement and reintegration of artisanal miners⁹¹³. In the composition of the working group, there seemed to be an imbalance in favour of the company's supporters. It consisted of eight representatives from the company (the vice-president, the chief of the Twangiza project, the community relations manager and two people from her department, the administrator of the Banro Foundation, a consultant and a geologist), the mwamikazi, three representatives from public institutions (the 'chef de poste', the Mining Division and Saesscam), five representatives of NGOs (at least three of them belonging to the local elite) and three of the community (the president and a member of the miners' committee and a representative of the shaft managers). Seen from the company's side, the main objective of the forum and the negotiated approach, was to maintain social peace and obtain a so-called 'social license to operate'. In the view of the community, the main task of the forum was to protect the community's (or groups within the community) interests. The selection of members was therefore a very sensitive and critical thing, in which maintenance and control tendencies came into collision. For example, the president of the miners' committee who participated was soon discredited. Other miners said he had been corrupted and could no longer act as a spokesperson for them⁹¹⁴. In the period between November 2009 and May 2010 the group held several meetings with three main points on the agenda: how to register all artisanal miners, how to 'progressively reduce' the artisanal miners' activities and how to proceed towards alternative livelihoods (socio-economic reintegration).

The first step to be taken, in early 2010, was a new registration process for the miners as the first one carried out by Banro was judged unreliable. Yet this new census proceeded with quite some difficulty. It was viewed with a lot of suspicion and skepticism because first, the miners had not had positive experiences with Banro and second, the registration was carried out by Saesscam. While it is Saesscam's mission to provide technical and material assistance to the artisanal miners, the latter perceived the service's actions quite differently. Like other state services, Saesscam was commonly regarded as an extractive body, established for the sole purpose of levying taxes⁹¹⁵. Therefore many miners refused to cooperate. After a first round, just 202 miners had registered⁹¹⁶. It took several more rounds of field visits for Saesscam to eventually succeed in identifying 903 individuals: 463 in Mwana and 440 in Mbwega⁹¹⁷. In the working group it was decided that the miners who were included in the programme would be

⁹¹³ See chapter six. Forum Communautaire Consultatif/ Twangiza Mining Sarl (Filiale de Banro Corporation), *Résumé des travaux du sous-comité en charge de la question des creuseurs artisanaux*, 26/06/2010.

⁹¹⁴ Interview, Luhwindja, 08/01/2011.

⁹¹⁵ Interview with community leader, Luhwindja 08/01/2011; interview with leader artisanal miners, Burhinyi, 08/01/2011; interview with policeman, Luhwindja, 09/01/2011. During a consultation process on artisanal mining organised by the NGO Pact, similar skepticism was raised about Saesscam's technical capacities, material support, financial resources, professional capacities, individual corruption and so on (Pact 2010: 38-39).

⁹¹⁶ Interview with former miner, Luhwindja, 26/10/2011.

⁹¹⁷ Forum Communautaire, *Résumé des travaux*..

able to choose between accepting a job with one of Banro's subcontractors or participating in a professional training and conversion programme.

The latter point was one of the stipulations in the Protocol of Agreement between the company and the miners, which was signed on 5 June 2010⁹¹⁸. This Protocol also ordered the effective departure of the artisanal miners from 'Twangiza main deposit'. Two weeks later the mwamikazi officially closed the sites of Mbwega and Mwana for artisanal exploitation. There were important alluvial deposits in Mwana river with hundreds of miners panning for gold in a three kilometer stretch downstream from Mbwega, where a lot of the washings from artisanal processing uphill were carried⁹¹⁹. This river also forms the border between Luhwindja and Burhinyi chiefdoms and activities were only prohibited on the Luhwindja side. So while on the Luhwindja banks, Banro started digging off sand to be processed in the factory they were building uphill, the artisanal miners on the Burhinyi side were more or less left in peace. Yet they were heavily affected by Banro's upstream activities diverting the water from them. Later the company also closed the sites of Kaduma and Lukunguri (with underground shafts), downhill from Mbwega. Then, in September 2010, the national government took yet another decision that would heavily affect artisanal miners: it temporarily suspended all artisanal mining in the provinces of North and South Kivu and Maniema. As the previous chapter highlighted, this certainly was a convenient decision for Banro. They proceeded with the artisanal miners' displacement and dispossession in relative peace. The process of dispossession thus affected thousands of miners directly and impacted indirectly on many more individuals. In practice, however, many miners continued to look for gold in the shafts and in riverbeds, although they displaced their activities to sites that were less supervised by Banro⁹²⁰. The issue of compensation for artisanal miners – for the loss of their shafts and/ or the investments they had done in their shafts – was blocked off by the company by saying that the miners held no legal title and thus no right to compensation⁹²¹.

In late 2010 and early 2011 almost 400 former miners took part in various professional training programmes offered by local NGOs under the supervision of the Banro Foundation, a development-oriented charity funded largely by Banro itself. Each NGO received about USD 100,000. The local NGOs in Luhwindja were LAV ('Laissez l'Afrique Vivre'), which provided training programmes in mechanics, petty trade, bricklaying, carpentry and needlework, ADEPED ('Action pour le Développement des Peuples en Détresse'), which focused on a cattle raising project, ADMR ('Action pour le Développement des Milieux Ruraux') for an agriculture project and APEF for schooling and professional training for underage children. The selection of these organisations was illustrative of prevailing power relations: APEF, for example, is managed by the mwamikazi, LAV and ADMR by members of CODELU (group of Luhwindja's elite in Bukavu)⁹²², while ADEPED is an organisation led by a local Catholic priest.

Another 850 former miners were employed by Banro for a period of 12 to 15 months, corresponding to the period of construction of the refinery⁹²³. In practice, these men were

⁹¹⁸ Forum Communautaire, *Résumé des travaux...*

⁹¹⁹ See chapter six.

⁹²⁰ Interview with leader artisanal miners, Luhwindja, 08/01/2011.

⁹²¹ Banro, Technical Report Twangiza. Social conflict arising from involuntary resettlement, 2011.

⁹²² See chapter six.

⁹²³ Protocole d'Accord passé entre les comités des creuseurs artisanaux des chefferies de Luhwindja et de Burhinyi et la société Twangiza Mining sarl relativement à l'évacuation de la mine de Twangiza, 05/06/2010.

hired through subcontractors as day labourers, earning around USD 4 per day. For the former miners this salary, albeit stable and predictable, was not satisfactory, as section 12.3 will illustrate. One of the companies providing casual labour to Banro, Cinamula, is owned by the mwamikazi of Luhwindja. Another, Zuki, is owned by the mwami of Burhinyi. This again illustrates how customary chiefs were able to adapt their position so as to retain a level of control as a substitute for their previous control over the land and the artisanal mines. This elite capture has led to accusations of enrichment, corruption and nepotism from some population groups as was detailed in chapter six⁹²⁴.

Although the training and employment programmes may have brought some relief to former miners and their families in the short and medium run⁹²⁵, it is not obvious that this will also be the case in the long run, for various reasons. First, the number of beneficiaries was small relative to the total population, which amounts to an estimated 6000 to 12,000 miners in Luhwindja chiefdom alone. Second, with respect to the selection of the beneficiaries, rumour has it that the process was not fair. Although this was partly due to the refusal of the miners themselves to register, other sources also confirmed that the selection was guided by favouritism on the part of the local elites⁹²⁶. Next, questions may be raised about the content of the programmes themselves and the possibilities to embed them in a broader promotion of local economic development. For example, have the programmes been aligned with the local labour market; is there a demand for the dozens of car mechanics and carpenters who have been trained? Finally, one of the programmes has been implicated in the embezzlement of funds⁹²⁷. Nonetheless, Banro has continued to consider ways of dealing with the reintegration issue. In 2012, it opened up a credit line for local companies intending to employ former miners. The two projects that have been approved thus far (end of 2012) should provide jobs in small agro-businesses for a few hundred former miners⁹²⁸.

12.2. Access maintenance

In this section I go deeper into the access maintenance mechanisms miners used in reaction to their forced displacement and dispossession. The hesitation or outright refusal to be registered by Saesscam was already one of the signs of the fact that the state services have little legitimacy in the eyes of the miners and that the latter prefer to continue their extraction activities. Another, more manifest sign of that was given after the lifting of the mining ban in March 2011. This prompted hundreds of miners to reoccupy the sites of Mwana, Kaduma and Lukunguri, which had been closed before. In the Mwana river, anything between 470 and 900 miners resumed gold panning⁹²⁹. In Kaduma and Lukunguri, more than 50 pits were reopened by miners who forcibly returned to the sites⁹³⁰. One of them described it as follows:

⁹²⁴ Interview with community leader, Luhwindja, 26/10/2011.

⁹²⁵ Group interview with former child miners, Luhwindja, 10/01/2011.

⁹²⁶ Group interview with former miners, Luhwindja, 08/01/2011.

⁹²⁷ Idem; interview with local NGO leader, Luhwinjda, 10/01/2011.

⁹²⁸ Interview at the Ministry of Mining, Bukavu, 28/09/2012. Further research would be required to assess further evolutions and any longer-term effects.

⁹²⁹ Interview with leader artisanal miners, Luhwindja, 26/10/2011; Group interview with artisanal miners, Luhwindja, 26/10/2011.

⁹³⁰ Group interview with artisanal miners, 07/07/2012.

"Banro had closed down Kaduma and Lukunguri, but we retook them by force. We marched, we barricaded the road. Banro tried to drive us out with policemen and dogs. But we told them that whatever action they took, we would stand firm. Should they return now, we will do exactly the same"⁹³¹.

Others said:

"They [Banro] deceive us. They promise us work and the next day they drive us out. If they were planning to stay, they would offer us contracts. We have no prospect of work. So our only option is to reoccupy this concession. They threatened us with policemen and dogs. We told them that whatever they do, we will never die of hunger! [. . .] We would rather be killed by bullets than starve to death"⁹³².

So the reoccupation came as a reaction to the lifting of the mining ban, but also to the precarious economic situation. As the company was moving towards the production phase (they produced the first ingot in November 2011), many of the day labourers who had worked in the construction of the refinery and other infrastructure had become redundant. Almost all of the 850 former miners who had been hired as casual labourers were laid off. The training programmes had also come to an end, but there were few job opportunities. In June 2011 the provincial governor came to the reoccupied sites to ease the situation. He instructed the company to allow miners to continue working until the government had come up with a solution, which Banro did. However, the government has so far failed to offer a real solution, as the chief of the local branch of the Mining Division acknowledged⁹³³.

This may be seen as another example of the lack of legal provisions and the inadequate implementation capacity on the part of the state. The artisanal exploitation zones that are recognised by law are too few, they are often non-operational and not in the vicinity of Banro's concession. In Bukavu, local NGOs and cooperatives have been lobbying for government to negotiate with Banro over the conversion of part of their concession into artisanal exploitation zones, with limited success so far⁹³⁴. But the Mining Registry was also looking at a number of 'dormant titles' held by companies that had not yet begun exploration work, in order to ascertain whether these too may be converted into artisanal exploitation zones⁹³⁵. Another problem was the poor delimitation of Banro's concession by the public services, more specifically by the Mining Registry⁹³⁶. Official documents contradicted each other in this respect, so that ownership disputes over parts of the concession have dragged on. Moreover, the local population claimed never to have seen an official document or map clearly marking out the concession boundaries⁹³⁷. Consequently, in their perception, Banro was taking over mining site after mining site, systematically abusing its position to 'grab land' from the community. This was well illustrated by the following statement of a local chief: "Our problem with the company is that we don't know its limits"⁹³⁸.

⁹³¹ Interview with miner, Luhwindja, 28/10/2011.

⁹³² Group interview with artisanal miners, Luhwindja, 28/10/2011.

⁹³³ Interview with chief mining administration, Luhwindja, 07/07/2012.

⁹³⁴ Interview with cooperative leader, Bukavu, 26/09/2012.

⁹³⁵ Interview at Ministry of Mines, Bukavu, 05/10/2012.

⁹³⁶ Interview with chief mining administration, Luhwindja, 07/07/2012.

⁹³⁷ Focus Group with community leaders, Luhwindja, 04/10/2012.

⁹³⁸ Interview with 'chef de groupement', Luhwindja, 09/01/2011.

This is an important point that highlights contradictory rights-based claims to access. Artisanal miners perceive their work to be legitimate as they are mining 'their parents' land' that was abandoned after the industrial activities ceased. They are dependent upon this land for their livelihoods and more generally their activities are alimenting the entire local economy. The embeddedness of artisanal mining activities in the customary hierarchy is also a base on which rights-based claims can be made. Yet as chapter six already revealed, precisely this embeddedness in the customary structure has been seriously reshuffled since the arrival of the company, which is creating a lot of tensions at the local level. The aforementioned point also highlights the importance of structural access mechanisms. Thanks to its better access to financial capital, information and knowledge, international markets and relations with power holders, Banro is better equipped in the bargaining fight over the concessions, which does not mean that the artisanal miners have no power at all.

All this is very clear in the case of Mukungwe⁹³⁹. According to Banro's maps Mukungwe is part of the Twangiza concession, but the miners rejected this claim. In 2008 they set fire to Banro's exploration camp. In 2012 they again threw stones at a delegation that had come to determine the concession boundaries. This delegation consisted of members of the provincial government, civil society and Banro, but was entirely paid for by Banro, so the impression was that it was biased (OGP, 2012). The artisanal miners in Mukungwe were very clear when formulating their demands vis-à-vis the company: Banro needs to acknowledge that the artisanal miners were the first occupiers of the concession and have been working here for over 30 years; all shafts must be registered, as well as the total investment costs incurred; industrial exploration works must be done without disturbing the artisanal shafts; in case of damage to an artisanal shaft, this must be compensated by Banro; an artisanal exploitation zone must be created, with material and technical assistance from Banro and protection from harassment by civil and military power holders⁹⁴⁰. But the company did not seem to be considering these demands. In 2013 another official mission was sent to Mukungwe to fix the limits of the concession. This time rumour had it that the Mining Registry attributed the Mukungwe sites to Banro, but official documents were not yet available⁹⁴¹. At its other concessions (Kamituga, Lugushwa, Namoya) Banro is proceeding with exploration, which may well lead to further confrontations with local communities and artisanal miners. In Kamituga, a historical mining town of almost 100,000 inhabitants and an estimated 10,000 to 15,000 artisanal miners, the impact of Banro's arrival will arguably be even greater than it has been in Twangiza.

Apart from the artisanal miners, the broader community was of course also affected. Within the perimeter that Banro marked out for its mining project in the 'groupement' of Luchiga in Luhwindja, hundreds of households were living and farming. In the initial phase of the exploration programme, there were no provisions to compensate the local population for property loss caused by drilling or by road construction works. With respect to the construction of the road, for example, the argument was that this facility was to serve a 'public interest', and thus 'expropriated' land did not need to be compensated for (see Namegabe and

⁹³⁹ See chapter seven.

⁹⁴⁰ Memo doléances des artisans miniers de Mukungwe, 11/04/2011.

⁹⁴¹ Personal communication by e-mail, 06/08/2013.

Murhula, 2014⁹⁴². Eventually the Community Forum agreed on a compensation scheme for the displaced population⁹⁴³. Yet this scheme was based on the Congolese Land code, according to which only an official land title, not 'occupation' as considered by customary land rights and by the Mining Code, entitles people to be compensated for the loss of land⁹⁴⁴. Unlike the crops and buildings *on* the land, the land itself is thus not compensated. In its negotiations with the community forum Banro emphasised that they cannot compensate the land as such since they have "no rights whatsoever on the surface"⁹⁴⁵. They can only negotiate with the customary chief, who may place new plots of land at the population's disposal, and that is exactly what they agreed upon when designating the resettlement village. People with only a customary title are thus disadvantaged in this process. This again confirms the point that the actors without access to formal legal instruments tend to be disadvantaged when access patterns change in the direction of legalisation, privatisation or formalisation. All this resulted in heated protest demonstrations among part of the population. A prominent opponent explained:

"I was standing first in line to fight Banro. Why? Because our rights had been violated! To save our rights, we have done everything; we opposed ourselves, we barred the road. [. . .] We claimed our rights. They called in the police and the military. But we told them we were prepared to die. Because I have my field and that's my life"⁹⁴⁶!

His words clearly demonstrate that the rhetoric of rights is prominent in the population's discourse and acts of resistance. He referred in the first place to their loss of livelihoods and to the crops they cultivated: "If I exist today, that is thanks to my field there. There is no living without it"⁹⁴⁷. Indeed, Ballard and Banks (2003: 298) confirmed that "the identity of local communities appears in most instances to be constituted largely through discourses of rights claimed [...] or rights abused [...]". Nevertheless, it must be noted that this 'binding' rhetoric does not mean that communities are homogeneous, or that power relations do not play within this group. In any case, these rights-based mechanisms applied by the community stand in sharp contrast with the rights-based access mechanism adopted by Banro. The picture below shows a sign indicating the prohibition for all 'non-authorised persons' to enter the core area of the mining project. In order to support this prohibition, extensive references are made to the Mining Code and to presidential decrees. This is also a clear illustration of privatisation (enclosure) and legalisation strategies for land control.

12.3. BENEFITS IN THE ARTISANAL PRODUCTION MODE

In the previous section I mentioned that the company is advantaged in the bargaining fight over the concessions thanks to its better access to financial capital, geological knowledge, technology and vertical relations, relations with power holders. Yet the benefits that are generated by this are diverted to a relatively small group of people: the company

⁹⁴² Interview with lawyer, Bukavu, 03/11/2011.

⁹⁴³ Banro, Barême des taux d'indemnisation et modalités de remplacement des biens immobiliers, 2010.

⁹⁴⁴ Banro, *Barême des taux d'indemnisation et modalités de remplacement des biens immobiliers*, 2010. Interview with lawyer, Bukavu, 03/11/2011. The Mining Code stipulates that those who 'occupy' the land have the right to be compensated: Mining Code, T.xi, Ch. 2.

⁹⁴⁵ Forum Communautaire Consultatif de Luhwindja, Résumé des travaux...

⁹⁴⁶ Interview with community leader, Luhwindja, 08/01/2011.

⁹⁴⁷ Interview with community leader, Luhwindja, 26/10/2011.

management, the shareholders and the company employees. In terms of number of people being able to benefit from the activity, the artisanal mining sector performs much better than industrial mining. Indeed, it is widely recognised that large-scale industrial mining provides few job opportunities to local people (Campbell, 2004: 28; Hilson and Potter, 2005). Industrial production is highly mechanised and the jobs it does offer are often for skilled workers, while local people may work on short-term contracts in heavy manual labour, often related to the initial phases of mine construction. Data from Katanga (Marysse and Tshimanga, 2013: 28) reveal that the largest producer of copper and cobalt in the province (Tenke Fugurume Mining, accounting for 25 percent of industrial production) employs 2900 people directly and about 2000 indirectly. This would mean a total of 20,000 to 30,000 jobs for the entire copper and cobalt industry in Katanga. For Banro I have data from 2011, which indicate that a total of 2718 people were employed. Only 142 were directly employed by Twangiza Mining. The others worked for subcontracting companies, Diphil, Zuki and Cinamula⁹⁴⁸ taking up 1673 workers. This can be explained by the fact that Banro was preparing for production at that time. This preparatory phase, in which factory plants, tailings management facilities need to be built and roads need to be traced, requires a lot of manual labour. Once production runs at full speed, the labour force will be reduced. Of the 2718 employees, 2436 were nationals. They mostly worked in the lower skilled jobs, such as in security (Erinys⁹⁴⁹) and casual labour (Cinamula, Diphil, Zuki). Subcontracting companies charged with more specialised technical tasks employed more expats, as well as the company's administration. This fed into the artisanal miners' frustration that 'all the jobs in the company were given to foreigners'. The only viable alternative they had, so they believed, was to continue mining in an artisanal way and to look for other mining sites. When asked about the current occupation of artisanal miners who had been chased away from their initial sites, respondents in the survey said that 96.5 percent of them were mining elsewhere. The survey and interview data also demonstrate that they see artisanal mining as a viable activity. Figure 31 displays the extent to which the surveyed shaft managers agreed with a number of statements on employment and jobs in artisanal and industrial mining respectively.

⁹⁴⁸ These are locally owned businesses: the mwamikazi is a shareholder in Cinamula and Diphil, the mwami of Burhinyi in Zuki.

⁹⁴⁹ Erinys is an international security company. Its activities are largely concentrated in the oil, gas and mineral sectors of Sub-Sahara African countries, see also Ferguson (2005).

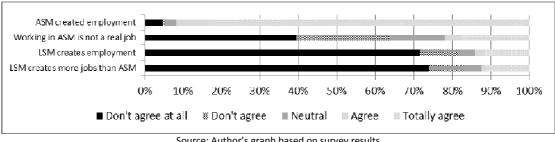


Figure 31. Surveyed shaft managers' statements on employment in artisanal and industrial mining

Artisanal mining is considered to be a 'real job' by almost 65 percent of the respondents, while 22 percent agreed that it is not a proper job. This confirms my point, as argued in chapter eight, that artisanal mining is more than just an economic survival strategy. It provides a sense of identity, social status and relationships, and offers hope and freedom. With respect to job creation, about 90 percent of respondents in South Kivu agreed that artisanal mining creates (more) employment (than industrial mining). Also in the group interviews the prevailing perception was that industrial mining did not create sufficient employment, as the following quotes illustrate:

"The company will never employ 25,000 people!"⁹⁵⁰.

"How can a company that does not hire people contribute to development? Banro uses machines for everything, even for emptying the toilets! What can we possibly expect from such a company?"⁹⁵¹.

This relates back to section 1.5, where I argued that large-scale mining is being promoted as the preferred model for development, relying on neoliberal capitalism, private investment and accumulation by dispossession. In terms of provision of employment, this model definitely performs worse than a model based on small-scale production. However, the proponents maintain that large-scale mining will stimulate economic growth and development, which will automatically trickle down to other sectors, so that alternative employment opportunities will be created. As was said in the previous section Banro indeed set up an alternative employment programme, training about 400 former miners in various professional domains. Similar programmes have been initiated by governments and companies in other countries, for example in Ghana. But research there has shown that these kinds of programmes have not generally been very successful because they offer few realistic and inviting opportunities and there are several barriers to exit in artisanal mining (Tschakert, 2009; Banchirigah and Hilson, 2010)⁹⁵². Table 20 therefore follows up on two questions discussed in chapter eight about whether respondents think they will remain in the sector (83 percent said yes) and whether they would want to continue mining even if alternatives were available (54 percent said yes). For those miners who were willing to consider alternative livelihood options, we asked which options would be attractive to them.

Source: Author's graph based on survey results

⁹⁵⁰ Group interview with shaft manager and miners, Lugushwa, 25/01/2011.

⁹⁵¹ Group interview with community, Burhinyi, 26/10/2011.

⁹⁵² See section 1.2.

| Jobs | Freq. | % |
|---------------------------|-------|-----|
| Businessman | 115 | 70 |
| Student | 30 | 18 |
| Job in large-scale mining | 9 | 5 |
| Driver | 6 | 4 |
| Farmer | 5 | 3 |
| Total | 165 | 100 |
| Total | 165 | 100 |

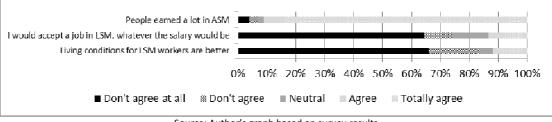
Table 20. Alternative jobs proposed by artisanal miners

Source: Survey results

While 70 percent of our respondents would like to go into business, only 3 percent considered becoming a farmer. This confirms the argument of Bryceson and Jønsson (2010) that miners "choose to move beyond mining into business rather than agriculture and farming" in Tanzania. The same argument was advanced by Perks (2011), who spoke about Katanga province in the DRC. She claimed that in mineral environments, supplier business and trade are considered to be more viable exit options because miners have the relevant skills and are more familiar with these kinds of activities. The high percentage of respondents in our survey who would like to pursue their studies may be surprising and can be explained by different facts. First, the surveyors were university students and their mention of this in their introduction may have caused a bias towards this response. Second, those who aspire to a well-paid job in large-scale mining may find that obtaining a degree is the only way to access it.

With respect to the earnings in artisanal and industrial mining, figure 32 summarises a few statements. 91 Percent of the respondents agreed that 'people earned a lot in artisanal mining', which is quite a high percentage. For a good interpretation it is worth reiterating that these respondents were all being affected, or threatened to be affected, by the growing industrial activities. It was a deliberate choice to present these statements to this target group and their answers show the value these miners place on their current activities. They do not believe that living conditions for people employed by industrial mining companies are better (84 percent do not believe that). Moreover they would not just accept any job in industrial mining, despite the fact that this would provide them with more steady earnings.

Figure 32. Surveyed shaft managers' statements on profits in artisanal and industrial mining



Source: Author's graph based on survey results

The observation that miners would prefer the unpredictability of profits from artisanal mining over a stable salary seems to be quite surprising. Yet it may be explained in two ways. A first explanation, which is based on some of the observations made in chapter eight, states that they are committed to the way in which the artisanal system functions, with the volatility of earnings, the hope to strike it rich, the importance of luck and the resulting expenditure patterns, holding possibilities for both consumerism and investment. Another explanation may be that artisanal miners are skeptical about working in industrial mining because they know that a) the better paid jobs are not reserved for them, b) the salaries for manual labour are rather low and c) the chances of getting a fixed contract are low as well.

Indeed, day labourers hired by Banro's subcontracting companies earned USD 4 to 6 per day. With a maximum of about 25 working days per month, this is a monthly income of USD 100 to 150. It is higher than what individual miners may earn during the preparatory period, but lower than profits during the high production period. Besides they were considered to be 'unskilled workers' (although they may have very relevant mining skills) and were not offered long-term contracts. In the interviews most (former) miners affirmed they earned much more in the shafts. A local chief stated:

"They promised to give us work, but this is insufficient! Eight percent of the people in my 'groupement' lost their job. What are they going to do now? [. . .] How can someone who earned USD 100 per week or sometimes even per day accept to work for USD 4?"⁹⁵³.

A shaft manager who was displaced, and some of whose former workers went to work with Banro, said: "They are not doing so well. They earn USD 100 or 120 per month, but at the time we found 4 to 6 tolas per month if we were lucky"⁹⁵⁴. Another one added:

"Every house you see here has been paid by gold [from artisanal mining]. But you see Banro's workers, take for example the son of the pastor here, he has been working there for several years now, and he hasn't been able to build a house yet"⁹⁵⁵.

The absence of long term contracts actually meant that their earnings remained as unstable as before. Moreover, they were entirely dependent upon the company, whereas an artisanal miner is mainly dependent upon 'his own force'⁹⁵⁶. As I have indicated in chapter eight this is a very important aspect. From the miners' reactions it appears that they would not want to replace the unpredictability of output sharing with a system of a fixed monthly salary⁹⁵⁷:

"A real miner can never accept to leave mining. Going to work for a salary? No, he cannot accept that. Companies pay maybe USD 170 to 200 per month. Which miner can accept that? Not one! Beyond the obvious sacrifices they are doing and the difficult circumstances they are working in, when he has a production, he forgets all that. Because he is earning money. [...] He knows that some periods he will earn nothing. He knows that is part of the game. But eventually he will profit. So all these sufferings, it is like a woman who is expecting her baby. It is hard for nine months, but once the baby is born, she forgets about it! After some time, you'll see her pregnant again!⁹⁵⁸".

⁹⁵³ Interview with 'chef de groupement', Luhwindja, 09/01/2011.

⁹⁵⁴ Interview with miner, Luhwindja, 01/2011.

⁹⁵⁵ Interview with community leader, Burhinyi, 02/2012.

⁹⁵⁶ Group interview with miners, Luhwindja, 28/10/2011.

⁹⁵⁷ The same argument was made by Jønsson and Fold (2009: 217) for Tanzania.

⁹⁵⁸ Interview with shaft manager, Bukavu, 27/05/2012.

This quote nicely expresses the concepts of 'freedom' and 'social status' and the particularities of an artisanal mining lifestyle, to which many miners seem to be highly committed⁹⁵⁹. The following story of a former miner from South Kivu shows that, despite the fact that he had been employed by one of Banro's subcontracting companies for some time, he remained attached to artisanal mining. This young man was born in 1985. At the age of seven he started to pan for gold in the Mwana river. His parents were already old and they needed him to contribute. At the age of 12 he started to dig in Mbwega in a pit that was managed by his older brother. They were living quite well: "we always found something to eat". In the meantime his parents had died. At the age of 16, because of falling production in Mbwega, he engaged in trade and travelled to Bukavu and other mines to trade in gold. He came back to Mbwega and got married in 2007. When Mbwega was closed down he passed a test with Banro and was offered a job at Erynis in security. But he quit. Asked why, he answered:

"The work was hard and not well paid. They first paid me USD 105, then 110, and when I got a fixed contract they also paid USD 5 to support my wife and USD 5 for my child. But that was not sufficient. After two years I had not even been able to buy a chicken or a goat. When I quit they gave me my last salary of USD 130, of which I gave 100 to my wife. With the remaining USD 30 I travelled to my brother who is a teacher in Kigali and asked him for work, but after a month my visa expired and I needed to come back. Back here, I found that my wife had invested the money well and was selling beer. So now we live from that income. In the mines I used to earn much more! Sometimes you went to the pits in the morning, and by 10 a.m. you had already found a few hundred USD. The next day you may find nothing, but if God helps you, the next day hundred again, and so on. We only ask for work at a decent salary⁹⁶⁰".

Yet there are also different views from Banro workers who clearly see the advantages of having a fixed salary:

"Now we are sure that we are paid regularly. It is completely different. An artisanal miner only hopes to find something to eat and if he gets lucky he earns a lot of money, much more than a day labourer. But we have other advantages as well, such as access to health care. But an artisanal miner, he is like a Christian who is waiting for Jesus to come back. He works in the hope of finding something. He can succeed or fail. Now they have made it difficult with the mining ban; it has become difficult to find something to eat"⁹⁶¹.

The general sense though in the (group) interviews with (former) artisanal miners in Luhwindja was one of deception: "They said the company would come to enrich us, but they are rather impoverishing us"⁹⁶². This suggests that expectations of the company may have been high, but have not been met. As was said before, only 12 percent believed that living conditions for industrial workers are better and 86 percent said that artisanal mining is important for the population. Figure 33 gives an idea about what miners think about mining and development in a longer time perspective.

⁹⁵⁹ See chapter eight.

⁹⁶⁰ Interview with former miner, Luhwindja, 09/01/2011.

⁹⁶¹ Interview with Banro agents, Lugushwa, 26/01/2011.

⁹⁶² Interview with former miner, Luhwindja, 08/01/2011.

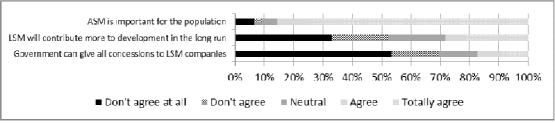


Figure 33. Surveyed shaft managers' statements on development and artisanal and industrial mining

It should be noted that in their appreciation of these statements, respondents take the current situation as a point of reference: a precarious economic situation with an artisanal sector under pressure and little hope of alternative job opportunities. 28 percent of respondents (totally) agreed with the statement that 'industrial mining will contribute more to development in the long run', while 53 percent (totally) disagreed and 19 percent remained neutral. This means that when it comes to long-term development, the miners' views are rather nuanced. Still only 17 percent agreed that 'the government can give all concessions to industrial companies'. This means that although some people may see the longer-term development benefits of industrial mining, they still think there should be room for artisanal mining too. In other words, they seem to favour a coexistence scenario⁹⁶³.

12.4. CONCLUSION

This chapter discusses the changes in access that were produced by Banro's mining activities in Luhwindja. The transition towards an industrial production mode contributed to the privatisation of public space, the commodification of natural resources and the dispossession of local farmers and artisanal miners. It led to a more exclusive access pattern and a resulting pressure on livelihoods. The tendency towards intensified access control, however, also stimulated access maintenance mechanisms from the people most affected by it. The miners used rights-based access mechanisms, referring to traditional rights and customary law and seeking legitimisation in the government's deficits. These mechanisms serve to justify them continuing with artisanal mining activities and providing their livelihoods, but also violently occupying parts of the company's concession.

The miners' perceptions on employment, earnings and development opportunities in industrial and artisanal mining respectively testify to their commitment to the artisanal mining activities. In this sense, this chapter builds further on the analysis in chapter eight, from which the image emerged of an artisanal mining sector which offers opportunities for (flexible) employment and local livelihood support, is well-connected to the local economy and society, is characterised by particular practices for gaining, maintaining and controlling access (access mechanisms) and by proper professional norms. When confronted with the idea of a largescale, industrial mining sector, miners themselves believe that artisanal mining potentially holds more benefits for them, at least in the short and medium run.

Source: Author's graph based on survey results

⁹⁶³ See section 1.5 and chapter thirteen.

Of course, other aspects are important as well in determining the viability and profitability of artisanal mining vis-à-vis industrial mining, more particularly economic and geographic viability, the materiality of the mineral resources, national and international policies and macro-economic developments. These fall beyond the scope of my dissertation, although some will be picked up in chapter thirteen. As for this chapter, I believe that it does allow to make an argument about the ability to benefit in artisanal and industrial mining. First, it shows that a comparison between the two sectors should not only look at economic parameters. Second, it evidences that artisanal mining activities are highly valued by the people who are involved in them. These people do not only look at economic profits either, but they also cherish the hope, freedom, relationships, social status and identity artisanal mining offers. They are quite conscious of the opportunities as well as the failures in artisanal mining. The hope to 'strike it rich' may not be so rational (not so many people effectively strike it rich), but it is a reality in the gold mines as beliefs are continuously sustained by examples and stories about it. Moreover, the earnings from mining seem to exceed the earnings from other economic activities that are available to these people. In this sense the decision to mine may indeed be rational. The artisanal miners are also very much aware of the fact that industrial mining creates few jobs and that alternative employment opportunities are limited too as the benefits from industrial mining are not trickling down to support local economies. The development model based on large-scale production relies on growth, efficiency and private investments. It calls for the protection of private property and thereby inevitably dispossesses small-scale or subsistence farmers and artisanal miners. In this model, labour is consistently replaced by capital, which is of course reflected in the employment opportunities in large-scale mining.

"Nous connaissons d'ores et déjà le métier de mineur, nous en savons assez pour découvrir la veine d'or aussi bien que n'importe qui, dans n'importe quel terrain" (p.106).

> "We now master the job of being a miner, we know as well as anyone else how to find a gold vein" (p.106),

I am not pretending to fully 'master the job of being a researcher' and to have found the gold vein, as Jean-Nicholas Perlot did in California. Yet I do think that this dissertation makes a valid and useful contribution to development and academic research. It also provides for an account that is different from and probably more accurate than what is conventionally said about artisanal mining and mineral trade in eastern DRC. Gold from the region, more particularly, is infamous for sustaining a decade-long conflict and not contributing to development because of its so-called 'illegal' and 'informal' character – 98 percent is estimated to be smuggled out. This dissertation first of all demonstrates why the conventional narrative on 'conflict minerals' is misconceived and why a characterisation of mining and trade activities as 'informal' makes little sense in this context.

In fact, the conflict minerals narrative only captures a minor part of the reality in the eastern mines and should be nuanced both in time (as historical trajectories matter and the situation has obviously evolved since the war) and in space (as there are huge differences between different sites). First, the evident link that is made between mineral resources and conflict is wrong and underplays a number of historical, political and social factors at the national and local level. Second, minerals are not the only source of financing for armed groups. Since they also rely on taxation of citizens, revenues collected at roadblocks or trade in charcoal, timber and bananas, cutting them off from mining is unlikely to stop the violence. Third, it has become very unclear what the criteria are for labelling a mineral or a mine as a 'conflict mineral' or a 'conflict site'. It seems as if the mere 'presence' and 'involvement' of armed actors - be they state or non-state - already suffices to classify it that way. The concrete mechanism through which armed actors profit from mining and trading activities is taxation. Yet reports provide very little evidence of what this 'taxation' actually entails and what is the level of violence and coercion involved. Such a reading of the situation bluntly ignores governance realities in the DRC, where 'illegal' taxation practices and coercion are part of dayto-day local governance carried out by state as well as non-state, and armed as well as nonarmed, actors. This dissertation demonstrates that these kinds of taxation practices are legion in the gold sector, but they are part of a governance system that has emerged out of the country's political and economic history, and that extends to all sectors of Congolese economy and society. The inability of the Congolese state to provide public services, pay state agents and effectively implement legislation is key to understanding this. Although there are some signs that the government is now more effectively implementing policy reforms (for example with respect to the payment of state agents' salaries), one cannot expect them to change a deeply rooted governance system overnight. With respect to artisanal mining, many provisions in the Mining Code and the Mining Regulations have not been implemented (or not enough) to date: artisanal exploitation zones and centralised trading points are few and not operational, requirements and conditions for cooperatives are obscure and the administrative and technical services of the Ministry of Mines lack the necessary resources and many taxes and contributions that are not foreseen in the Mining Code are collected by individual state agents. So although from the perspective of 'the state' (as an entity), it may make sense to talk about the 'illegality' and 'informality' of the gold trade because it loses out on a lot of potential revenues, even from the perspective of individual state agents it seems to be pointless. And that is certainly the case for the miners and traders under study. They constantly and unconsciously move between so-called 'formal' and 'informal' as they just try to secure their 'ability to benefit' or their access.

Looking at 'ability to benefit' implies looking at practices but also at power relations and norms constraining these practices, or their agency. 'Access' is used in this dissertation in two ways. First of all it structures the empirical material and guarantees a persistent focus on the main research question: what are the access and control mechanisms for actors in the gold sector and how does access change? In other words: how do artisanal gold miners and traders, but also state agents, chiefs and other elites benefit from gold mining and trade and which norms and power relations shape their ability to benefit? Second, access is used as a theoretical and analytical tool that allows me to draw some conclusions on agency, power and norms in the gold sector.

13.1. ACADEMIC CONTRIBUTION

Access theory argues that not only rights, but also structures and relationships matter for people's ability to benefit from a resource. This finding is of course not new. Legal pluralists already acknowledged that political, economic, cultural and social factors and institutions determine who can use law, custom and convention, and in what ways. The capabilities and livelihood approach focused on how people can draw upon various forms of capital – among which social capital, i.e. relationships – to achieve valuable outcomes, which are also influenced by the institutional context. The latter approach was informed by actor-oriented sociology looking at what individuals are capable of doing, even under extreme forms of coercion. The tension between agency and structure, now seems to have been overcome in an interactionist approach that considers both as being mutually influencing.

Access theory is one of the manifestations of such an approach. It looks not only at what people do (their practices), but also at how they are constrained in doing this. Such reasoning explicitly brings power and norms into the picture. The centrality of 'power' in the access framework owes much to Marxist political economy. This is visible in the crucial distinction that is made between access maintenance, i.e. the ability to keep your resource access open, and access control, i.e. the ability to open or block access for others. This reflects the discrepancy between those who own the means of production and those who work with other people's capital. An important point made by access theory, however, is that an individual usually holds a bundle of powers that includes both mechanisms for maintaining and for controlling access. As such, an individual can be in a subordinate position with respect to some, but a dominant position with respect to other actors. This has become clear in part three of this dissertation. The actors 'at the bottom of the chain', the miners, are not automatically in a weaker position than, or exploited by, the traders. They are indeed in a relation of dependency and may not be able to bargain about the price for their products, but the traders depend just as much on supply from the miners and they take a lot of financial risk.

When I analysed access mechanisms in the gold trade, I also showed that the same mechanisms, such as access to information or trickery, can work for different (large and small) traders in different ways. The point is that actors are not locked into relations of control and exclusion. They may always find other ways to gain or maintain access (through the access mechanisms). Yet it is important to understand how the configuration between maintenance and control evolves over time and across spaces, in order to understand processes of change in the relation between people and mineral resources. That is what this dissertation aims to do.

The access approach has so far been used in political ecology research on land and forests mainly, but also on water, fisheries, coral reefs, protected areas and topics such as climate change, community based resource management and land grabbing⁹⁶⁴. Applying it to mineral resources is extremely relevant though. First of all it enhances our understanding of agency, power and norms around mineral exploitation and trade. Second it enriches access theory in itself, as minerals constitute quite a particular case. The discourse around mineral resources says that their exploitation, be it on a large or on a small scale, is usually characterised by conflict and underdevelopment and that local people never benefit from it. Access theory allows us to nuance this, which in itself is already an important achievement.

This study has shown that the configuration of access and control mechanisms changes over time and that at certain moments, one may become more effective than the other, so that maintenance may convert into control and vice versa. These changes depend on local realities (socio-economic context, position of local elites), but also on the broader political economy (macroeconomic context, governance context, national and international policies). It is this exact process that shows us who the 'winners' and the 'losers' are in the struggles over resources, in this case the gold. In Kamituga, the local population claimed their rights to access gold mining soon after independence. They gained access by starting to dig in abandoned parts of the concession, and eventually even inside the core underground shafts. They maintained their access by referring to a number of rights-based ('the ancestors' land'), structural and relational (the agreements with local traders and security guards) mechanisms. In the 1980s and the 1990s, as a result of liberalisation and war, they were even able to strengthen these mechanisms and expand the scale of their activities. This also enhanced a professionalisation of the gold sector, in the sense that particular norms came into place which facilitated interactions and transactions within the sector. As the scale of artisanal mining activities and trade expanded, and the institutional context – the state, the infrastructure required for doing business – further weakened, the sector created its own norms, based on existing practices. Similar things were happening in Luhwindja and Mukungwe. But in Luhwindja, artisanal mining and trade came to be controlled by the customary chief, while the concession holder at least turned a blind eye. In Mukungwe the mining and trade activities were central to a conflict between local elites, resulting in a lot of violence and a very constraining environment for miners' access. Recent developments such as the start of industrial mining in Luhwindja have again caused changes in the configuration of access mechanisms. As access control becomes more effective, access maintenance grows sharper and increasingly grim.

⁹⁶⁴ I searched for all (211) articles that cite Ribot and Peluso's seminal article "A theory of access" (2003) on the Web of Science.

In part four I analysed the current policies of formalisation, certification and industrialisation as mechanisms of access control, making it increasingly difficult for artisanal miners and small traders to maintain access, although the latter do resist. Access theory helps us to understand what is happening here, namely a *reconfiguration* of access mechanisms, rather than a complete take over by those who are in control. The 'ability to benefit' thus is the outcome of a continuous bargaining process and the product of a changing political-economic context. Yet the balance recently shifted in favour of elites and companies who have better access to financial capital and information and thus a better position in the bargaining process. This process of elite capture accompanying mining sector reforms and the resulting exclusion of artisanal miners has also been described by Eleanor Fisher (2007) in the case of Tanzania. Despite the fact that the 1998 Mining Act conferred the right to renew, transfer and mortgage mineral titles to artisanal and small-scale miners, their poor education, lack of legal knowledge, financial problems and poor geological knowledge constrained them from doing so, Fisher argued.

I have described how the 'professional norms' in the gold sector have evolved as a way of regulating transactions and interactions and enhancing internal cohesion, certainty and transparency. Examples of this are the norms governing output sharing within a mining team, taxation practices by chiefs and state agents, credit and debt relationships, and the importance of professional qualities such as honesty, trust, skills and experience. The 'bricolage' of these norms is grounded in a historical and locally specific context, but it is also related to the materiality of gold (such as the low volume/high value character which makes it easy to smuggle) and the inherent characteristics of gold mining (such as the fact that output is unpredictable and underground shafts require an investment). This explains why similar practices and norms can be found in Tanzanian or West African gold mines. For example, Grätz (2002, 2004 and 2009) described similar norms with respect to work organisation and output sharing in West-Africa. He also observed a professional cohesion based upon "the development of moralities and risk sharing arrangements in the work sphere; comradeship and friendship ties in peer groups of migrants; the sociability of shared leisure time in the mining camp; and common modes of communication and consumption" (2009: 16). The same professionalisation has been observed by Bryceson et al (2014) in Tanzania. For them, artisanal mining is characterised by the importance of physical labour and skill acquisition, rather than formal education and privileged birth; relatively egalitarian norms inside the pit; norms on output sharing; self-governance; and collegial ties and trust (Bryceson and Jønsson, 2014: 9-10). Some differences can of course be related to the institutional context. The whole issue of 'abandoned concessions' where a skilled labour force is present seems to be quite particular for South Kivu, as well as the insecurity and violence which push gold mining and trading activities further into unofficial circuits, and the particular position of customary chiefs.

Yet the number of in-depth studies about the internal organisational dynamics of artisanal mining is limited. The existence of 'chains of debt' for example has been mentioned in the work of Banchririgah and Hilson (2010), Cartier and Bürge (2011), Panella (2010) and Perks (2011), but none of them has provided a detailed account or has described how these chains of debt are governed. This dissertation aims to fill in this gap. Another gap in the literature is the analysis of organisation in the gold trade. Although some studies, especially by NGOs, have also looked at the 'commodity chain' of gold, describing the process from the extraction level

up to the international markets such analyses have remained relatively superficial. Little indepth attention has been paid to how the gold trade functions at the local and the regional level, and how traders are connected to miners. Another feature of this study is its persistent attention for contextualisation and the proof that the current organisation of mining and trade is profoundly grounded in local histories. Hereby it calls for more context-sensitive and historical approaches to current development problems.

13.2. DEVELOPMENT CONTRIBUTION

This dissertation makes a development contribution on two main topics: formalisation and industrialisation. They are both related to the question whether there is a future for artisanal gold mining in eastern DRC, and what this future could or should look like. Let me first return to the main arguments in favour of formalisation: security and efficiency. The first argument says that titles give miners human and physical security and protect them from extortion and dispossession. The efficiency argument reasons that secure titles will automatically lead to higher investments and thus to growth and economic development. Yet section 1.4 has demonstrated that this is not necessarily the case. In terms of efficiency, we can take the government's or the more individual perspective. For the government, the costs of formalisation policies are difficult to assess and entail implementation and monitoring costs for the mining administration and technical services mainly. The benefits, however, can be more or less evaluated, at least in terms of expected tax revenues. The latest report by the UN Group of Experts estimated on the basis of the total value of gold smuggled out of the country that the government lost between 7.7 and 8.2 million USD in taxes for gold in 2013. So in this sense formalisation could yield a lot. Putting this into perspective, however, I have also noted that large-scale companies currently already contribute about USD 800 million (EITI, 2012). It is therefore not difficult to see why the government favours industrial mining. At the level of individual miners and traders, first of all my research has shown that shaft managers and traders already invest a lot in the mines, even in the absence of a formalised title. Moreover, the costs for formalising their activities are expected to be high, whereas the benefits are, under the current circumstances, unlikely to materialise. Costs may entail a lot of taxes (although it is not clear to what extent these would be lower or higher than current taxes), difficulties, time and bribes to obtain official documents; their activities will be monitored by the administration; they will only be allowed to work in specific zones; and their activities are to become semi-industrial, involving higher investment costs. Real benefits on the other hand can only be expected when broader governance and economic reforms will be put in place. It is not clear either under which conditions individual state agents will give up their personal gains in the form of illegal taxation.

It does not make sense to formalise in a context where the state cannot enforce its own legislation, as the institutions that should support formalisation are lacking or not functioning well. In South Kivu for example artisanal exploitation zones are few, they are not operational, not necessarily suited for artisanal mining and they can be easily closed if industrial actors get interested in the concessions. Apart from that, vast parts of the province's surface area have already been allocated to industrial companies and are covered by exclusive mining titles. The centralised trading points are not operational either and the technical services of the Ministry of Mines lack the necessary resources to perform their tasks. Furthermore, in such contexts

with widespread poverty and underdevelopment, the employment and livelihoods that are being supported by artisanal mining, albeit part of the unofficial economy, may be valued higher than the efficiency and growth that can be promoted by a formalised sector. This argument of course also applies to the debate on industrialisation. It is widely recognised that artisanal mining employs far more workers than is the case in industrial mining. Moreover, these jobs are well suited for low-skilled workers and there are few barriers to entry. Apart from the direct employment, one must also consider the vast range of supply businesses and indirect employment alimented by artisanal mining. Industrial mining will never be able to provide as much employment opportunities, neither in the short nor in the long run. For that reason, the job creation opportunities of artisanal mining should not be underestimated in a context like South Kivu, where there are only an extremely limited number of formal jobs available.

In terms of security, several studies have demonstrated that formalisation holds opportunities for elite capture because the wealthy and powerful are better placed to have their access transformed into legal, formalised titles. They can make use of access mechanisms which are very instrumental in acquiring formalised private titles, such as access to financial capital (to make investments), to vertical relations (having the rights connections in the administration or in politics) and to information (knowing the procedure for applying for a title, for example). Artisanal miners and local people risk losing out, to the benefit of elites (this can be seen in the case of cooperatives in South Kivu) and industrial companies. Moreover, formalisation risks to exclude a whole range of people, 'intermediaries' such as small traders, people involved in processing the material, people providing food and catering services and many others who directly depend on mining activities. This certainly does not encourage a 'community ownership' of natural resources. The fact that local people directly participate in and to a large extent manage artisanal extraction is indeed often considered to be one of the advantages of ASM. Or, as Pact (2010: 24) wrote, "artisanal mining is (or can be if well managed) 'the people's mining' and can deliver a greater sense of ownership of, and direct participation in, the mining sector". In a similar way, Mitchell and Garrett (2009) suggested that the 'informalisation' of mineral extraction can be seen as a democratisation of production, and Bryceson and Fisher (2014: 185) argued that artisanal mining has the potential to "foster democratic tendencies". But the latter authors also said that these tendencies may be undermined by 'political and economic pressures'.

The second major topic on which this dissertation allows to draw some conclusions is the industrialisation of the mining sector and the related question about the viability of artisanal mining. I will discuss several factors influencing this viability: materiality (geological factors), economic viability, supply and demand at the world market and production mode.

In this discussion it is first of all important to look at the materiality of the resource. Minerals with a relatively low price per volume unit and a low grade are, by their nature, not suited to be mined artisanally (De Putter and Decrée, 2013: 54). Take copper, for example, where the price for 50 kg with a 2 percent grade, the quantity that can be transported on the back of a bicycle, is only USD 8.25. It is important to know the regional potential of a mineral as well (idem: 55). If its occurrence is quite limited, in alluvial or eluvial deposits, industrial exploitation may not be profitable. Indeed, the start of an industrial mining project will always

depend on a feasibility study and efficiency calculations which take into account costs on the one hand, and volumes and grades on the other (World Bank, 2009). A mineralisation that can economically be mined is labelled as 'ore', so the definition of what is an ore body is dependent on economic cost/benefit analyses and is different for industrial and artisanal mining. With respect to the materiality of gold, De Putter and Decrée (2013: 55) argued that it is a special case. Gold is very high in value as compared to volume, and in eastern DRC it occurs in different geological forms, some of which are suited for industrial mining (large volumes with low grades), while others (higher grades in more easily accessible deposits) are suited for artisanal mining (see also Pact, 2010: 23). But there are also many uncertainties as the geological reserves in eastern DRC have not been quantified and the nature of deposits is not well known. With respect to the economic viability of artisanal mining, this depends on the productivity of the mines. The debate on agriculture in section 1.5 taught us that small-scale producers are typically more productive per hectare, but they substitute capital by labour and rely on labour-intensive techniques (De Schutter, 2011). Yet it is not known whether this also applies to mining, as we assume that investments in mining shafts are much higher. The scope of my dissertation has not allowed me to study this, so further research is needed⁹⁶⁵.

A third point concerns the demand and supply of gold at the world market. Also in this respect gold may be quite exceptional because of its materiality. It is possible to recycle gold without losing quality. So gold that is kept in central banks and in the form of jewellery can actually reenter the market on the supply side. For this reason, Shafiee and Topal (2010: 178) stated that "gold is a renewable resource". Indeed, recently authors have raised ethical questions about the need to continue extracting gold on a large scale – given the severe environmental and social consequences – as the possibilities for recycling gold have improved significantly (Ali, 2006: 457). In 2012 the share of so-called scrap gold (recycled) in global supply was 36 percent against 64 percent for mine production, as shown in table 21.

| | 2010 tonnes | 2010 share (percent) | 2011 tonnes | 2011 share (percent) | 2012 tonnes | 2012 share (percent) |
|---------------------------------------|----------------|----------------------------|----------------|----------------------------|----------------|----------------------------|
| Mine production | 2739 | 61 | 2838 | 63 | 2861 | 64 |
| Scrap (above- ground stocks) | 1723 | 39 | 1680 | 37 | 1616 | 36 |

Table 21. Supply of gold to the market

Source: Thomson Reuters (2013: 60)

But there is potential to increase the share of recycled gold, even to the extent that it can meet the entire global demand. Central banks for example hold about 30,000 tonnes of gold in total in reserve, and an estimated 100,000 tonnes is kept as jewellery (Shafiee and Topal, 2010: 178). As argued by Ali (2006: 461):

"there is a plausible case to be made for channeling current gold consumption through controlled recycling of existing reserves, and/or through small-scale miners, provided they

⁹⁶⁵ See research that will be conducted by Francine Iragi, Gabriel Kamundala and Stefaan Marysse (CEGEMI) in South Kivu.

comply with the same level of environmental and social responsibility that mining corporations are held accountable for" (idem: 461).

And this may even be necessary. Some researchers estimate that world gold reserves will diminish in less than 40 years (Shafiee and Topal, 2010: 178). A case could be made then for the continuation of gold extraction on a smaller scale, with respect for the working conditions of small-scale mining and their impacts on the environment.

A fourth point that needs to be considered is the particular production mode artisanal extraction represents. In this dissertation I conceptualise artisanal mining as a production mode that offers ample opportunities for (flexible) employment and local livelihood support and is well-connected to the local economy and society. Moreover, it is characterised by particular practices for gaining, maintaining and controlling access (access mechanisms) and by proper professional norms. For this reason I argue that artisanal mining is currently more adapted – or at least contains some elements that make it more adapted but need some improvement – to be beneficial for the majority of South Kivu's population. This description of the production mode is partly based on the existing literature on ASM and partly on my own findings. It is very much in line with Bryceson and Jønsson's (2014: 8) work, capturing the professional identity of an artisanal miner which develops through 'occupationality', "a process of skill acquisition, economic exchange, psychological orientation and social positioning through which an individual becomes actively engaged in specific work and identifies with it as an extension of his or her social being". Artisanal miners, they argued, are self-made, independent miners in contrast to wage labourers in mining companies who work "under standard capitalist contractual conditions and under a management chain of command which leaves little scope for independent decision-making about how they work" (idem). Indeed, large scale mining is based on neoliberal capitalism, privatisation and commoditisation, leading to dispossession and a dismissal of labour. Artisanal miners face lower labour and technical costs, which may make minerals with lower (but not too low) grades economically profitable to them. But with their technologies they cannot extract large volumes, nor mine deep underground. They thus target more accessible surface deposits, where relatively small quantities of extracted rocks can generate sufficient grades. These near surface deposits, however, may be highly sought-after by companies as well, since their relatively easy and lowcost exploitation may generate the necessary funds to invest in deeper extraction. Artisanal miners can also work in more remote sites and in areas where there is no road infrastructure or limited electricity supply, something which is not possible for industrial companies.

In light of all this, some authors have argued that it should be possible to divide deposits according to their characteristics and come to segregation, land sharing arrangements or even land title transfers, which would thus 'formalise' property rights on artisanal mining sites. Indeed, several authors have been pleading for a coexistence scenario through a formalisation of artisanal mining and a transfer of (parts of) the vast industrial concessions to artisanal miners⁹⁶⁶. According to Clausen et al (2011: 21) this may even be the economically most efficient solution, despite companies' feeling that they need to maintain strong property rights in order to be efficient. In reality companies often acquire vast concessions, where after

⁹⁶⁶ The World Bank for example has proposed cohabitation strategies in its 2009 publication. Other examples can be found in Andrew, 2003; Aubynn, 2009; Hilson, 2002; Hilson and Yakovleva, 2007; Luning, 2008. .

exploration they target the deposits that are most profitable to them, but they are not prepared to release other deposits to artisanal miners (Banchirigah, 2008: 31; Clausen et al, 2011: 21). That is why Hilson and Yakovleva (2007) argue that usually conflicts between largescale and small-scale miners are not a result of competition for the same minerals, but "rather over unused lands that large-scale miners refuse to relinquish". In some cases land sharing arrangements have been made, although companies tend to conceive them as a conflict prevention or conflict management strategy. Companies may as well tolerate artisanal miners to work abandoned ore bodies or rework company's tailings, and these miners may even be technically assisted, as happened for example in the Abosso concession in Ghana (for other examples see Andrew, 2003: 121; Aubynn, 2009; Banchirigah, 2008: 36; Hilson, 2002a and b; Luning, 2008; World Bank, 2009). A pilot document by the World Bank, with CASM, International Council on Mining and Metals and IFC's Oil, Gas and Mining Sustainable Community Development programme (2009) provided some best practices for LSM companies to engage with artisanal miners. It identified five reasons to do so: minimising risk and enhancing security, managing reputational risk, maximising community development, responding to CSR and maximising company benefits. The latter can include direct benefits such as capitalising upon ASM activity for exploration. Indeed, the presence of artisanal miners is commonly considered as an indication of promising gold prospects (Luning, 2008: 393) and many rich ore bodies have been discovered by artisanal miners (Godoy, 1985: 100; Carstens and Hilson, 2009: 311). The tools supplied in this World Bank document (2009: 20) include ASM baseline surveys, resettlement action plans, alternative livelihood programmes, technical assistance programmes, community development plans, employment of ASM workers, formalisation and segregation of mineral concessions.

With respect to the future of artisanal mining, Bryceson and Fisher's (2014) analysis is at the same time optimistic and pessimistic. The authors argued that artisanal mining may "foster democratic tendencies at the local level with reverberations for regional and national levels" (idem: 185), which is quite an optimistic view on the potential of artisanal mining. However, this democratisation can be undermined by:

"technological constraints, political and economic pressures diverting the course of artisanal mining away from its egalitarian leaning, and displacement of artisanal miners' mineral access to make way for large-scale mining" (idem: 185).

The latter two factors correspond to what I have described in part four of this dissertation as external pressures on artisanal mining, namely formalisation and industrialisation. Bryceson and Fisher's (idem) view is pessimistic in that it assumes that the gradual displacement of artisanal by large-scale mining is inevitable in all African countries and that artisanal mining just offers a "pivotal interlude" (idem: 200). "The influence of artisanal democratic tendency wanes as corporate mining becomes dominant", they concluded (idem: 200). As I have said above, I am not sure whether this is the case. Global demand for commodities, price fluctuations and new technologies may all provoke changes in the ratio between artisanal and industrial mining, and for some minerals or for some deposits artisanal exploitation may turn out to be more efficient and may thus have a chance of 'surviving'. In any case, predictions about the long term are difficult. Therefore I would like to conclude this chapter with some

suggestions related to the organisation and support of artisanal mining in South Kivu in the short and the midterm.

In South Kivu, coexistence between the artisanal miners, who are currently working most of the gold deposits in the region, and industrial companies holding research or exploitation permits should be possible, at least in the short and the midterm. Vast surface areas have been given in concession to companies, but some of them are ghost companies that do not plan to start effective extraction, but speculate on the research permits. Others, like Banro and Casa Mining⁹⁶⁷ will not work the entire concession as they only target the ore bodies that can be most efficiently mined with large machines. Besides, once they judge the ores not profitable anymore, these companies will depart, leaving many question marks about the 'after-mine' and its environmental and socio-economic state. In brief, ore bodies which do not justify major investments in machines and infrastructure or are too dispersed or difficultly accessible could be mined by artisanal miners. The Mining Regulations do provide some room for these kinds of reallocations (see also Kamundala Byemba, 2013a: 19). For example, they require a company to renounce parts of the concession at the time of the renewal of the research permits⁹⁶⁸. The Ministry of Mines can invalidate the permits of companies that do not adhere to the regulations. In this respect 10 permits representing about 1168 km2 were already invalidated in early 2012 (idem). As Kamundala Byemba (idem) said, this "can be an opportunity for the Mining Registry to create new AEZ, or to hand over these titles to companies that can exploit them". This pathway implies that the Congolese government bases its demarcation of artisanal mining zones on sound geological knowledge. Yet currently the nature and geological composition of deposits in eastern DRC is a big unknown factor, so for many mining sites we actually do not know whether their deposits are suited for ASM or LSM. Therefore, more and better geological information is required. Studies should be able to identify the geological conditions and to calculate the economic feasibility of projects. The government should also be able to make use of data gathered by industrial exploration, since companies often have better and more detailed information. On the basis of clear criteria, deposits should then be assigned to industrial, semi-industrial or artisanal miners. However, at present this seems a bit utopian. Given the weak implementation and enforcement capacities of government agencies, it may currently be more efficient to look for more pragmatic solutions, such as a direct negotiation with industrial mining companies. So my first point is to argue for a pragmatic approach vis-àvis the creation of zones where artisanal miners can work, ceding parts of concessions where companies are not operating.

Second, the immediate priority should be targeted assistance for artisanal miners, instead of focusing on some vaguely defined benefits that are supposed to result from formalisation. Miners will first of all benefit from more accurate geological knowledge. They are also in need of adequate safety equipment (boots, torches, helmets) and small machines. These could help them, for example, to circulate oxygen or evacuate groundwater from the shafts, or to process the ore. In some sites miners already use 'crushing machines' to crush the hard rocks (for example in Misisi), while in other mines, such as the ones I described in this study, this work is done manually. Access to financial credit is crucial as well. Today access to credit is almost nonexistent for artisanal miners. They are judged not creditworthy because of their 'informal'

⁹⁶⁷ Casa Mining is active around Misisi, Fizi territory. See http://www.casamining.com/.

⁹⁶⁸ Mining Regulations, Chap. 4, Art. 129.

CHAPTER 13. CONCLUSION

status and lack of titles, but also because of their reputation and lifestyle. The outcome of a mining project, as said before, is almost always uncertain. This does not encourage the traditional financial institutions or microfinance institutions to grant credit to individual miners or shaft managers. For cooperatives too, the possibilities of getting a loan are limited since most find themselves in an unstable and uncertain situation. One possibility in this context could be for cooperatives to act as credit unions, democratically run organisations using pooled funds from members to invest in machinery and materials to improve their own working conditions, as well as to make loans to members to improve their socio-economic situation. Yet it remains to be seen whether such a model can be successfully replicated in the Congolese context, because as I said the process of creating cooperatives is all too often politicised. Some cooperatives control access to particular mines and require miners to pay adherence or entrance fees. They are often set up by local elites and function as mere vehicles for self-enrichment. Yet the Mining Code has a vision of cooperatives as small production units, evolving into business units. This requires considerable financial capital, technical knowledge, and material resources.

Third, more attention should be paid to the linkages between artisanal mining and other productive sectors of the local economy. In this respect the importance of agriculture is sometimes underestimated. As said before, it still provides livelihoods for the large majority of South Kivu, but investment and innovation in this sector remain low. Although this dissertation cannot provide concrete recommendations to deal with this, I do recommend further research on whether and to what extent artisanal miners in South Kivu are combining their mining activities with agriculture; and how mining activities feed into agriculture and vice versa. Better insights into these linkages will allow policymakers to design more adapted interventions, and possibly to make agriculture more attractive as an alternative and sustainable livelihood activity when opportunities for artisanal mining decline⁹⁶⁹. But in general the thinking and the creative initiatives around alternative livelihood activities in South Kivu are still extremely limited. As I described in chapter twelve, Banro initiated a programme for alternative livelihoods, training a few hundred former miners in various professions. I concluded that this programme may have brought some relief to the miners and their families in the short and medium term, but it is not obvious that this will also be the case in the long run. First, many former artisanal miners were not attracted by these alternative income generating activities, because they provide less revenues than mining⁹⁷⁰. Second, the programmes only targeted a small minority of miners. The South Kivu labour market is currently unable to absorb all or even most artisanal miners in alternative professions. As for the mining activities themselves, this and other research has shown that they have relatively high-earning potential. The problem is that, working in isolated and insecure areas, in the absence of banking or credit systems, miners have very little option but to spend it on site, as it is earned. If, however, they were able to easily and safely deposit and transfer money, this could not only allow for savings but the sending of remittances back to families could boost local investment and development and become a driver for other sectors such as agriculture and livestock. The introduction of new mobile phone technologies might be able to trigger a

⁹⁶⁹ See also Pact (2010: 102): "Agricultural livelihoods are one alternative livelihood option heavily cited". Yet Pact also notes that artisanal miners are not attracted by agriculture because it generates fewer revenues and requires more time and patience.

⁹⁷⁰ See also Pact (2010: 102): "Yet it can be very difficult to persuade artisanal miners to abandon an activity which, despite being extremely tough, delivers a daily and often quite substantial income.

small revolution in this sense. The Kenyan M-Pesa system, which allows users to easily deposit, withdraw, and transfer money with a mobile device, could serve here as an example⁹⁷¹. So on top of the changes in access to information and prices induced by these new technologies⁹⁷², I believe that the latter have the capacity to drive local investment and savings.

In conclusion, artisanal gold mining and trading activities do offer benefits to local people in South Kivu, not only directly to miners, traders and their families, but also to those trading and providing services around the mines, and indirectly to the entire local and regional economy. To benefit or not to benefit, that is not the question. The more important question is how these people can increase (in quantitative terms) and improve (in qualitative terms) their benefits and maintain them under changing political economic circumstances. The 'golden future' for artisanal mining may not be around the corner, but stigmatising and sanctioning the sector will definitely not help the people who are making a living out of it. Therefore, this dissertation has ended with a few suggestions about how to proceed, following the miners' own device: he who seeks shall find (a future for artisanal mining).

 ⁹⁷¹ See http://www.guardian.co.uk/money/2007/mar/20/kenya.mobilephones or http://www.bbc.co.uk/news/business-11793290 for more information.
 ⁹⁷² See chapter eleven.

REFERENCES

Africa Progress Panel (2013) "Equity in extractives. Stewarding Africa's natural resources for all", *Africa Progress Report 2013*, Africa Progress Panel, Geneva.

Akabzaa, T. (2009) "Mining in Ghana: implications for national economic development and poverty reduction", in: Campbell, B. (ed.) *Mining in Africa. Regulation and development*, London and New-York, Pluto Press, 25-65.

Alchian, A. and Demsetz, H. (1973) "The property right paradigm", *The Journal of Economic History*, 33 (1): 16-27.

Ali, S.H. (2006) "Gold mining and the golden rule: a challenge for producers and consumers in developing countries", *Journal of Cleaner Production*, 14: 455-462.

Altenburg, T. (2006) "Governance Patterns in Value Chains and their Development Impact", *The European Journal of Development Research*, 18 (4): 498-521.

Alvesson, M. and Sköldberg, K. (2000) *Reflexive methodology. New vistas for qualitative research*, London, Sage Publications.

Andrew, J.S. (2003) "Potential application of mediation to land use conflicts in small-scale mining", *Journal of Cleaner Production*, 11: 117-130.

Ansoms, A. (2010) "Views from below on the pro-poor growth challenge: the case of rural Rwanda", *African Studies Review*, 53 (2): 97-123.

Areskog Bjurling, K., Ewing, J., Munje, D. and Purje, H. (2012) "From Congo with (no) blood: recent developments relating to the sourcing of conflict-free minerals from the Democratic Republic of Congo", *MakeITFair Report*, Finnwatch and Swedwatch, Helsinki and Stockholm.

Aubynn, A. (2009) "Sustainable solution or a marriage of inconvenience? The coexistence of large-scale mining and artisanal and small-scale mining on the Abosso Goldfields concession in Western Ghana", *Resources Policy*, 34: 64-70.

Autesserre, S. (2012) "Dangerous Tales: Dominant Narratives on the Congo and their Unintended Consequences", *African Affairs*, 111 (443): 202–222.

Auty, R. (1993) *Sustaining development in mineral economies: the resource-curse thesis*, London, Routledge.

Auty, R. (2001) "The political economy of resource-driven growth", *European Economic Review*, 45 (4-6): 839–846.

Azarya, V. and Chazan, N. (1987) "Disengagement from the State in Africa: Reflections on the Experience of Ghana and Guinea", *Comparative Studies in Society and History*, 29 (1): 106-131.

Bafilemba, F., Lezhnev, S. and Wimmer, S.Z. (2012) "From Congress to Congo. Turning the tide on conflict minerals, closing loopholes, and empowering miners", Enough Project, Washington.

Ballard, C. and Banks, G. (2003) "Resource wars: the anthropology of mining", Annual Review of Anthropology, 32: 287-313.

Ballentine, K. and Sherman, J. (2003) *The political economy of armed conflict: beyond greed and grievance*, Boulder CO, Lynne Rienner.

Ballentine, K. (2003) "Beyond greed and grievance: reconsidering the economic dynamics of armed conflict", in: Ballentine, K. and Sherman, J. (eds.) *The political economy of armed conflict: beyond greed and grievance*, Boulder CO, Lynne Rienner.

Banchirigah, S.M. (2006) "How have reforms fuelled the expansion of artisanal mining? Evidence from sub-Saharan Africa", *Resources Policy*, 31: 165-171.

Banchirigah, S.M. (2008) "Challenges with eradicating illegal mining in Ghana: a perspective from the grassroots", *Resources Policy*, 33: 29-38.

Banchirigah, S.M. and Hilson, G. (2010) "De-agrarianization, re-agrarianization and local economic development: re-orienting livelihoods in African artisanal mining communities", *Policy Science*, 43: 157-180.

Banks, G. and Ballard, C. (eds.) (1997) *The Ok Tedi Settlement: Issues, Outcomes and Implications*, Canberra, Australian National University.

Banro (2012) "A new direction for the eastern Democratic Republic of the Congo", 2012 Corporate social responsibility report, http://www.banro.com (last consulted 12/07/2012).

Banro (2013) "Investing in capacity building, jobs and community development", 2013 Sustainability report, http://www.banro.com (last consulted 13/06/2013).

Baracyetse, P. (1999) "L'enjeu géopolitique des sociétés minières internationales en République Démocratique du Congo (ex-Zaïre)", SOS Rwanda-Burundi, Kigali.

Barber, B. (1995) "All economies are embedded. The career of a concept, and beyond", *paper prepared for American Sociology Association meeting in August 1994*.

Barry, M. (ed.) (1996) "Regularizing informal mining. A summary of the proceedings of the international roundtable on artisanal mining organized by the World Bank, Washington, D.C., May 17-19, 1995", World Bank, Industry and Energy Department, Washington,.

Bates, R.H. (2001) *Prosperity and violence. The political economy of development*, New York and London, Norton and Company.

Bayart, J.-F. (2006) *L'Etat en Afrique. La politique du ventre,* 2nd edition, Paris, Fayard.

Bayart, J.-F. (2000) "Africa in the world: a history of extraversion", African Affairs, 99: 216-67.

Bayart, J.-F., Ellis, S. and Hibou, B. (1997) *The Criminalization of the State in Africa*, Oxford, James Currey and Indiana University Press.

Bazeley, P. (2007) Qualitative data analysis with NVivo, London, Sage Publications.

BBC News (2011) "DRC 'gold smugglers' arrested in Goma", 07/02/2011, http://www.bbc.co.uk/news/world-africa-12385910 (last consulted 08/07/2013).

Bebbington, A., Hinojosa, L. Humphreys Bebbington, D., Burneo, M.L. and Warnaars, X. (2008) "Contention and ambiguity: mining and the possibilities of development", *Development and Change*, 39 (6): 887-914.

Belgische Senaat (2003) "Parlementaire onderzoekscommissie belast met het onderzoek naar de legale en illegale exploitatie van en de handel in natuurlijke rijkdommen in de regio van de Grote Meren, in het licht van de huidige conflictsituatie en de betrokkenheid van Belgie daarbij, Zitting 2002-2003", 20 Februari 2003, Brussel.

Berckmoes, L. (2013) "Dealing with deceit: fieldwork encounters and lies in Burundi", in Thomson, S., Ansoms, A. and Murison, J. (eds.) *Emotional and ethical challenges for field research in Africa*, London, Palgrave MacMillan, 123-138.

Berry, S. (1993) No condition is permanent: the social dynamics of agrarian change in sub-Saharan Africa, Madison, University of Wisconsin Press.

Berry, S. (2001) *Chiefs know their boundaries. Essays on property, power, and the past in Asante, 1896-1996*, Portsmouth, Heinemann; Oxford, James Currey; Cape Town, David Philip.

Bezy, F., Peemans J.-P. and Wautelet, J.-M. (1981) *Accumulation et sous-développement au Zaïre 1960-1980*, Louvain-la-Neuve, Presses universitaires de Louvain.

Biebuyck, D. (1973) *Lega culture. Art, initiation, and moral philosophy among a Central African people*, Berkeley, University of California Press.

Blore, S. and Smillie, I. (2010) "An ICGLR-based tracking and certification system for minerals from the Great Lakes Region of Central Africa", Partnership Africa Canada (PAC) and International Conference on the Great Lakes Region (ICGLR), Ottawa.

Blore, S. and Smillie, I. (2011) "Taming the resource curse: implementing the ICGLR certification mechanism for conflict-prone minerals", Partnership Africa Canada (PAC), Ottawa.

Boege, V., Brown, A., Clements, K. and Nolan, A. (2008) "On hybrid political orders and emerging states: state formation in the context of 'fragility'", Berghof Research Centre for Constructive Conflict Management, Berlin.

Borras, S. and Franco, J. (2010) "From threat to opportunity? Problems with the idea of a 'code of conduct' for land grabbing", *Yale Human Rights and Development*, 13: 507-523.

Borras, S. and Franco, J. (2012) "Global land grabbing and trajectories of agrarian change: a preliminary analysis", *Journal of Agrarian Change*, 12 (1): 34-59.

Bourgouin, F. (2014) "The politics of mining. Foreign direct investment, the state and artisanal mining in Tanzania", in: Bryceson, D.F.; Fisher, E.; Jønsson, J.B. and Mwaipopo, R. (eds.) *Mining and social transformation in Africa. Mineralizing and democratizing trends in artisanal production*, London, Routledge, 148-160.

Braeckman, C. (2010) "La revolte des creuseurs gronde", *Le Soir*, 02/12/2010, http://archives.lesoir.be/la-revolte-des-creuseurs-gronde_t-20101202-015F5T.html (last consulted 18/05/2011).

Bromley, D.W. (2008) "Formalizing property relations in the developing world: the wrong prescription for the wrong malady", *Land Use Policy*, 26: 20-27.

Bryceson, D.F. and Jønsson, J.B. (2010) "Gold digging careers in rural East Africa: small-scale miners' livelihood choices", *World Development*, 38 (3): 379-392.

Bryceson, D.F., Jønsson, J.B. and Verbrugge, H. (2013) "Prostitution or partnership: wifestyles in Tanzanian artisanal gold mining settlements", *The Journal of Modern African Studies*, 51 (1): 33-56.

Bryceson, D.F., Fisher, E., Jønsson, J.B. and Mwaipopo, R. (eds.) (2014) *Mining and social transformation in Africa. Mineralizing and democratizing trends in artisanal production*, London, Routledge.

Bryceson, D.F. and Jønsson, J.B. (2014) "Mineralizing Africa and artisanal mining's democratizing influence", in: Bryceson, D.F.; Fisher, E.; Jønsson, J.B.; Mwaipopo, R. (eds.) *Mining and social transformation in Africa. Mineralizing and democratizing trends in artisanal production*, London, Routledge, 1-22.

Bryceson, D.F. and Fisher, E. (2014) "Artisanal mining's democratizing directions and deviations", in: Bryceson, D.F. ; Fisher, E.; Jønsson, J.B.; Mwaipopo, R. (eds.) *Mining and social transformation in Africa. Mineralizing and democratizing trends in artisanal production*, London, Routledge, 179-206.

Bulambo Katambu, A. (2002) *Capitalisme minier et droits de l'homme en RDCongo. La croisade des Nindja contre la Société Minière et Industrielle du Kivu*, Huy, Les Editions du Trottoir.

Bury, J. (2004) "Livelihoods in transition: transnational gold mining operations and local change in Cajamarca, Peru", *The Geographical Journal*, 170 (1): 78-91.

Bush, R. (2009) "Soon there will be no-one left to take the corpses to the morgue': accumulation and abjection in Ghana's mining communities", *Resources Policy*, 34: 57-63.

Callaghy, T., Kassimir, R. and Latham R. (eds.) (2001) *Intervention and transnationalism in Africa. Global-local networks of power*, Cambridge, Cambridge University Press.

Campbell, B. (ed.) (2004) "Regulating mining in Africa: for whose benefit?", *Discussion paper 26,* Nordiska Afrikainstitutet, Uppsala.

Campbell, B. (2009) "Introduction", in: Campbell, B. (ed.) *Mining in Africa. Regulation and development*, London and New York, Pluto Press, 1-24.

Campbell, B. (2012) "Corporate Social Responsibility and development in Africa: redefining the roles and responsibilities of public and private actors in the mining sector", *Resources Policy* 37: 138-143.

Carisch, E. (2012) "Conflict gold to criminal gold: the new face of artisanal gold mining in Congo", Southern Africa Resource Watch, Johannesburg.

Carstens, J. and Hilson, G. (2009) "Mining, grievance and conflict in rural Tanzania", *International Development Planning Review*, 31 (3): 301-326.

Cartier, L.E. and Bürge, M. (2011) "Agriculture and artisanal gold mining in Sierra Leone: alternatives or complements?", *Journal of International Development*, 23: 1080-1099.

CENADEP (Centre National d'Appui au Développement et à la Participation Populaire) (2012) "Atelier de lancement en expérimentation de la nouvelle technologie électronique de traçabilité des minerais de 3T- Met Trak dans la province du Sud-Kivu", CENADEP, BGR and PAC, Bukavu.

Chabal, P., and Daloz, J.-P. (1999) *Africa works: disorder as a political instrument,* Oxford, James Currey and Indiana University Press.

Childs, J. (2008) "Reforming small-scale mining in Sub-Saharan Africa: political and ideological challenges to a Fair Trade Gold Initiative", *Resources Policy*, 33: 203-209.

Chrétien, J.-P. (2006) *The Great Lakes of Africa. Two thousand years of history*, New York, Zone Books.

Clausen, F., Barreto, M.L. and Attaran, A. (2011) "Property rights theory and the reform of artisanal and small-scale mining in developing countries", *Journal of Politics and Law*, 4 (1): 15-26.

Clay, K. (1997) "Trade, institutions and credit", *Explorations in Economic History*, 34: 495-521.

Clay, K. and Wright, G. (2005) "Order without law? Property rights during the California gold rush", *Explorations in economic history*, 42: 155-183.

Cleaver, F. (2001) "Institutional bricolage, conflict and cooperation in Usangu, Tanzania", *IDS Bulletin*, 32 (4): 26-35.

Cleaver, F. (2012) *Development through bricolage. Rethinking institutions for natural resource management*, London, Routledge.

Cleaver, F. and Franks, T. (2005) "How institutions elude design: river basin management and sustainable livelihoods", *BCID Research paper 12*, Bradford Centre for International Development, Bradford.

Coldham, S. (1979) "Land-tenure reform in Kenya: the limits of law", *The Journal of Modern African Studies*, 17 (4): 615- 627.

Coleman, J. S. (1990) Foundations of social theory, Cambridge MA, Harvard University Press.

Collier, P. (2000) "Rebellion as a quasi-criminal activity", *The Journal of Conflict Resolution*, 44 (6): 839-853.

Collier, P. (2010) *The plundered planet. Why we must - and how we can - manage nature for global prosperity*, Oxford, Oxford University Press.

Collier, P. and Hoeffler, A. (1998) "On economic causes of civil war", *Oxford Economic Papers*, 50 (4): 563-573.

Cros, M.F. (2007) "Antonov tombé: polémique politique", *La Libre Belgique*, 10/10/2007, http://www.lalibre.be/actu/international/article/375883/antonov-tombe-polemique-politique.html (last consulted 04/04/2012).

Custers, R., Cuvelier, J. and Verbruggen, D. (2009) "Culprits or scapegoats? Revisiting the role of Belgian mineral traders in eastern DRC", International Peace Information Service (IPIS), Antwerp.

Custers, R. (2013) Grondstoffenjagers, Berchem, EPO.

Cuvelier, J. (2010) "The complex conflict dynamics in Kalehe's Nyabibwe mine", in: Cuvelier, J. (ed.) *The complexity of resource governance in a context of state fragility: the case of Eastern DRC*, London, International Peace Information Service (IPIS) and International Alert, 48-56.

Cuvelier, J. (2011a) "Between hammer and anvil : the predicament of artisanal miners in Katanga", in: Ansoms, A. and Marysse, S. (eds.) *Natural resources and local livelihoods in the Great Lakes region in Africa : a political economy perspective*, London, Palgrave MacMillan, 215-236.

Cuvelier, J. (2011b) "Men, mines and masculinities: the lives and practices of artisanal miners in Lwambo (Katanga province, DRCongo)", PhD diss. in Social and Cultural Anthropology, Catholic University of Leuven.

Cuvelier, J. (2013) "Conflict minerals in eastern Democratic Republic of Congo: planned interventions and unexpected outcomes", in: Hilhorst, D. (ed) *Disaster, conflict and society in crises. Everyday politics of crisis response,* London, Routledge, 132-149.

Danssaert, P. and Johnson, B.T. (2005) "Greed and guns. Uganda's role in the rape of the Congo", International Peace Information Service (IPIS), Antwerp.

Davies, C. A. (2008) *Reflexive ethnography. A guide to researching selves and others*, 2nd edition, London, Routledge.

Davis, G.A. and Tilton, J.E. (2005) "The resource curse", *Natural Resources Forum*, 29 (3): 233-242.

De Boeck, F. (1998) "Domesticating diamonds and dollars: identity, expenditure and sharing in Southwestern Zaire (1984-1997)", *Development and Change*, 29: 777-810.

de Failly, D. (2001) "Coltan: pour comprendre...", in : Marysse, S. and Reyntjens, F. (eds.) L'Afrique des Grands Lacs. Annuaire 2000–2001, Paris, L'Harmattan, 279-306.

De Haan, L. And Zoomers, A. (2005) "Exploring the frontier of livelihoods research", *Development and Change* 36 (1): 27-47.

Deininger, K. and Byerlee, D. (2011) "Rising global Interest in farmland. Can it yield sustainable and equitable benefits?", World Bank, Washington.

De Herdt, T. and Marysse, S. (1996) "L'économie informelle au Zaïre. (Sur)vie et pauvreté dans la période de transition", *Cahiers Africains*, 21-22, Paris, Institut Africain- CEDAF, L'Harmattan.

De Herdt, T. (2000) "Surviving the transition. Institutional aspects of economic regress in Congo-Zaire", Proefschrift voorgedragen voor het behalen van de graad van Doctor in de Toegepaste Economische Wetenschappen, UFSIA, Antwerp.

De Herdt, T. (2002) "Economic action and social structure: 'cambisme' in Kinshasa", *Development and Change*, 33 (4): 683-708.

De Koning, R. (2011) "Conflict minerals in the Democratic Republic of Congo. Aligning trade and security interventions", *SIPRI Policy Paper 27*, Stockholm International Peace Research Institute, Stockholm.

Demsetz, H. (1967) "Toward a theory of property rights", *The American Economic Review*, 57 (2): 347-359.

De Putter, T. and Decrée, S. (2013) "Le potentiel minier de la République Démocratique du Congo. Mythes et composantes d'une dynamique minière", in : Marysse, S. and Omasombo, J. (eds) *Conjonctures Congolaises 2012. Politique, secteur minier et gestion des ressources naturelles en RDCongo,* Cahiers Africains, Tervuren, Musée Royal de l'Afrique Centrale, 47-62.

De Schutter, O. (2011) "How not to think of land grabbing: three critiques of large-scale investments in farmland", *Journal of Peasant Studies*, 38 (2): 249-279.

De Soto, H. (2000) *The Mystery of capital: why capitalism triumphs in the West and fails everywhere else*, New York, Basic Books.

De Soto, H. (2002) "Law and property outside the West: a few new ideas about fighting poverty", *Forum for Development Studies*, 29 (2): 349-361.

Dietrich, C. (2002) "Hard currency: the criminalized diamond economy of the Democratic Republic of Congo and its neighbours", Partnership Africa Canada (PAC), Ottawa.

Dmoergue, C. and Mpoyi Mbunga, A. (2012) "La gestion des ressources naturelles pour une croissance durable", in: Herderschee, J., Mukoko Samba, D. and Tshimenga Tshibangu, M. (eds.) *Résilience d'un géant africain: accélerer la croissance et promouvoir l'emploi en*

Republique Democratique du Congo, Etudes sectorielles, Kinshasa, Mediaspaul and World Bank, 99-183.

Doornbos, M. (2002) "State collapse and fresh starts: some critical reflections", *Development and Change*, 33 (5): 797-815.

Duffield, M. (2001) *Global governance and the new wars: the merging of development and security*, London, Zed Books.

Dupriez, H. (1987) *Bushi: l'asphyxie d'un peuple,* Bukavu, ADI-Kivu.

EITI (2012) "Democratic Republic of Congo. Report 2010", *Extractive Industries Transparency Initiative report*, Kinshasa.

Ellis, S. and MacGaffey, J. (1996) "Research on Sub-Saharan Africa's unrecorded international trade: some methodological and conceptual problems", *African Studies Review*, 39 (2): 19-41.

Ellis, S. (1997) "The new frontiers of crime in South-Africa", in: Bayart, J., Ellis, S. and Hibou, B. (eds.) *The criminalization of the state in Africa*, African Issues, Oxford, James Currey and Indiana University Press.

Elster, J. (1989) "Social norms and economic theory", *Journal of Economic Perspectives*, 3 (4): 99-117.

Emerson, R.M., Fretz, R.I. and Shaw, L.L. (1995) *Writing ethnographic fieldnotes,* Chicago, The University of Chicago Press.

Englebert, P. (2003) "Why Congo persists: Sovereignty, globalization and the violent reproduction of a weak state", *Queen Elisabeth House Working Paper Series Working Paper 95*, University of Oxford, Oxford.

Englebert, P. (2009) *Africa. Unity, sovereignty and sorrow*, Colorado and London, Lynne Riener Publishers.

Emirates 24/7 (2011) "UAE among world's top five gold traders", http://www.emirates247.com/business/economy-finance/uae-among-world-s-top-five-gold-traders-2011-01-03-1.337429 (last consulted 10/03/2014).

Enough (2009) "A comprehensive approach to Congo's conflict minerals", Enough Project, Washington DC.

Enough (2012) "From child miner to jewelry store. The six steps of Congo's conflict gold", Enough Project, Washington DC.

Eurac and Fatal Transactions (2011) "EURAC and Fatal Transactions call for the EU to step up engagement on conflict minerals", Brussels, 27/04/2011.

Eyanga Sana, L.P. (2010) "Joseph Kabila suspend l'exploitation des minerais à Walikale", *Le Potentiel*, 11/09/ 2010, http://www.lepotentiel.com//////afficher_article_archive

.php?id_article=100732&id_edition=5081&yearID=2010&monthID=09&dayID=11 (last consulted 18/05/2011).

Faganda Keita, M. (2010) "Sur les sacrifices pour l'orpaillage artisanal dans le Manding", in : Panella, C. (ed.) *Worlds of debts. Interdisciplinary perspectives on gold mining in West-Africa*, Amsterdam, Rozenberg Publishers, 127-136.

Fahey, D. (2008) "Le fleuve d'or: the production and trade of gold from Mongbwalu, DRC", in: Marysse, S., Reyntjens, F. and Vandeginste, S. (eds.) *L'Afrique des Grands Lacs. Annuaire 2007-2008*, Paris, L'Harmattan, 357-384.

Fahey, D. (2009) "Guns and butter, Uganda's involvement in northeastern Congo, 2003-2009", in: Marysse, S., Reyntjens, F. and Vandeginste, S. (eds.) *L'Afirque des Grands Lacs. Annuaire 2009-2010*, Paris, L'Harmattan, 343-370.

Ferguson, J. (2005) "Seeing like an oil company: space, security, and global capital in neoliberal Africa", *American Anthropologist*, 107 (3): 377-382.

Fisher, E. (2007) "Occupying the margins: labour integration and social exclusion in artisanal mining in Tanzania", *Development and Change*, 38 (4): 735-760.

Fisher, E.; Mwaipopo, R.; Mutagwaba, W.; Nyagne, D. and Yaron, G. (2009) "'The ladder that sends us to wealth': artisanal mining and poverty reduction in Tanzania", *Resources Policy*, 34: 32-38.

Flyvbjerg, B. (2006) "Five misunderstandings about case study research", *Qualitative Inquiry*, 12 (2): 219-245

Foucault, M. (1994a) "Governmentality", in: Faubion, J.D. (ed.) *Michel Foucault. Power. Essential works of Foucault 1954-1984,* London, Penguin Books, 201-222.

Foucault, M. (1994b) "The subject and power", in: Faubion, J.D. (ed.) *Michel Foucault. Power. Essential works of Foucault 1954-1984,* London, Penguin Books, 326-348.

Free the slaves (2010) "Findings on slavery linked with mineral extraction in Eastern DRC", Free the Slaves, Washington DC.

Garrett, N. (2008) "Walikale. Artisanal cassiterite mining and trade in North Kivu. Implications for poverty reduction and security", Communities and Artisanal and Small-scale Mining (CASM), World Bank, Washington.

Garrett, N., Sergiou, S. and Vlassenroot, K. (2009) "Negotiated peace for extortion: the case of Walikale territory in Eastern DRCongo", *Journal of Eastern African Studies*, 3 (1): 1-21.

Garrett, N. and Mitchell, H. (2009) "Trading conflict for development. Utilising the trade in minerals from Eastern DRCongo for development", Department for International Development (DFID), London.

Garrett, N., Mitchell, H. and Lintzer, M. (2010) "Promoting legal mineral trade in Africa's Great Lakes Region. A policy guide on professionalisation, formalisation and increased transparency", Resource Consulting Services, London.

Garrett, N. and Lintzer, M. (2010) "Can Katanga's mining sector drive growth and development in the DRC?", *Journal of Eastern African Studies*, 4 (3): 400-424.

Geenen, S. and Marysse, S. (2008) "La fin des diamants de sang... un futur brillant pour les diamants du Congo ?", in: Marysse, S., Reyntjens, F. and Vandeginste, S. (eds.) *L'Afrique des Grands Lacs : Annuaire 2007-2008*, Paris, L'Harmattan, 331-356.

Geenen, S. and Kamundala Byemba, G. (2009) "Qui cherche, trouve? Opportunités, défis et espoirs dans le secteur de l'or à Kamituga", in: Marysse, S., Reyntjens, F. and Vandeginste, S. (eds) *L'Afrique des Grands Lacs: Annuaire 2008-2009*, Paris, Harmattan, 183-213.

Geenen, S. and Custers, R. (2010) "Tiraillements autour du secteur minier de l'Est de la RDC", in: Vandeginste, S., Reyntjens, F. and Marysse, S. (eds.) *L'Afrique des Grands Lacs. Annuaire 2009-2010*, L'Harmattan, Paris, 231-258.

Geenen, S. (2010) "The gold trade in Butembo", in: Cuvelier, J. (ed.) *The Complexity of resource governance in a context of state fragility: the case of Eastern DRC*, London, International Alert and International Peace Information Service (IPIS), 21-25.

Geenen, S. (2011a) "Local livelihoods, global interests and the state in the Congolese mining sector", in: Ansoms, A. and Marysse, S. (eds.) *Natural resources and local livelihoods in the Great Lakes Region of Africa. A political economy perspective*, London, Palgrave Macmillan, 147-69.

Geenen, S. (2011b) "Constraints, opportunities and hope: artisanal gold mining and trade in South Kivu (DRC)", in: Ansoms, A. and Marysse, S. (eds.) *Natural resources and local livelihoods in the Great Lakes region of Africa. A political economy perspective*, London, Palgrave Macmillan, 192-214.

Geenen, S. (2011c) "Relations and regulations in local gold trade networks in South-Kivu, Democratic Republic of Congo", *Journal of Eastern African studies*, 5 (3): 427-446.

Geenen, S., Kamundala Byemba, G. and Iragi Mukotanyi, F. (2011) "Le pari qui paralysait. La suspension des activités minières artisanales au Sud-Kivu", in: Marysse, S., Reyntjens, F. and Vandeginste, S. (eds.) *L'Afrique des Grands Lacs. Annuaire 2010-2011,* L'Harmattan, Paris, 161-183.

Geenen, S. (2012) "A dangerous bet. The challenges of formalizing artisanal mining in the Democratic Republic of Congo", *Resources Policy*, 37 (3): 322-330.

Geenen, S. and Claessens, K. (2012) "De l'autre côté de la colline. Le contrôle contesté de Mukungwe, Sud-Kivu, in: Reyntjens, F., Vandeginste, S. and Verpoorten, M. (eds.) *L'Afrique des Grands Lacs. Annuaire 2011-2012*, Paris, L'Harmattan, 181-203.

Geenen, S. and Claessens K. (2013) "Disputed access to the gold mines in Luhwindja, Eastern DRCongo", *The Journal of Modern African Studies*, 51 (1): 85-108.

Geenen, S. (2013) "Who seeks, finds': how artisanal miners and traders benefit from gold in the Eastern Democratic Republic of Congo", *European Journal of Development Research*, 25 (2): 197-212.

Geenen, S., Fahey, D. and Iragi Mukotanyi, F. (2013) "The future of artisanal gold mining and miners under an increasing industrial presence in South Kivu and Ituri, Eastern Democratic Republic of Congo", IOB *Discussion Paper 2013.03*, Institute of Development Policy and Management, University of Antwerp.

Geenen, S. and Iragi Mukotanyi, F. (2013) "'Les grands poissons mangent les petits' : multiples aspects d'un conflit autour d'une concession minière au Sud-Kivu", *Politique Africaine*, 131 (3) : 121-141.

Geenen, S. and Hönke, J. (forthcoming) "Land grabbing by mining companies, local contentions and state reconfiguration in South-Kivu, DRC", in: Ansoms, A. and Hilhorst, T. (eds.) *Land grabbing in the Great Lakes Region of Africa*, Oxford, James Currey.

Geenen, S. (2014 forthcoming) "Dispossession, displacement and resistance: artisanal miners in a gold concession in South Kivu, Democratic Republic of Congo", *Resources Policy* (available online 15/05/2013).

Geenen, S. and Radley, B. (2014 forthcoming) "In the face of reform: : what future for ASM in the eastern DRC?", *Futures* (available online 13/12/2013).

Geertz, C. (1978) "The bazaar economy: information and search in peasant marketing", *The American Economic Review*, 68 (2): 28-32.

Gereffi, G.; Humphrey, J. and Sturgeon, T. (2005) "The governance of global value chains", *Review of International Political Economy*, 12 (1): 78-104.

Gewald, H. (2010) "Gold as a geological item", in: Panella, C. (ed.) (2010) *Worlds of debts. Interdisciplinary perspectives on gold mining in West-Africa*, Amsterdam, Rozenberg Publishers.

Gier, J.J. and Mercier, L. (eds.) (2006), *Mining women. Gender in the development of a global industry, 1670–2005*, London, Palgrave MacMillan.

Gilbert, A. (2002) "On the mystery of capital and the myths of Hernando de Soto. What difference does legal title make?" *International Development Planning Review*, 24 (1): 1-19.

Glaser, B. and Strauss, A. (1967) *The discovery of grounded theory: strategies for qualitative research,* Chicago, Aldine-Atherton.

Global Witness (2004) "Same old story. A background on natural resources in the Democratic Republic of Congo", Global Witness, London.

Global Witness (2005) "Under-mining peace: tin. The explosive trade in cassiterite in Eastern DRC", Global Witness, London.

Global Witness (2007) "The Congolese mining sector in the balance. Lack of transparency risks undermining review of mining contracts", Global Witness, London.

Global Witness (2009a) "Natural resource exploitation and human rights in the DRC 1993 to 2003", Global Witness, London.

Global Witness (2009b) "Faced with a gun, what can you do? War and the militarization of mining in Eastern Congo", Global Witness, London.

Global Witness (2010a) "Recommendations on due diligence for buyers and companies trading in minerals from eastern DRC and for their home governments", Global Witness, London.

Global Witness (2010b) "Do no harm. Excluding conflict minerals from the supply chain", Global Witness, London.

Global Witness (2010c) "Lessons unlearned. How the UN and member states must do more to end resource-fuelled conflict", Global Witness, London.

Global Witness (2011a) "Congo's minerals trade in the balance. Opportunities and obstacles to demilitarization", Global Witness, London.

Global Witness (2011b) "The Dodd Frank Act's section 1502 on conflict minerals", Global Witness, London.

Global Witness (2014) "City of Gold. Why Dubai's first conflict gold audit never saw the light of day", Global Witness, London.

Gobo, G. (2008) *Doing ethnography*, London, Sage Publications.

Godoy, R. (1985) "Mining: anthropological perspectives", *Annual Review of Anthropology*, 14: 199-217.

Goodfellow, T. and Lindemann, S. (2013) "The clash of institutions: traditional authority, conflict and the failure of 'hybridity' in Buganda", *Commonwealth and Comparative Politics*, 51 (1): 3-26.

Gordon, T. and Webber J.R. (2008) "Imperialism and resistance: Canadian mining companies in Latin America", *Third World Quarterly*, 29 (1): 63-87.

Gould, D. J. (1979) "The administration of underdevelopment", in: Gran, G. (ed.) *Zaïre. The political economy of underdevelopment,* New York, Praeger Publishers, 87-107.

Gran, G. (1979) "An introduction to Zaire's permanent development crisis", in: Gran, G. (ed.) *Zaïre. The political economy of underdevelopment*, New York, Praeger Publishers, 1-25.

Granovetter, M. (1973) "The strength of weak ties", American Journal of Sociology, 78 (6): 1360-1380.

Granovetter, M. (1983) "The strength of weak ties: a network theory revisited", *Sociological Theory*, 1: 201-233.

Granovetter, M. (1985) "Economic action and social structure: the problem of embeddedness", *American Journal of Sociology*, 91: 481-510.

Granovetter, M. (1993) "The nature of economic relationships", in: Swedberg, R. (ed.) *Explorations in Economic Sociology*, New York, Russell Sage Foundation, 3-41.

Grätz, T. (2002) "Gold mining communities in Northern Benin as semi-autonomous social fields", *Max Planck Institute for Social Anthropology Working Paper 36*, Max Planck Institute, Leipzig.

Grätz, T. (2004) "Gold trading networks and the creation of trust: a case-study from Northern Benin", *Africa*, 74 (2): 146-72.

Grätz, T. (2009) "Moralities, risk and rules in West African artisanal gold mining communities: a case study of northern Benin", *Resources Policy*, 34: 12-17.

Greif, A. (2006) *Institutions and the path to the modern economy*, Cambridge, Cambridge University Press.

Griffiths, J. (1986) "What is legal pluralism?", *Journal of Legal Pluralism and Unofficial Law*, 24: 1-55.

Guthman, J. (2007) "The Polanyian way? Voluntary food labels as neoliberal governance", *Antipode*, 39 (3): 456-478.

Hall, D., Hirsch, P. and Li, T. (2011) *Powers of exclusion. Land dilemmas in Southeast Asia*, Honolulu, University of Hawai Press.

Hammersley, M. and Atkinson, P. (1995) *Ethnography. Principles in practice*, London, Routledge.

Hansen-Tranberg, K., and Vaa, M. (eds.) (2004) *Reconsidering informality: perspectives from urban Africa*, Uppsala, Nordiska Afrikainstitutet.

Harding, P. and Jenkins, R. (1989) *The myth of the hidden economy: towards a new understanding of informal economic activity*, Milton Keynes and Philadelphia, Open University Press.

Harriss-White, B. (2010) "Real markets as social and political institutions and their implications for human development", *South Asia Work in Progress Research Papers*, University of Oxford, Oxford.

Hart, K. (1973) "Informal income opportunities and urban employment in Ghana", *The Journal of Modern African Studies*, 11 (1): 61-89.

Hart, K. (1988) "Kinship, contract, and trust: the economic organization of migrants in an African city slum", in: Gambetta, D. (ed.) *Trust. Making and breaking cooperative relations*, New York and Oxford, Blackwell, 176-193.

Hart, K. (1995) "L'entreprise africaine et l'économie informelle: réflexions autobiographiques", in: Ellis, S. And Fauré, Y. (eds.) *Entreprises et entrepreneurs africains*, Paris, Karthala.

Hart, G. (1998) "Multiple trajectories: a critique of industrial restructuring and the new institutionalism", *Antipode*, 30 (4): 333-56.

Hart, G. (2002) *Disabling globalization: places of power in post-apartheid South Africa*, California, University of California Press.

Hart, G. (2006) "Denaturalizing dispossession: critical ethnography in the age of resurgent imperialism", *Antipode* 38 (5): 977-1004.

Harvey, D. (2005) The New Imperialism, Oxford, Blackwell.

Hayes, K. and Perks, R. (2012) "Women in the artisanal and small-scale mining sector of the Democratic Republic of the Congo", in: Lujala, P. and Rustad, S.A. (eds) *High-value natural resources and peacebuilding*, London, Earthscan.

Heemskerk, M. (2003) "Risk attitudes and mitigation among gold miners and others in the Suriname rainforest", *Natural Resources Forum*, 27: 267-278.

Heemskerk, M. (2003) "Self-employment and poverty alleviation: women's work in artisanal gold mines," *Human Organization*, 63 (1): 62–73.

Helander, B. (2005) "Who needs a state? Civilians, security and social services in North-East Somalia", in: Richards, P. (ed.) *No peace, no war: an anthropology of contemporary armed conflicts*, Oxford, James Currey, 193–202.

Hentschel, T., Hruschka, F. and Priester, M. (2003) "Artisanal and small-scale mining. Challenges and opportunities", International Institute for Environment and Development (IIED), London.

Herderschee, J., Mukoko Samba, D. and Tshimenga Tshibangu, M. (eds.) (2012) *Résilience d'un géant africain: accélerer la croissance et promouvoir l'emploi en République Démocratique du Congo, Etudes sectorielles,* Kinshasa, Mediaspaul and World Bank, 99-183.

Heynen, N. and Robbins, P. (2005) "The neoliberalization of nature: governance, privatization, enclosure and valuation", *Capitalism, Nature, Socialism,* 16 (1): 5-8.

Hibou, B. (1997) "The 'social capital' of the state as an agent of deception, or the ruses of economic intelligence" in: Bayart, J., Ellis, S. and Hibou, B. (eds.) *The criminalization of the state in Africa,* Oxford, James Currey and Indiana University Press.

Hibou, B. (1999) "De la privatisation des économies à la privatisation des États. Une analyse de la formation continue de l'État", in : Hibou, B. (ed.) *La Privatisation des États*, Paris, Karthala, 12-67.

High, M. (2008) "Wealth and envy in the Mongolian gold mines", *Cambridge Anthropology*, 27 (3): 1-19.

Hilson, G. (2002a) "An overview of land use conflicts in mining communities", *Land Use Policy*, 19:65-73.

Hilson, G. (2002b) "Land use competition between small- and large-scale miners: a case-study of Ghana", *Land Use Policy*, 19 (2): 149-56.

Hilson, G. (2002c) "The future of small-scale mining: environmental and socioeconomic perspectives", *Futures*, 34: 863-872.

Hilson, G. (2009) "Small-scale mining, poverty and economic development in Sub-Saharan Africa: an overview", *Resources Policy*, 34: 1-5.

Hilson, G. (2010a) "Once a miner, always a miner': poverty and livelihood diversification in Akwatia, Ghana", *Journal of Rural Studies*, 26: 296-307.

Hilson, G. (2010b) "Child labour in African artisanal mining communities: experiences from Northern Ghana", *Development and Change*, 41 (3): 445-473.

Hilson, G. (2011) "Artisanal mining, smallholder farming and livelihood diversification in rural Sub-Saharan Africa: an introduction", *Journal of International Development*, 23: 1031-1041.

Hilson, G. (2012) "Corporate Social Responsibility in the extractive industries: experiences from developing countries", *Resources Policy*, 27: 131-137.

Hilson, G. and Potter, C. (2003) "Why is illegal gold mining activity so ubiquitous in rural Ghana?", *African Development Review*, 15 (2-3): 237-270.

Hilson, G. and Potter, C. (2005) "Structural adjustment and subsistence industry: artisanal gold mining in Ghana", *Development and Change*, 36 (1): 103-131.

Hilson, G. and Yakovleva, N. (2007) "Strained relations: a critical analysis of the mining conflict in Prestea, Ghana", *Political Geography*, 26: 98-119.

Hinton, J.J., Veiga, M.M., and Veiga, A.T.C. (2003) "Clean artisanal gold mining: a utopian approach?", *Journal of Cleaner Production*, 11(2): 100–115.

Hinton, J.J., Veiga, M.M. and Beinhoff, C. (2004) "Women and artisanal mining: gender roles and the road ahead", in: Hilson, G. (ed.)*The socio-economic Impacts of artisanal and small-scale mining in developing countries*, London, Taylor and Francis, 161-203.

Hochschild, A. (2010) "Blood and treasure. Why one of the world's richest countries is also one of the poorest", *Mother Jones*, March/April 2010, 53-65.

Hönke, J. (2010) "New political topographies. Mining companies and indirect discharge in Southern Katanga (DRC)", *Politique Africaine*, 120: 105-27.

Hönke, J. (2013) *Transnational companies and security governance. Securing business spaces*, London, Routledge.

Human Rights Watch (2005) "The curse of gold. Democratic Republic of Congo", Human Rights Watch, New York.

Humphrey, J. and H. Schmitz (1996) "Trust and economic development", *IDS Discussion Paper* 355, Institute of Development Studies, Brighton.

Hyden, G. (1983) *No shortcuts to progress: African development management in perspective,* Berkeley and Los Angeles, University of California Press.

IKV/Pax Christi (2011) "International mining corporations and socio-political conflict in the DRC. A case-study of the Nia-Nia area, Ituri District, Province Orientale", IKV/ Pax Christi, Utrecht.

Ingelaere, B. (2012) "Peasants, power and the past. The gacaca courts and Rwanda's transition from below", PhD Dissertation submitted in fulfilment of the requirements for the degree of Doctor in Development Studies at the University of Antwerp.

ICGLR (2006) "Regional initiative against illegal exploitation of natural resources", International Conference on the Great Lakes Region, Bujumbura.

Institute for Environmental Security (2008) "Mining, forest change and conflict in the Kivus, eastern Democratic Republic of Congo", IES-ESPA Programme, The Hague.

International Alert (2009) "Etude sur le rôle de l'exploitation des ressources naturelles dans l'alimentation et la perpétuation des crises de l'Est de la RDC", International Alert, London.

IIED (2002) "Breaking new ground. The report of the mining, minerals and sustainable development project", International Institute for Environment and Development, http://www.iied.org/mmsd-final-report (last consulted 29/08/2012).

ILO (1999) "Social and labour issues in small scale mines: Report for discussion at the tripartite meeting on social and labour issues in small-scale mines", International Labour Office, Geneva.

ITRI (2009) "ITRI Tin Supply Chain Initiative (iTSCI). A phased and constructive approach towards improved due diligence, governance and traceability", International Tin Research Institute.

IPIS (2012) "The formalization of artisanal mining in the Democratic Republic of the Congo and Rwanda", Center for International Forestry Research (CIFOR), Indonesia.

Iragi, F. (2012) "Artisanal and small-scale gold mining in South Kivu: a threatened livelihood?", Master Dissertation Institute of Development Policy and Management (IOB), University of Antwerp.

IRIN (2009) "DRC: Rape cases soar in South-Kivu", 03/06/2009, http://www.irinnews.org/Report.aspx?ReportId=84685 (last consulted 10/11/2012).

Itriago, D., Machin, A. and Kreisler, I. (2009) "Lifting the resource curse. How poor people can and should benefit from the revenues of extractive industries", *Oxfam Briefing Paper* 134.

Jackson, S. (2002) "Making a killing: criminality and coping in the Kivu war economy", *Review* of African Political Economy, 29 (93/94): 517-36.

Jackson, S. (2003) "Fortunes of war: the coltan trade in the Kivus", *HPG Background Paper* Overseas Development Institute (ODI), London.

Jansson, J. (2011) "The Sicomines agreement: change and continuity in the Democratic Republic of Congo's international relations", *Occasional Paper 97*, South African Institute for International Affairs, Johannesburg.

Johnson, D. (2010) "Who's in charge? Putting the mineral trade in Eastern DRC under international control: an overview", Pole Institute, Goma.

Johnson, D. (2013) "No Kivu, no conflict? The misguided struggle against conflict minerals in the DRC", Pole Institute, Goma.

Johnson, D. and Tegera, A. (2005) "Digging deeper. How the DRCongo's mining policy is failing the country", Pole Institute, Goma.

Johnson, S. (2013) "From microfinance to inclusive financial markets: the challenge of social regulation", *Oxford Development Studies* 41 (1): 1-18.

Jønsson, J.B. and Fold, N. (2009) "Handling uncertainty: policy and organizational practices in Tanzania's small-scale gold mining sector", *Natural Resources Forum*, 33: 211-220.

Jønsson, J. B. and Bryceson, D.F. (2009) "Rushing for gold: mobility and small-scale mining in East Africa", *Development and Change*, 40 (2): 249-279.

Jourdan, L. (2013) "From humanitarian to anthropologist: writing at the margins of ethnographic research in Democratic Republic of Congo", in: Thomson, S., Ansoms, A. and Murison, J. (eds.) *Emotional and ethical challenges for field research in Africa*, London, Palgrave MacMillan, 12-26.

Joyce, E. (2011) "MP exposes \$5.5 billion loss to Congolese people through questionable mining deals with BVI 'shell' companies", Press release, 18/11/2011.

Kabuya Kalala, F. and Tshiunza Mbiye, O. (2009) "Ressources naturelles, gouvernance et défis d'une croissance soutenue en RDC", in : Marysse, S. and Reyntjens, F. (eds.) *L'Afrique des Grands Lacs. Annuaire 2008-2009*, Paris, L'Harmattan, 141-159.

Kamundala Byemba, G. (2012) "La contribution de l'exploitation minière à l'économie locale. Cas de l'exploitation artisanale de l'or à Misisi, territoire de Fizi", Travail présenté et défendu en vue de l'obtention du diplôme de licencié en sciences économiques, Université Catholique de Bukavu.

Kamundala Byemba, G. (2013a) "Exploitation minière artisanale et industrielle au Sud-Kivu : possibilités d'une cohabitation pacifique ?", International Peace Information Service (IPIS), Antwerp.

Kamundala Byemba, G. (2013b) "Exploitation minière industrielle et artisanale au Sud-Kivu", in : Marysse, S. and Omasombo, J. (eds) *Conjonctures Congolaises 2012. Politique, secteur minier et gestion des ressources naturelles en RDCongo,* Cahiers Africains, Tervuren, Musée Royal de l'Afrique Centrale, 63-86.

Kaplinsky, R. and Morris, M. (2002) *A handbook for value chain research,* Institute of Development Studies, Brighton.

Katwala, G. J. (1979) "Export-led growth: the copper sector", in: Gran, G. (ed.) Zaïre. The political economy of underdevelopment, New York, Praeger Publishers, 122-136.

Keen, D. (1998) "The economic functions of violence in civil wars", Oxford University Press for the Institute of Strategic Studies, London.

Kelle, U. (2007) "The development of categories: different approaches in grounded theory", in: Bryant, A. and Charmaz, K. (eds) *The Sage Handbook of grounded theory*, London, Sage Publications.

Kennes, E. (2002) "Footnotes to the mining story", *Review of African Political Economy*, 29 (93): 601-606.

Kennes, E. (2005) "The mining sector in Congo: the victim or the orphan of globalization?", in: Marysse, S. and Reyntjens, F. (eds.) *The political economy of the Great Lakes Region in Africa. The pitfalls of enforced democracy and globalization,* London, Palgrave Macmillan, 152-189.

Kilosho Buraye, J., Kamundala Byemba, G. and Ndungu Mukasa, A. (2013) "Traçabilité des produits miniers dans les zones de conflit au Sud-Kivu", in : Marysse, S. and Omasombo, J. (eds) *Conjonctures Congolaises 2012. Politique, secteur minier et gestion des ressources naturelles en RDCongo,* Cahiers Africains, Tervuren, Musée Royal de l'Afrique Centrale, 115-142.

Kitula, A.G.N. (2006) "The environmental and socio-economic impacts of mining on local livelihoods in Tanzania: a case study of Geita district", *Journal of Cleaner Production*, 14 (3–4): 405–414.

Kivu Kwetu (2010) "Kabila decides to ban mineral trade. Why?" 26/09/2010, http://kivukwetu.blogspot.com/2010/09/kabila-decides-to-ban-mineral-trade-why.html (last consulted 10/05/2011).

Kranton, R. (1996) "Reciprocal exchange: a self-sustaining system", *The American Economic Review*, 86 (4): 830-51.

Kuediasala F. (2006) "Le feuilleton gouvernement-Banro Corporation dans l'exploitation de l'or de l'ex-Kivu", *Le Potentiel*, 22/03/2006.

Labonne, B. (1996) "Artisanal mining: an economic stepping stone for women", *Natural Resoures Forum*, 20 (2): 117–122.

Labonne, B. (2002) "Harnessing mining for poverty reduction, especially in Africa", *Natural Resources Forum*, 26: 69-73.

Lahiri-Dutt, K. (2004) "Informality in mineral resource management in Asia: raising questions relating to community economies and sustainable development", *Natural Resources Forum*, 28: 123-132.

La Croix, S.J. (1992) "Property rights and institutional change during Australia's gold rush", *Explorations in Economic History*, 29: 204-227.

Laudati, A. (2011) "Unearthing the 'resource curse': economies of violence beyond minerals in eastern DRC", Department of Environment and Society Working paper, Utah State University.

Le Billon, P. (2001) "The political ecology of war: natural resources and armed conflicts", *Political Geography*, 20 (5): 561-84.

Le Phare (2009) "Parlementaires invalidés. La RDC se confesse", 04/02/2009, http://fr.allafrica.com/stories/200902040774.html (last consulted 14/03/2012).

Le Potentiel (2010) "La mémoire sélective de Banro", 21/06/2010, http://www.lepotentiel.com/afficher_article.php?id_edition=&id_article=97435 (last consulted 10/09/2010).

Le Potentiel (2012) "Dédollarisation de l'économie congolaise. Mukoko en mission de clarification à la FEC", 23/12/2012, http://fr.allafrica.com/stories/201209241194.html (last consulted 08/07/2013).

Libecap, G.D. (1986) "Property rights in economic history: implications for research", *Explorations in Economic History*, 23: 227-252.

Libecap, G.D. (2007) "The assignment of property rights on the western frontier: lessons for contemporary environmental and resource policy", *Journal of Economic History*, 67 (2): 257-291.

Long, N. (2001) Development sociology: actor perspectives, London, Routledge.

Luhmann, N. (1988) "Familiarity, confidence, trust", in: Gambetta, D. (ed.) *Trust. Making and breaking cooperative relations*, Oxford, Blackwell.

Lund, C. (2006) "Twilight institutions: public authority and local politics in Africa", *Development and Change*, 37 (4): 685-705.

Lund, C. (2008) *Local politics and the dynamics of property in Africa,* Cambridge, Cambridge University Press.

Luning, S. (2008) "Liberalisation of the gold mining sector in Burkina Faso", *Review of African Political Economy*, 35 (117): 387-401.

Luning, S. (2010) "Beyond the pale of property: gold miners meddling with mountains in Burkina Faso", in: Panella, C. (ed.) *Worlds of debts. Interdisciplinary perspectives on gold mining in West-Africa*, Amsterdam, Rozenberg Publishers.

Luning, S. (2012) "Corporate social responsibility (CSR) for exploration: consultants, companies, and communities in processes of engagements", *Resources Policy*, 37 (2): 205-211.

Lutete, M. (2010) "Suspension de l'exploitation minière au Nord-Kivu, au Sud-Kivu et au Maniema", *Le Potentiel*, 17/09/2010,

http://www.lepotentiel.com//////afficher_article_archive.php?id_article=100960&id_editio n=5086&yearID=2010&monthID=09&dayID=17 (last consulted 18/05/2011).

Lyon, F. and Porter, G. (2007) "Market institutions, trust and norms: exploring moral economies in Nigerian food systems", *Cambridge Journal of Economics*, 33: 903-920.

MacGaffey, J. (1986) "Fending-for-yourself: the organization of the second economy in Zaire", in: Nzongola-Ntalaja (ed.) *The crisis in Zaire: myths and realities*, New Jersey, Africa World Press, 141-156.

MacGaffey, J. (1987) *Entrepreneurs and parasites. The struggle for indigenous capitalism in Zaire*, Cambridge, Cambridge University Press.

MacGaffey, J. (ed.) (1991) *The real economy of Zaïre. The contribution of smuggling and unofficial activities to national wealth*, Oxford, James Currey.

MacGaffey, J. (1992) "Initiatives from below: Zaïre's other path to social and economic restructuring", in: Hyden, G. and Bratton, M. (eds.) *Governance and politics in Africa*, Boulder CO, Lynne Rienner.

MacGaffey, J. and Bazenguissa-Ganga, R. (2000) *Congo-Paris. Transnational traders on the margins of the law*, African Issues, Oxford, James Currey.

Maconachie, R. and Binns, T. (2007) "Farming miners' or 'mining farmers': diamond mining and rural development in post-conflict Sierra Leone", *Journal of Rural Studies*, 23: 367-380.

Maconachie, R. and Hilson, G. (2011) "Safeguarding livelihoods or exacerbating poverty? Artisanal mining and formalization in West Africa", *Natural Resources Forum*, 35: 293-303.

Malone, D.M. and Nitzschke, H. (2005) "Economic agendas in civil wars. What we know, what we need to know", UNU Wider Discussion Paper 2005/07, United Nations University World Institute for Development Economic Research, Helsinki.

Manhart, A. and Schleiper, T. (2013) "Conflict minerals. An evaluation of the Dodd-Frank Act and other resource-related measures", Öko-Institut, Freiburg.

Mantz, J. (2008) "Improvisational economies: coltan production in the eastern Congo", *Social Anthropology*, 16 (1): 34-50.

Marivoet, W. (2013) "The Congo puzzle. Evolving livelihoods and poverty in the Democratic Republic of Congo (1970-2010)", Proefschrift voorgedragen tot het behalen van de graad van doctor in de Toegepaste Economische Wetenschappen, Universiteit Antwerpen.

Marx, K. (1859) A contribution to the critique of political economy, Moscow, Progress Publishers, http://www.marxists.org/archive/marx/works/1859/critique-pol-economy/ (last consulted 20/03/2014).

Marysse, S. and André, C. (2001) "Guerre et pillage économique en République Démocratique du Congo", in : Marysse, S. and Reyntjens, F. (eds.) *L'Afrique des Grands Lacs. Annuaire 2000-2001,* Paris, L'Harmattan, 307-332.

Marysse, S. (2005) "Regress, war and fragile recovery: the case of the DRCongo", in: Marysse, S. and Reyntjens, F. (eds.) *The political economy of the Great Lakes Region in Africa. The pitfalls of enforced democracy and globalization*, London, Palgrave Macmillan, 125-151.

Marysse, S. and Geenen, S. (2009) "Win-win or unequal exchange. The case of the Sino-Congolese cooperation agreements", *The Journal of Modern African Studies*, 47 (3): 371-396.

Marysse, S. and Tshimanga, C. (2013) "La renaissance spectaculaire du secteur minier en RDC: où va la rente minière ?", in: Marysse, S. and Omasombo, J. (eds) *Conjonctures Congolaises 2012. Politique, secteur minier et gestion des ressources naturelles en RDCongo,* Cahiers Africains, Tervuren, Musée Royal de l'Afrique Centrale, 11-46.

Masson, P. (1966) Trois siècles chez las Bashi, Bukavu, Imprimerie Kivu-Presses.

Mazalto, M. (2005) "La réforme des législations minières en Afrique et le rôle des institutions financières internationales : la République Démocratique du Congo", in: Marysse, S. and Reyntjens, F. (eds.) *L'Afrique des Grands Lacs. Annuaire 2004-2005,* Paris, L'Harmattan, 263-287.

Mazalto, M. (2009) "Governance, human rights and mining in the Democratic Republic of Congo", in: Campbell, B. (ed.) *Mining in Africa. Regulation and development*, London and New York, Pluto Press, 187-242.

McDowell, A. (2002) "From commons to claims; property rights in the California gold rush", *Yale Journal of Law and Humanities*, 14: 1-74.

Meagher, K. (2005) "Social capital or analytical liability? Social networks and African informal economies", *Global Networks*, 5 (3): 217-238.

Meagher, K. (2010) *Identity economics. Social networks and the informal economy in Nigeria,* African Issues, Oxford, James Currey.

Meagher, K. (2012) "The strength of weak states? Non-state security forces and hybrid governance in Africa", *Development and Change*, 43 (5): 1073-1101.

Meinzen-Dick, R.S. and Pradhan, R. (2002) "Legal pluralism and dynamic property rights", International Food Policy Research Institute (IFPRI), Washington.

Meinzen-Dick, R. and Mwangi, E. (2008) "Cutting the web of interests: pitfalls in formalizing property rights", *Land Use Policy*, 26: 36-43.

Menkhaus, K. (2007) "Governance without government in Somalia. Spoilers, state building and the politics of coping", *International Security*, 31 (3): 74–106

Mercier, B. (2009) "RDCongo. Ressources naturelles et violence. Les cas des FDLR", Groupe de recherche et d'information sur la paix et la sécurité (GRIP), Bruxelles.

Merlet, P. and Bastiaensen, J. (2012) "Struggles over property rights in the context of large scale transnational land acquisitions. Using legal pluralism to re-politicize the debate", *IOB Discussion Paper* 2012.2., Institute of Development Policy and Management, University of Antwerp.

Metals Economic Group (2011) "World exploration trends. A special report from Metals Economic Group for the PDAC International Convention", Halifax, Canada.

Midende, G. (2010) "Les exploitations artisanales au Burundi", in : Vandeginste, S., Reyntjens, F. and Marysse, S. (eds.) *L'Afrique des Grands Lacs. Annuaire 2009-2010*, Paris, L'Harmattan, 45-66.

Mineweb (2007) "Banro: punching well above its weight for a gold explorer", http://www.mineweb.com/mineweb/view/mineweb/en/page34?oid=39910&sn=Detail (last consulted 13/03/2011).

Mitchell, H. and Garrett, N. (2009) "Beyond conflict. Reconfiguring approaches to the trade in minerals from eastern DRC", Resource Consulting Service, London.

Molm, L., Takashi, N. and Peterson, G. (2000) "Risk and trust in social exchange: an experimental test of a classical proposition", *The American journal of Sociology*, 105 (5): 1396-1427.

Moore, S.F. (1978) "Law and social change: the semi-autonomous social field as an appropriate subject of study", in: Moore, S.F. *Law as process*, London, Routledge, 54-81.

Morgan, D.L. (1996) "Focus groups", Annual Review of Sociology, 22: 129-152.

Morgan, D.L. (2013) *Integrating qualitative and quantitative methods: a pragmatic approach*, London, Sage Publications.

Mugangu Matabaro, S. (2008) "La crise foncière à l'Est de la RDC", in : Marysse, S. ; Reyntjens, F. and Vandeginste, S. (eds.) *L'Afrique des Grands Lacs. Annuaire 2007–2008,* Paris, L'Harmattan, 385-414.

Mulumba , P. (2011) "L'Asadho préoccupée par la levée de la suspension des activités minières à l'Est", *Le Potentiel*, 11/03/2011,

http://www.lepotentiel.com//afficher_article_archive.php?id_article=107641&id_edition=706 6&yearID=2011&monthID=03&dayID=11 (last consulted 18/05/2011).

Musimwa Bisharhwa, B. (1982) "Luhwindja, une chefferie agitée (1903-1969)", *Mémoire présentée pour l'obtention du diplôme de licence en pédagogie appliquée, option histoire,* Institut Supérieur Pédagogique, Bukavu.

Mwaipopo, R. (2014) "Ubeshi: negotiating co-existence. Artisanal and large-scale relations in diamond mining", in: Bryceson, D.F.; Fisher, E.; Jønsson, J.B. and Mwaipopo, R. (eds.) *Mining and social transformation in Africa. Mineralizing and democratizing trends in artisanal production*, London, Routledge, 130-147.

Naeher, U. (2010) "Appui au développement et mise en place d'un système de certification des substances minérales", Projet Bundesanstalt für Geowissenschaften und Rohstoffe (BGR) et Ministère des Mines, Bukavu.

Namegabe, P.R. (2005) "Le pouvoir traditionnel au Sud-Kivu de 1998-2003 : rôles et perspectives", in: Marysse, S.; Reyntjens, F. and Vandeginste, S. (eds.) *L'Afrique des Grands Lacs. Annuaire 2004–2005,* Paris, L'Harmattan, 209-234.

Namegabe, P.R. and Murhula, P. (2014) "Concessions minières et droits fonciers et miniers des communautés locales : cas de Banro à Twangiza", in: Marysse, S. and Omasombo, J. (eds) *Conjonctures Congolaises 2013. Percée sécuritaire, flottements politiques et essor économique,* Cahiers Africains, Tervuren, Musée Royal de l'Afrique Centrale,.

Ndaywel è Nziem, I. (1998) *Histoire générale du Congo. De l'héritage ancien à la République Démocratique*, Paris et Bruxelles, De Boeck et Larcier.

Nest, M.; Grignon, F. and Kisangani Emizet, F. (2006) *The Democratic Republic of Congo:* economic dimensions of war and peace, Boulder CO, Lynne Rienner.

Nest, M. (2011) Coltan, Cambridge and Malden, Polity Press.

NiZA (2006) "The state vs. the people. Mining and the transitional regime in the Democratic Republic of Congo", Netherlands Institute for Southern Africa (NiZA), Amsterdam.

Newbury, D. and Newbury, C. (1982) "King and chief: colonial politics on Ijwi Island (Zaire)", *The International Journal of African Historical Studies*, 15 (2): 221-246.

Newbury, C. (1986) "Survival strategies in rural Zaire: realities of coping with crisis", in: Nzongola-Ntalaja (ed.) *The crisis in Zaire: myths and realities*, New Jersey, Africa World Press, 99-112.

Newbury, D. (1986) "From 'frontier' to 'boundary': some historical roots of peasant strategies of survival in Zaire", in: Nzongola-Ntalaja (ed.) *The crisis in Zaire: myths and realities*, New Jersey, Africa World Press, 87-97.

Newbury, D. (1991) *Kings and clans. Ijwi Island and the Lake Kivu Rift 1780-1840,* Wisconsin, The University of Wisconsin Press.

Newbury, D. (2009) *The land beyond the mists. Essays on identity and authority in precolonial Congo and Rwanda*, Ohio, Ohio University Press.

Nkurunziza, J.D. (2002) "Exchange rate policy and the parallel market for foreign currency in Burundi", *African Economic Research Consoritum (AERC) research paper*, Nairobi.

Nkurunziza, J.D. and Ngaruko, F. (2002) "Explaining growth in Burundi: 1960-2000", *The Centre for the Study of African Economies (CSAE) Working Paper Series*, Oxford, Oxfords University.

Noetstaller, R. (1987) "Small-scale mining: a review of the issues", World Bank, Washington DC.

North, D. (1990) *Institutions, institutional change and economic performance*, Cambridge, Cambridge University Press.

Nussbaum, M. (2003) "Capabilities as fundamental entitlements: Sen and social justice", *Feminist Economics*, 9: 33–59.

Nyame, F. and Blocher, J. (2010) "Influence of land tenure practices on artisanal mining activity in Ghana", *Resources Policy*, 35: 47-53.

Nyame, F.K.; Grant, J.A. and Yakovleva, N. (2009) "Perspectives on migration patterns in Ghana's mining industry", *Resources Policy*, 34: 6-11.

OGP (2008) "Potentialités des entités administratives décentralisées : collectivité chefferie de Luhwinja", Observatoire Gouvernance et Paix (OGP), Bukavu.

OGP (2012) "Rapport de l'atelier d'harmonisation des points de vue des parties en conflit pour une paix durable à Mukungwe, Mushinga, 13-14/07/2012", Observatoire Gouvernance et Paix (OGP), Bukavu.

OECD (2011a), "OECD guidelines for multinational enterprises", Organisation for Economic Cooperation and Development, Paris, http://dx.doi.org/10.1787/9789264115415-en (last consulted 30/08/2012).

OECD (2011b), "OECD due diligence guidance for responsible supply chains of minerals from conflict-affected and high-risk areas", Organisation for Economic Cooperation and Development, Paris, http://dx.doi.org/10.1787/9789264111110-en (last consulted 30/08/2012).

OECD (2012) "Due diligence guidance for responsible supply chain of minerals from conflictaffected and high-risk areas. Supplement on gold", Organisation for Economic Cooperation and Development, Paris,

http://www.oecd.org/daf/inv/corporateresponsibility/goldsupplementtotheduediligenceguida nce.htm (last consulted 20/08/2013).

OECD (2013a) "Upstream implementation of the OECD due diligence guidance for responsible supply chains of minerals from conflict-affected and high-risk areas. Final report on one-year pilot implementation of the supplement on tin, tantalum, and tungsten, Organisation for Economic Cooperation and Development, Paris,

http://www.oecd.org/daf/inv/mne/DDguidanceTTTpilotUpstreamJan2013.pdf (last consulted 15/03/2014).

OECD (2013b) "6th Meeting of the ICGLR-OECD-UN GoE Forum on responsible mineral supply chains, 13th-15th November 2013, Kigali, Rwanda. Summary Report", Organisation for Economic Cooperation and Development, Paris, http://www.oecd.org/daf/inv/mne/6th-3TG-Forum-Summary-Report.pdf (last consulted 15/03/2014).

O'Faircheallaigh, C. (1995) "Negotiations between mining companies and aboriginal communities: process and structure", *Centre for Aboriginal Economic Policy Research (CAEPR) Discussion Paper 86*, Australian National University, Canberra.

Olivier de Sardan, J.P. (2005) *Anthropology and development*. *Understanding contemporary social change*, London, Zed Books.

Olivier de Sardan, J.P. (2008) "Researching the practical norms of real governance in Africa", *Africa power and politics Discussion Paper 5*, Overseas Development Institute (ODI), London.

Olivier de Sardan, J.P. (2011) "Les normes pratiques. Une proposition de concept exploratoire à partir d'enquêtes sur les bureaucraties africaines", draft February 2011.

Ostrom, E. (1990) *Governing the commons. The evolution of institutions for collective action,* Cambridge, Cambridge University Press.

Ouchinsky, A. (1966) "Elements de codification des coutumes fonciers du Bushi", in: Masson, P. *Trois siècles chez las Bashi*, Bukavu, Imprimerie Kivu-Presses.

PACT (2007) "Researching natural resources and trade flows in the Great Lakes Region", Pact Congo, Washington and Kinshasa.

PACT (2010) "Promines study. Artisanal mining in the Democratic Republic of Congo", Pact Congo, Washington and Kinshasa.

Panella, C. (2010) "Patrons and petits patrons: knowledge and hierarchy in illicit networks of trade in archaeological objects in the Baniko region of Mali", *Review of African Political Economy*, 37 : 228-37.

Panella, C. (2010) "Orpaillage artisanal et cotoniculture: économie oecuménique et éthique sociale dans le Basidibé (Mali)", in: Panella, C. (ed.) *Worlds of debts. Interdisciplinary perspectives on gold mining in West-Africa*, Amsterdam, Rozenberg Publishers.

Peluso, N.L. and Lund, C. (2011) "New frontiers of land control: introduction", *Journal of Peasant Studies*, 38 (4): 667-681.

Perks, R. and Vlassenroot, K. (2010) "From discourse to practice: a sharper perspective on the relationship between minerals and violence in DR Congo", in: Cuvelier, J. (ed.) *The complexity of resource governance in a context of state fragility: the case of Eastern DRC*, London, International Alert and International Peace Information Service (IPIS), 64-69.

Perks, R. (2011) "Can I go? Exiting the artisanal mining sector in the Democratic Republic of Congo", *Journal of International Development*, 23 (8): 1115-1127.

Peters, P.E. (2004) "Inequality and social conflict over land in Africa", *Journal of Agrarian Change*, 4 (3): 269-314.

Pijpers, R.J. (2010) "Busting diamonds, booming gold: crisis, gender, and money in the Sierra Leone mining sector", in: Panella, C. (ed.) *Worlds of debts. Interdisciplinary perspectives on gold mining in West Africa*, Amsterdam, Rozenberg Publishers, 79-94.

Platteau, J.P. (2000) *Institutions, social norms and economic development*, Harwood, Academic Publishers.

Platteau, J.P. (2004) "Monitoring elite capture in community-driven development", *Development and Change*, 35 (2): 223-246.

Pole Institute (2002) "The coltan phenomenon. How a rare mineral has changed the live of the population of war-torn North Kivu province in the East of DRC", Pole Institute, Goma.

Pole Institute and International Alert (2004) "Natural resource exploitation and human security in the Democratic Republic of Congo. Seminar report", International Alert and Pole Institute, London and Goma.

Pole Institute (2010) "Blood minerals. The criminalization of the mining industry in Eastern DRC", Pole Institute, Goma.

Pourtier, R. (2004) "L'économie minière au Kivu et ses implications régionales", Initiative pour l'Afrique Centrale (INICA), Kigali.

Pöyhönen, P.; Areskog Bjurling, K. and Cuvelier, J. (2010) "Voices from the inside. Local views on mining reform in Eastern DR Congo", Make IT Fair, Swedwatch and Finnwatch, Stockholm and Helsinki.

Prendergast, J. and Lezhnev, S. (2009) "From mine to mobile phone. The conflict minerals supply chain", Enough Project, Washington DC.

Pressman, S. and Summerfield, G. (2002) "Sen and capabilities", *Review of Political Economy*, 14 (4): 429-434.

Prkic, F. (2005) "The Phoenix state: war economy and state formation in Liberia", in: Schlichte, K. (ed.) *The dynamics of states. The formation and crises of state domination,* Hampshire, Ashgate Publishing Limited, 115-136.

Prunier, G. (2009) *Africa's World War. Congo, the Rwandan genocide, and the making of a continental catastrophe,* Oxford, Oxford University Press.

PWC (2011) "Mine 2011. The game has changed. Review of global trends in the mining industry", Price Waterhouse Coopers.

Radio Okapi (2010a) "L'exploitation minière dans l'ancien Kivu suspendue jusqu'à nouvel ordre", 13/09/2010, http://radiookapi.net/economie/2010/09/13/lexploitation-miniere-dans-lancien-kivu-suspendue-jusqu%E2%80%99a-nouvel-ordre/ (last consulted 17/05/2011).

Radio Okapi (2010b) "Kivu, suspension de l'exploitation minière, le ministre des Mines rassure", 21/09/2010, http://radiookapi.net/economie/2010/09/21/kivu-suspension-del%E2%80%99exploitation-miniere-le-ministre-des-mines-rassure/ (last consulted 17/05/2011).

Radley, B. (2013) "The conflict minerals agenda. Looking for peace in the wrong place", *Amani Itakuya* 6, http://christophvogel.net/2013/10/27/amani-itakuya-06-the-conflict-mineralsagenda-looking-for-peace-in-the-wrong-place/#comments (last consulted 12/11/2013).

Raeymaekers, T. (2002) "Network war. An introduction to Congo's privatised war economy", International Peace Information Service (IPIS), Antwerp.

Raeymaekers, T. (2007) "The power of protection. Governance and transborder trade on the Congo-Ugandan frontier", PhD dissertation in Political and Social Sciences, option Political Sciences, Ghent University.

Raeymaekers, T.; Menkhaus, K. and Vlassenroot, K. (2008) "State and non-state regulation in African protracted crises: governance without government?", *Afrika Focus*, 21 (2): 7-21.

Raeymaekers, T. (2010) "Protection for sale? War and the transformation of regulation on the Congo-Ugandan border", *Development and Change*, 41 (4): 563-87.

Raeymaekers, T. (2011) "Brokering networks. African boundaries and the new capitalist frontier", Paper presented at the seminar on practical norms on 25/03/2011, Institute of Development Policy and Management (IOB), University of Antwerp.

Renard, M.C. (2005) "Quality certification, regulation and power in fair trade", *Journal of Rural Studies*, 21: 419-431.

Renauld, A. (2005) "RDC. Ressources naturelles et transfert d'armes", Groupe de recherche et d'information sur la paix et la sécurité (GRIP), Bruxelles.

Reno, W. (2000) "Clandestine economies, violence and states in Africa", *Journal of International Affairs*, 53 (2): 433-59.

Resource Consulting Services (2011) "US Legislation on conflict minerals. RCS private sector guidance on the Dodd-Frank Act section 1502", Resource Consulting Services, London.

Ribot, J.C. (1998) "Theorizing access: forest profits along Senegal's charcoal commodity chain", *Development and Change*, 29: 307-341.

Ribot, J.C. and Peluso, N.L. (2003) "A theory of access", Rural Sociology, 68 (2): 153-181.

Richards, L. (2005) Handling qualitative data: a practical guide, London, Sage Publications.

Richards, P. (1996) *Fighting for the rain forest. War, youth and resources in Sierra Leone*, African Issues, Oxford, James Currey.

Richards, P. (2005) "To fight or to farm? Agrarian dimensions of the Mano river conflicts (Liberia and Sierra Leone)", *African Affairs*, 104: 571-590.

RNW (Radio Netherlands Worldwide) (2011) "A curious case of Congo gold", 16/02/2011, http://www.rnw.nl/international-justice/article/a-curious-case-congo-gold (last consulted 08/07/2013).

Roitman, J. (1990) "The politics of informal markets in Sub-Saharan Africa", *The Journal of Modern African Studies*, 28 (4): 671-96.

Roitman, J. (2004) *Fiscal disobedience: an anthropology of economic regulation in Central Africa*, Princeton, Princeton University Press.

Ross, M. (2003) "The natural resource curse: how wealth can make you poor", in: Bannon, I. and Collier, P. (eds.) *Natural resources and violent conflict. Options and actions*, Washington, World Bank, 17-42.

Rosser, A. (2006) "The political economy of the resource curse: a literature survey", *Institute of Development Studies (IDS) Working Paper* 268, Brighton.

Rubbers, B. (2009) "'We, the Congolese, we cannot trust each other'. Trust, norms and relations among traders in Katanga, Democratic Republic of Congo", *The British Journal of Sociology*, 60 (3): 623-642.

Sachs, J. and Warner, A. (1995) "Natural resource abundance and economic growth", *National Bureau of Economic Research (NBER) Working Paper 5398*, Cambridge.

Sanganyi Nyassa, Y. (2003) "Exploitation artisanale de l'or et son incidence sur le revenu paysan. Cas de la cité minière de Kamituga", Travail présenté en vue de l'obtention du diplôme de licencié en Sciences Economiques, Université Catholique de Bukavu.

Schlager, E. and Ostrom, E. (1992) "Property-rights regimes and natural resources: a conceptual analysis", *Land Economics*, 68 (3): 249-62.

Schouten, P. (2011) "International mining corporations and socio-political conflict in the DRC. A case study of the Nia-Nia area, Ituri District, province Orientale", IKV/Pax Christi, Utrecht.

Scott, J.C. (1976) *The moral economy of the peasant: rebellion and subsistence in Southeast Asia*, New Haven, Yale University Press.

Scott, J.C. (1985) *Weapons of the weak: everyday forms of peasant resistance,* New Haven, Yale University Press.

Scott, J.C. (1995) *Domination and the arts of resistance: hidden transcripts*, New Haven, Yale University Press.

Seay, L. (2010) "In which the law of unintended consequences takes its nasty course", *Texas in Africa*, 05/10/2010, http://texasinafrica.blogspot.com/ 2010_10_01_archive.html, (last consulted 10/10/2010).

Seay, L. (2012) "What's wrong with Dodd-Frank 1502? Conflict minerals, civilian livelihoods, and the unintended consequences of Western advocacy", *Center for Global Development Working Paper 284*, Washington DC.

Seligman, A. (1997) The Problem of Trust, Princeton NJ, Princeton University Press.

Sen, A. (1981) *Poverty and famines: an essay on entitlement and deprivation*, Oxford, Clarendon Press.

Sen, A. (1999) Development as Freedom, New York, Knopf.

Shafiee, S. and Topal, E. (2010) "An overview of global gold market and gold price forecasting", *Resources Policy*, 35: 178-189.

Siegel, S. and Veiga, M.M. (2009) "Artisanal and small-scale mining as an extralegal economy: De Soto and the redefinition of 'formalization'", *Resources Policy*, 34: 51-56.

Sikor, T. and Lund, C. (2009) "Access and property: a question of power and authority", *Development and Change*, 40 (1): 1-22.

Sinding, K. (2005) "The dynamics of artisanal and small-scale mining reform", *Natural Resources Forum*, 29: 243-252.

Smith, J.H. (2011) "Tantalus in the digital age: coltan ore, temporal dispossession, and "movement" in the Eastern Democratic Republic of the Congo", *American Ethnologist* 38 (1): 17-35.

Sosner, E. (1979) "Colonial Peasantization and contemporary underdevelopment: a view from a Kivu village", in: Gran, G. (ed.) *Zaïre. The political economy of underdevelopment,* New York, Praeger Publishers, 189-210.

Southall, R. and Melber, H. (eds.) (2009) A new scramble for Africa?, Durban, KwaZulu Natal Press.

Spiegel, S.J. and Veiga, M.M. (2005) "Building capacity in small-scale mining communities: health, ecosystem sustainability, and the global mercury project", *Eco Health*, 2: 361-369.

Spittaels, S. (ed.) (2010) "The complexity of resource governance in a context of state fragility: an analysis of the mining sector in the Kivu hinterlands", International Peace Information Service (IPIS) and International Alert, Antwerp and London.

Spittaels, S. and Hilgert, F. (2008) "Mapping conflict motives: Eastern DRC", International Peace Information Service (IPIS), Antwerp.

Spittaels, S. and Hilgert, F. (2010) "Mapping conflict motives: Province Orientale", International Peace Information Service (IPIS), Antwerp.

Spittaels, S. and Hilgert, F. (2013) "Analysis of the interactive map of artisanal mining areas in Eastern DR Congo", International Peace Information Service (IPIS), Antwerp.

Stearns, J. (2010a) "The mineral export ban: what gives?", *Congo Siasa*, 13/09/2010, http://congosiasa.blogspot.com/2010_09_01_archive.html (last consulted 05/10/2010).

Stearns, J. (2010b) "What did Kagame and Kabila talk about?", *Congo Siasa*, 10/09/2010, http://congosiasa.blogspot.com/2010/09/what-did-kagame-and-kabila-talk-about.html (last consulted 05/10/2010).

Stearns, J. (2010c) "Rwandan troops in the Kivus", *Congo Siasa*, 23/09/2010, http://congosiasa.blogspot.com/2010/09/rwandan-troops-in-kivus.html (last consulted 05/10/2010).

Stearns, J. (2011) "500 kilos of gold, a war criminal and gulfstream jet", 08/02/2011, http://congosiasa.blogspot.be/2011/02/500-kilos-of-gold-war-criminal-and.html (last consulted 08/07/2013).

Stearns, J. and Hege, S. (2010) "Independent oversight for mining in the Eastern Congo? A proposal for a third party monitoring and enforcement mechanism", *Center on International Cooperation (CIC) Concept Note*, New York University.

Steiger, O. (2006) "Property economics versus new institutional economics: alternative foundations of how to trigger economic development", *Journal of Economic Issues*, 40 (1): 183-208.

Steinke, I. (2004) "Quality criteria in qualitative research", in: Flick, U.; von Kardoff, E. and Steinke, I. (eds.) *A companion to qualitative research*, London, Sage Publications.

Sullivan, D. and Atama, N. (2010) "Digging in. Recent developments on conflict minerals", Enough Project, Washington DC.

Szablowski, D. (2002) "Mining, displacement and the World Bank: a case analysis of Compania Minera Antamina's operations in Peru", *Journal of Business Ethics*, 39 (3): 247-273.

Szablowski, D. (2007) "Who defines displacement? The operation of the World Bank involuntary resettlement policy in a large mining project", in: Vandergeest, P.; Idahosa, P. and Bose, P.S. (eds.) *Development's displacements. Ecologies, economies and cultures at risk,* Toronto and Vancouver, UBC Press.

Tamanaha, B.Z. (2008) "Understanding legal pluralism", Sydney Law Review, 30: 375-411.

Taylor, P.L. (2005) "A Fair Trade approach to community forest certification? A framework for discussion", *Journal of Rural Studies*, 21: 433-447.

Tegera, A. and Johnson, D. (2007) "Rules for sale: formal and informal cross-border trade in eastern DRC", Pole Institute, Goma.

Tegera, A. (2010) "L'impact de la suspension des activités du secteur minier dans l'ancien Kivu", Pole Institute, Goma.

Tegera, A. (2011) "Réouverture des activités minières à l'est de la RD Congo: enjeux et défis", Pole Institute, Goma.

The Carter Centre (2012) "Les investissements miniers en République Démocratique du Congo: développement ou appauvrissement des communautés locales? Rapport d'impact des investissements miniers étrangers sur les droits humains. Cas des investissements Chemicals of Africa (Chemaf) et Ruashi Mining au Katanga", The Carter Center, Atlanta.

Thomas, J.J. (1988) "The politics of the black economy", *Work Employment & Society*, 2 (2): 169-190.

Thompson, E.P. (1971) "The moral economy of the English crowd in the eighteenth century", *Past & Present*, 50: 76-136.

Thomson, S.; Ansoms, A. and Murison, J. (2013) "Introduction: why stories behind the findings?", in: Thomson, S.; Ansoms, A. and Murison, J. (eds.) *Emotional and ethical challenges for field research in Africa*, London, Palgrave MacMillan, 1-11.

Thomson Reuters (2013) "Gold Survey 2013", Thomson Reuters GFMS, London.

Tibbett, S. (2009) "A golden opportunity. Recasting the debate on the economic and development benefits of small-scale and artisanal gold mining", CRED Foundation, Portsmouth.

Tilly, C. (2004) "Trust and rule", Theory and Society, 33 (1): 1-30.

Titeca, K. (2012) "Tycoons and contraband: informal cross-border trade in West Nile, north-western Uganda", *Journal of Eastern African Studies*, 6 (1): 47-63.

Titeca, K. and De Herdt, T. (2010) "Regulation, cross-border trade and practical norms in West-Nile, North-Western Uganda", *Africa*, 80 (4): 573-594.

Titeca, K. and De Herdt, T. (2011) "Real governance beyond the 'failed state': negotiating education in the Democratic Republic of Congo", *African Affairs*, 110 (439): 213-231.

Titeca, K. and Kimanuka, C. (2012) "Walking in the dark: informal cross-border trade in the Great Lakes Region", International Alert, London.

Trebeck, K.A. (2007) "Tools for the disempowered? Indigenous leverage over mining companies", *Australian Journal of Political Science*, 42 (4): 541-562.

Trefon T. (2011) *Congo masquerade. The political culture of aid inefficiency and reform failure,* London and New York, Zed Books.

Triest, F. (2012) "Le secteur minier artisanal à l'est de la RDC: état des lieux et perspectives", Commission Justice et Paix, Bruxelles.

Tschakert, P. (2009) "Recoginizing and nurturing artisanal mining as a viable livelihood", *Resources Policy*, 34: 24-31.

Tshibanza, M. and Tshimanga, M. (1985) "Matières précieuses et libéralization. Esquisse d'un bilan provisoire", *Zaïre- Afrique*, 196: 337-340.

Turner, T. (2007) *The Congo Wars. Conflict, myth and reality,* London and New-York, Zed Books.

Umbeck, J. (1977) "The California gold rush: a study of emerging property rights", *Explorations in Economic History*, 14: 197-226.

UN (2001) "Report of the Group of Experts on the illegal exploitation of natural resources and other richness in the DRC", S/2001/357, UN Security Council, New York.

UN (2002) "Report of the Group of Experts on the illegal exploitation of natural resources and other richness in the DRC", S/2002/1146, UN Security Council, New York.

UN (2003) "Resolution 1493 adopted by the Security Council in its 4797th session, 28 July 2003", S/RES/1493, UN Security Council, New York.

UN (2008) "Final Report of the Group of Experts on the Democratic Republic of the Congo", S/2008/773, UN Security Council, New York.

UN (2009) "Final Report of the Group of Experts on the Democratic Republic of the Congo", S/2009/603, UN Security Council, New York.

UN (2010a) "Letter dated 15 November 2010 from the Chair of the Security Council Committee established pursuant to resolution 1533 (2004) concerning the Democratic Republic of the Congo addressed to the President of the Security Council", S/2010/596, UN Security Council, New York.

UN (2010b) "Report of the Mapping Exercise documenting the most serious violations of human rights and international humanitarian law committed within the territory of the Democratic Republic of the Congo between March 1993 and June 2003, August 2010", UN Security Council, New York.

UN (2011) "Letter dated 29 November 2011 from the Chair of the Security Council Committee established pursuant to resolution 1533 (2004) concerning the Democratic Republic of the Congo addressed to the President of the Security Council", S/2011/738, UN Security Council, New York.

UN (2012) "Letter dated 12 November 2012 from the Chair of the Security Council Committee established pursuant to resolution 1533 (2004) concerning the Democratic Republic of the Congo addressed to the President of the Security Council", S/2012/843, UN Security Council, New York.

UN (2014) "Letter dated 22 January 2014 from the Chair of the Security Council Committee established pursuant to resolution 1533 (2004) concerning the Democratic Republic of the Congo addressed to the President of the Security Council", S/2014/42, UN Security Council, New York.

USGS (2009) "Mineral commodity summaries 2009", US Department of the Interior, Washington DC.

Utshudi Ona, I. and Ansoms, A. (2011) "Reconciling custom, state and local livelihoods: decentralized land management in South Kivu (DRC)", : Marysse, S. and Ansoms, A. (eds.) *Natural resources and local livelihoods in the Great Lakes Region of Africa*, London, Palgrave, 26-48.

Utting, P. (2008) "The struggle for corporate accountability", *Development and Change*, 39 (6): 959-975.

Van Acker, F. (2005) "Where did all the land go? Enclosure and social struggle in Kivu (DRCongo)", *Review of African Political Economy*, 32 (103): 79-98.

Vandergeest, P.; Idahosa, P. and Bose, P.S. (2007) "Introduction", in: Vandergeest, P.; Idahosa, P. and Bose, P.S. (eds.) *Development's displacements. Ecologies, economies and cultures at risk*, Toronto and Vancouver, UBC Press.

Van Puijenbroek, J.; Mongo Malolo, E. and Bakker, J. (2012) "Un avenir en or en Ituri? Quel futur pour l'exploitation aurifère en Ituri, RD Congo?", IKV Pax Christi et Réseau Haki na Amani (RHA), Utrecht.

Verbruggen, D.; Francq, E. and Cuvelier, J. (2011) "Guide to current mining reform initiatives in Eastern DRC", International Peace Information Service (IPIS), Antwerp.

Verweijen, J. (2013) "Military business and the business of the military in the Kivus", *Review of African Political Economy*, 40 (135): 67-82.

Vlassenroot, K. (2001) "War as an exit from social exclusion? The formation of Mayi-Mayi militias in eastern Congo", *Afrika Focus*, 17 (1-2): 51-77.

Vlassenroot, K. (2004) "Reading the Congolese crisis", in: Vlassenroot, K. and Raeymaekers, T. (eds.) *Conflict and social transformation in Eastern DR Congo*, Gent, Academia Press, 39-60.

Vlassenroot, K. and Raeymaekers, T. (2004a) "Divisé en deux. Or et identité sociale à Kamituga (Sud-Kivu)", in: Marysse, S. and Reyntjens, F. (eds.) *L'Afrique des Grands Lacs, Annuaire 2003-2004*, Paris, L'Harmattan, 203-238.

Vlassenroot, K. and Raeymaekers, T. (2004b) "Conflict and artisan mining in Kamituga (South-Kivu)", in: Vlassenroot, K. and Raeymaekers, T. (eds.) *Conflict and social transformation in Eastern DR Congo*, Ghent, Academia Press, 123-156.

Vlassenroot, K. and Huggins, C. (2005) "Land, migration and conflict in eastern DRC", in: Huggins, C. and Clover, J. (eds.) *From the Ground Up: Land rights, conflict and peace in Sub-Saharan Africa*, Nairobi and Pretoria: African centre for Technology Studies and Institute of Security Studies, 115-194.

Vlassenroot, K. (2013) "South Kivu. Identity, territory and power in the eastern Congo", Usalama Project, Rift Valley Institute, Nairobi.

von Benda-Beckmann, K. (1981) "Forum shopping and shopping forums: dispute processing in Minangkabau village", *Journal of Legal Pluralism*, 19: 117-159.

von Benda-Beckmann, F. and K. (2006) "The dynamics of change and continuity in plural legal orders", *Journal of Legal Pluralism and Unofficial Law*, 53-54: 1-44.

Vwakyanakazi, M. (1991) "Import and export in the second economy in North Kivu", in: MacGaffey, J. (ed.) *The real economy of Zaïre. The contribution of smuggling and unofficial activities to national wealth*, Oxford, James Currey.

Vwakyanakazi, M. (1992) "Creuseurs d'or et crise socio-économique au Nord-Kivu en République du Zaire", *Africa: Rivista di interessi africani*, 47 (3): 375-391.

Waddock, S. (2008) "Building a new institutional infrastructure for corporate responsibility", *Academy of Management Perspectives*, 22 (3): 87-108.

Walsh, A. (2003) "Hot money and daring consumption in a northern Malagasy sapphire mining town", *American Ethnologist*, 30 (2): 290- 305.

Werthmann, K. (2009) "Working in a boom-town: female perspectives on gold mining in Burkina Faso", *Resources Policy*, 34: 18-23.

Wolf, E. (1966) "Kinship, friendship, and patron-client relations in complex societies", in: Banton, M. (ed.) *The social anthropology of complex societies*, London, Routledge.

Wong, S. (2010) "Elite capture or capture elites? Lessons from the 'counter-elite' and 'co-optelite' approaches in Bangladesh and Ghana", *UNU WIDER working paper 82*, United Nations University World Institute for Development Economic Research, Helsinki.

Woolcock, M.; Pritchett, L. and Isham, J. (2001) "The social foundations of poor economic growth in resource-rich economies", in: Auty, R. (ed.) *Resource abundance and economic development*, Oxford, Oxford University Press.

World Bank (1992) "Strategy for African mining", World Bank, Mining Unit, Industry and Energy Division, Washington DC.

World Bank (2004) "Striking a better balance. The World Bank Group and Extractive Industries: the final report of the Extractive Industries Review", World Bank, Washington DC.

World Bank (2008) "Democratic Republic of Congo. Growth with governance in the mining sector", Report No. 43402-ZR, World Bank, Oil, Gas, Mining and Chemicals Department, Africa Region, Washington DC.

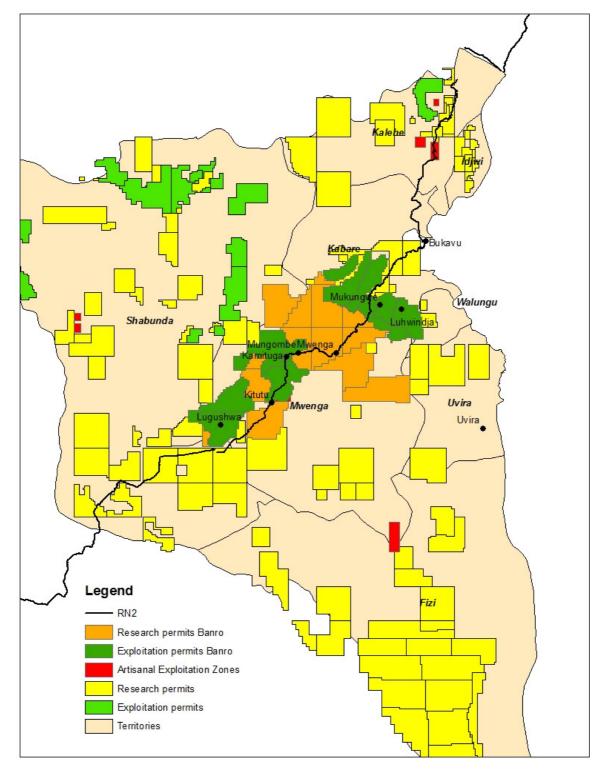
World Bank (2009) "Working together. How large-scale mining can engage with artisanal and small-scale miners", CASM (Communities and artisanal and small-scale mining), IFC's Oil, Gas and Mining Sustainable Community Development, ICCM (International council on mining and metals), Washington DC.

Yakovleva, N. (2007) "Perspectives on female participation in artisanal and small-scale mining : a case-study of Birim North District of Ghana", *Resources Policy*, 32: 29-41.

Young, C. and Turner, T. (1985) *The rise and decline of the Zairian state,* Wisconsin, The University of Wisconsin Press.

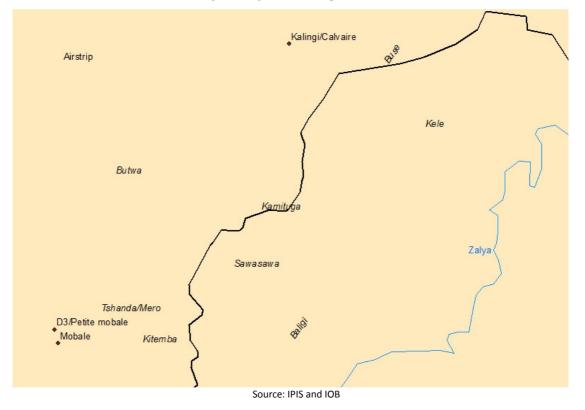
Zack-Williams, A.B. (1999) "Sierra Leone: the political economy of civil war, 1991-98", *Third World Quarterly*, 20 (1): 143-162.

ANNEXES



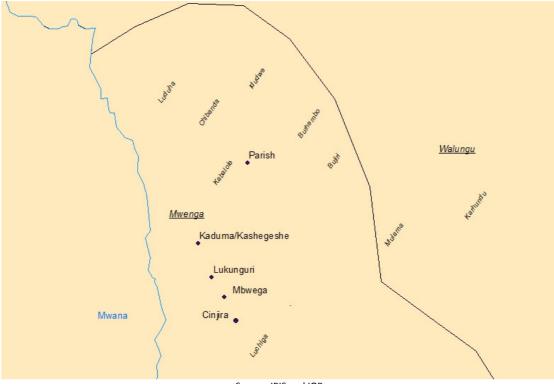
Map 1. Map of South Kivu

Source : IPIS and IOB

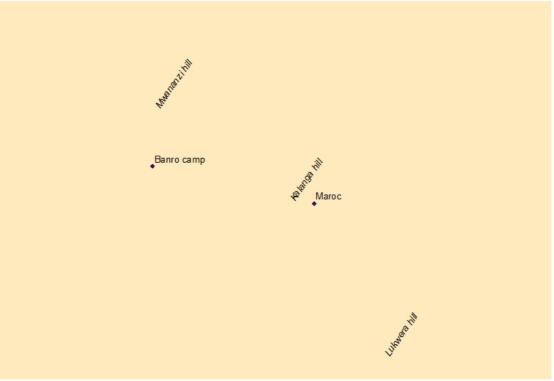


Map 2. Map of Kamituga locations









Source: IPIS and IOB

SURVEY

| Nom du chercheur : |
|--|
| Date : |
| Lieu : |
| Nom du site minier artisanal : |
| Localisation par rapport au site industriel : |
| Nom de la personne interviewée : |
| Numéro de téléphone de la personne interviewée : |
| |

| A.1. Quels travaux miniers la société minière a-t-elle déjà fait ? A.1.1. Prospection : 0 oui : dans quels sites ? 0 non A.1.2. Exploitation: 0 oui : dans quels sites ? |
|---|
| 0 non |
| A.2. Quelles autres activités la société a-t-elle déjà fait ? A.2.1. Projets sociaux pour la population : 0 oui : lesquels ? |
| 0 non A.2.2. Construction de l'infrastructure : 0 oui : lesquels ? |
| 0 non A.2.3. Délocalisation des familles : 0 oui : combien ? |
| 0 non A.2.4. Compensation des familles: 0 oui : combien ? |
| 0 non A.2.5. Délocalisation des exploitants artisanaux: 0 oui : combien ? |
| 0 non A.2.6. Compensation des exploitants artisanaux : 0 oui : comment ? |
| combien ? 0 non A.2.7. Engagement des travailleurs : 0 oui : combien ? |
| 0 non A.2.8. Autres : 0 oui : lesquelles ? |

| 0 non | |
|--|-------------------------|
| A.3.1 Combien de puits/ lieux d'extraction y-avait-il dans ce site-ci avant l'arrivée de la société ? | |
| A.3.2. Et maintenant ? | |
| A.3.3. Comment expliquer cette différence ? | |
| A.4.1 Combien de gens (à peu près) travaillaient dans ce site-ci avant l'a société ? | rrivée de la |
| A.4.2. Et maintenant ? | |
| A.4.3. Comment expliquer cette différence ? | |
| A.5. Est-ce qu'il y a des creuseurs qui ont été déplacés des sites où la so maintenant ? 0 oui \rightarrow A.6. 0 non \rightarrow A.7. | ciété travaille |
| A.6. Ces creuseurs, qu'est-ce qu'ils font maintenant ? | |
| 0 Chômeur :% | |
| 0 Creuseur dans d'autres sites :% | |
| 0 Travailleur de la société :% | |
| 0 Cultivateur :% | |
| 0 Commerçant :% 0 Autres : | |
| | |
| A.7. Vous pouvez estimer les revenus des creuseurs avant et après la prospection et l'exploitation industrielle (en moyenne)? A.7.1. Avant : | |
| | |
| A.8. Vous pouvez estimer les revenus des PDGs/ propriétaires avant et a | après la prospection et |
| l'exploitation industrielle (en moyenne)? | |
| A.8.1. Avant : par mois A.8.2. Après : par mois | |
| | |
| A.9. Dans quelle mesure êtes –vous d'accord avec ces observations ? | |
| A.9.1. Le secteur industriel a créé de l'emploi pour la population | 1-2-3-4-5 |
| A.9.2. Les gens gagnaient beaucoup dans le secteur artisanal | 1-2-3-4-5 |
| A.9.3. Les conditions de vie pour les travailleurs de la société sont | 1-2-3-4-5 |
| meilleures qu'ailleurs | |
| A.9.4. Le secteur artisanal occupait beaucoup de gens | 1-2-3-4-5 |
| A.9.5. Le développement de l'exploitation industrielle sera mieux pour | 1-2-3-4-5 |
| le développement à long terme | 1 2 2 4 5 |
| A.9.6. La société nous donne plus de travail que le secteur artisanal A.9.7. L'Etat peut donner toutes les concessions aux industriels pour | 1-2-3-4-5 1-2-3-4-5 |
| exploiter | 12345 |
| A.9.8. L'exploitation artisanale est importante pour la population | 1-2-3-4-5 |
| A.9.9. Etre creuseur n'est pas un vrai emploi | 1-2-3-4-5 |
| A.9.10. Si on m'offre un emploi dans le secteur industriel, je dois | 1-2-3-4-5 |
| accepter, quel que soit le salaire | |

A.10. Si vous comparez la situation aujourd'hui avec celle d'il y a quelques années, vous avez l'impression que
A.10.1. Le nombre de conflits dans la communauté a
0 augmenté
0 baissé
0 resté sur le même niveau
A.10.2. La jalousie dans la communauté a
0 augmenté
0 baissé
0 resté sur le même niveau
A.10.3. La sécurité dans la communauté a
0 augmenté
0 baissé
0 resté sur le même niveau
A.10.3. La sécurité dans la communauté a
0 augmenté
0 baissé
0 resté sur le même niveau
A.10.3. La sécurité dans la communauté a
0 augmenté
0 augmenté
0 baissé

| B.1. Quelle est la forme du lieu d'extraction pour lequel vous êtes responsable ? |
|--|
| 0 Puits |
| 0 Exploitation à ciel ouverte |
| 0 Exploitation alluviale |
| 0 Autre : spécifiez : |
| |
| B.2. Combien de personnes travaillent ici (en total): |
| Pour le moment : |
| Pendant la période de préparatifs : |
| Pendant la période de la plus grande production : |
| |
| B.3. Quels catégories de personnes travaillent ici et combien : |
| 0 Boiseurs : combien : |
| 0 Foreurs : combien : |
| 0 Pelleteurs: combien : |
| 0 Capita : |
| 0 Sentinelle : |
| 0 Autres : spécifiez : |
| |
| B.4. Depuis combien de temps est-ce que vous travaillez ici? |
| 0 Moins de 3 mois |
| 0 Entre 3 mois et une année |
| 0 Entre une année et 5 ans |
| 0 Plus de 5 ans |
| |
| B.5. Quelles activités avez-vous déjà fait dans le secteur minier et combien d'années? |
| 0 Creuseur : ans |
| 0 Transporteur : ans |
| 0 Loutrier:ans |
| 0 Acheteur: ans |
| 0 Propriétaire/ responsable: ans |
| 0 Commerçant en d'autres matières (coltan, cassitérite, wolframite): ans |
| 0 Autres : spécifiez : |
| |
| B.6. Ca fait combien de temps que vous travaillez dans ce secteur ? |

| 0 Moins de 3 mois |
|--|
| 0 Entre 3 mois et une année |
| 0 Entre une année et 5 ans |
| 0 Plus de 5 ans |
| |
| B.7. Quelle a été la raison principale pour vous engager dans ce secteur ? |
| 0 Manque d'alternatives (autres emplois) |
| 0 Possibilité de gagner plus d'argent dans ce secteur |
| 0 Suivi l'exemple d'autres qui étaient dans le secteur |
| 0 Autres : |
| |
| B.8. Quelle a été la raison pour commencer dans ce puits/ lieu d'extraction spécifiquement ? |
| 0 Sur base de prospection |
| 0 Informations acquises des autres personnes |
| 0 Connaissance personnelle |
| 0 Coïncidence |
| 0 Autres : |
| U Autres : |
| D.O.1. Est se sue vous person que vous elles continues estte estivité 2 |
| B.9.1. Est-ce que vous pensez que vous allez continuer cette activité ? |
| 0 Oui : pourquoi : |
| 0 Non : quelle autre activité vous pensez aller faire : |
| B.9.2. Si vous pourriez choisir, est-ce que vous voudriez continuer cette activité ? |
| 0 Oui : pourquoi : |
| 0 Non : quelle autre activité vous voudriez faire : |
| |
| B.10. Quel est votre statut ? |
| 0 Propriétaire de la terre |
| - avec quels droits de propriété ? |
| 0 Propriétaire du puits |
| - avec quels droits de propriété ? |
| 0 Responsable du puits |
| |
| 0 Autre |
| |
| |
| |
| C.1.1. Par rapport à d'autres puits/lieux d'extraction dans le même site, votre exploitation est |
| 0 parmi les plus importants |
| 0 il a une production moyenne |
| 0 parmi les moins importants |
| |
| C.1.2. Quels sont les lieux d'extraction avec la plus grande production de l'or ? |
| |
| |
| |
| |
| |
| C.2. Combien d'or est-ce que votre site produit en moyenne ? |
| Pour le moment : renge par mois |

Pendant la période de préparatifs :..... renge par mois

Pendant la période de la plus grande production :..... renge par mois

C.3. Au cours des 12 mois passés, combien de semaines estimez-vous qu'il y a eu une production ?.....

C.4. Au cours des 12 mois passés, combien de semaines estimez-vous que vous avez fait des travaux préparatifs ?.....

C.5. Au cours du mois passé, quelle a été la production totale de votre site ? ... renge

C.6. Comment est-ce que la production est partagée? PDG : % de la production Travailleurs : % de la production % de la production % de la production % de la production Autres : lesquels ?..... ... % de la production C.7. Au cours du mois passé, quelles dépenses est-ce que vous avez faits ? C.7.1. Outils pour exploitation : total : ... dollars par mois 0 bois pour boisage: ... dollars par mois 0 bèche: ... dollars par mois 0 burin: ... dollars par mois 0 marteau : ... dollars par mois 0 autres : lesquels : dollars par mois C.7.2. Petites machines : total :..... dollars par mois 0 motopompe: ... dollars par mois 0 carburant: ... dollars par mois O groupe électrogène: ... dollars par mois 0 autres : lesquels : dollars par mois C.7.3. Outils pour traitement: total :..... dollars par mois 0 acide nitrique 0 karai: ... dollars par mois 0 biporo: ... dollars par mois 0 loutra: ... dollars par mois 0 autres : lesquels : dollars par mois C.7.4. Dépenses pour le transport: total :..... dollars par mois C.7.5. Dépenses pour les travailleurs : total :..... dollars par mois 0 boiseurs: ... dollars par mois 0 foreurs/ peleteurs: ... dollars par mois 0 transporteurs: ... dollars par mois 0 mamans twangaises: ... dollars par mois 0 autres : lesquels : dollars par mois C.7.6. Dépenses pour les taxes et contributions: total :..... dollars par mois 0 mwami: ... dollars par mois O autorités coutumières: ... dollars par mois 0 Division des Mines: ... dollars par mois 0 Saesscam: ... dollars par mois 0 police: ... dollars par mois 0 militaires: ... dollars par mois 0 autres : lesquels : dollars par mois

| C.7.7. Autres dépenses: total : dollars par mois Spécifiez : |
|---|
| C.7.8. Par rapport à l'année passée, mes dépenses ont O augmenté O pas changé O baissé |
| C.7.9. Quelle en est la raison selon vous ? |
| C.8.1. Quels ont été les grands investissements que vous avez déjà fait dans ce site (depuis que vous avez commencé à exploiter ici), pour combien et quand ? combien ? année ? combien ? année ? combien ? année ? |
| C.9.1. Au cours de mois passé quels ont été vos revenus nets personnels ? dollars C.9.2. Par rapport à l'année passée, mes revenus ont 0 augmenté 0 pas changé 0 baissé C.9.3. Quelle en est la raison selon vous ? |
| C.10. Comment est-ce que vous avez utilisé cet argent ? C.10.1. Investissements dans le site : dollars C.10.2. Autres investissements : dollars C.10.3. Besoins personnels : dollars C.10.4. Besoins de la famille (nourriture, scolarisation, soins de santé etc.): dollars C.10.5. Epargnes : dollars C.10.6. Autres ? lesquels : |

D. Est-ce que vous avez d'autres recommandations ou remarques ?

SAMENVATTING

Goud uit het oosten van de Democratische Republiek Congo (DRC) wordt gewoonlijk geassocieerd met gewelddadig conflict, armoede en uitbuiting. Beelden van artisanale mijnwerkers die slavenarbeid verrichten voor rebellenleiders en meedogenloze handelaars worden frequent bovengehaald als verklaring voor het aanslepen van het Congolese conflict. Bovendien zou de Congolese bevolking, hoewel wonend bovenop een geologische schat, helemaal niets winnen bij de exploitatie van de bodemrijkdommen. Deze dissertatie toont eerst en vooral aan dat dit verhaal slechts een deel van de waarheid vertelt en genuanceerd dient te worden, zowel in tijd als in ruimte. Bovendien stelt ze een alternatieve interpretatie voor van artisanale goudmijnbouw en goudhandel, gebaseerd op het begrip 'access' of 'toegang'. Ten slotte maakt ze op basis daarvan een reflectie over artisanale goudmijnbouw en –handel en ontwikkeling.

De dissertatie is onderverdeeld in vier delen, elk bestaand uit een aantal hoofdstukken. Deel één (hoofdstuk 1-4) schetst het theoretische en het ontwikkelingskader van dit onderzoek. Deel twee (hoofdstuk 5-7) analyseert de geschiedenis van goudmijnbouw in de geselecteerde sites. Deel drie (hoofdstuk 8-10) brengt dan een gedetailleerde analyse van de huidige organisatie van artisanale goudmijnbouw en goudhandel. Deel vier (hoofdstuk 11-13) introduceert een aantal zeer recente (externe) ontwikkelingen en analyseert hoe deze de interne dynamieken in de goudsector beïnvloeden.

Hoofdstuk 1 vertrekt van de relatie tussen mijnbouw en ontwikkeling, die vaak geproblematiseerd wordt omwille van de perverse economische, politieke, sociale en ecologische effecten die mijnbouw kan hebben. Deze dissertatie focust op artisanale mijnbouw, een kleinschalige vorm van exploitatie die gebeurt door individuen of teams, met beperkte technologie en niet gemechaniseerde werktuigen. Deze manier van grondstofontginning is in vele (vooral) ontwikkelingslanden zeer wijdverspreid, maar wordt vaak gekarakteriseerd als 'informeel', of niet gereguleerd, en 'illegaal', of niet bij wet geregeld. Dit is volgens beleidsmakers de reden waarom ze niet (kan) bijdragen aan ontwikkeling. In de academische literatuur heeft het begrip 'informeel' echter een hele geschiedenis, die aantoont dat een strikte opdeling in informeel/ formeel in vele contexten irrelevant is. Formalisering, vaak gepropageerd als dé oplossing voor vele ontwikkelingsproblemen, wordt in dit hoofdstuk dan ook kritisch bekeken. Naast artisanale mijnbouw is er ook industriële mijnbouw, die gebeurt door grote privébedrijven, vaak multinationals. Regeringen trekken dergelijke investeringen graag aan omdat ze mogelijkheden bieden tot staatsinkomsten (meer dan de artisanale sector). In de afsluitende sectie van hoofdstuk 1 ga ik dan ook dieper in op het model van industriële, grootschalige mijnbouw als verschillend van het model van artisanale, kleinschalige mijnbouw. Dit debat vormt de achtergrond voor mijn empirische studie over Zuid-Kivu in de DRC.

De Congolese context wordt geschetst in hoofdstuk 2. Eerst en vooral onderzoek ik het discours rond 'conflictmineralen' en de relatie tussen mijnbouw en onderontwikkeling. Ik haal verschillende redenen aan waarom dit verhaal genuanceerd moet worden. Eén van de nuances bestaat uit een historische analyse van Congo's politieke economie. Deze sectie toont aan welke historisch gezien de plaats was van industriële en artisanale mijnbouw, en hoe de

mijnsector mee vorm gegeven werd door ontwikkelingen en beleid op het nationale en internationale niveau. In een volgende sectie zoom ik dan in op de provincie Zuid-Kivu, die het onderwerp vormt van mijn onderzoek. Een eerste algemene blik op goudexploitatie en goudhandel in Zuid-Kivu toont vooral aan dat er een grote kloof gaapt tussen wetten en regels enerzijds, en de realiteit op het terrein anderzijds. Officieel exporteert Zuid-Kivu slechts enkele tientallen kilogram goud, terwijl in realiteit de productie op meer dan 4 ton wordt geschat. Hoe valt dit te verklaren? Wat gebeurt er écht in de goudsector in Zuid-Kivu? Waarom lijken de wetten geen vat te hebben op de realiteit? Enkel een grondige analyse op basis van empirische gegevens kan ons hierbij helpen.

De empirische gegevens komen aan bod in deel twee, drie en vier. De twee laatste hoofdstukken in deel één, hoofdstuk 3 en hoofdstuk 4, reiken ons eerst nog de tools aan voor analyse: het theoretische en methodologische kader. Hoofstuk 3 introduceert 'de theorie van toegang' ('access theory') als een manier om de complexe dynamieken van regels, machtsrelaties en individuele activiteiten in een samenleving beter te begrijpen. Hier wordt de theorie meer concreet toegepast om te ontdekken hoe verschillende categorieën mensen voordeel kunnen halen uit de exploitatie van en handel in goud. Dit is de centrale onderzoeksvraag in de dissertatie. De basisidee is dat mensen die toegang willen tot bepaalde zaken niet alleen gebruik maken van rechten (die vervat zitten in wetten, gewoonterecht of conventies), maar dat er in de samenleving (machts)relaties en structuren bestaan die kunnen bepalen of mensen al dan niet toegang hebben tot de voordelen gehaald uit goudmijnbouw en handel. Anderzijds gebruiken individuen deze structuren en relaties ook actief om hun eigen toegang te verkrijgen, behouden of versterken. Individuen in machtsposities kunnen deze rechten, relaties en structuren ook gebruiken om anderen de toegang te ontzeggen en dus toegang te controleren. Hoofdstuk 4 zet op een gedetailleerde wijze uiteen hoe ik dit onderzoek heb aangepakt. Ik beschrijf de manier waarop de data werden verzameld en geanalyseerd - vooral door middel van kwalitatieve methoden - maar reflecteer ook kritisch over mijn eigen positie als onderzoeker. Ik verantwoord ook de keuze voor de drie sites (Kamituga, Luhwindja en Mukungwe): a) ze zijn belangrijk in termen van goudproductie en aantal mensen die actief zijn in de sector, b) ze hebben verschillende structurele kenmerken, waardoor een aantal factoren blootgelegd kunnen worden die bepalend zijn voor de organisatie van de goudsector en c) ze zitten momenteel in een verschillend stadium wat de verhouding tussen industriële en artisanale mijnbouw betreft.

Hoofdstukken 5, 6 en 7 focussen op de geschiedenis van de mijnbouw in respectievelijk Kamituga, Luhwindja en Mukungwe. Kamituga ontwikkelde zich als mijnstad tijdens de koloniale periode. De aanwezigheid van een groot bedrijf (tot 1996), een bevolking die is opgegroeid met de mijnactiviteiten en een stevig verankerde artisanale ontginning, bepalen Kamituga's traject tot op de dag van vandaag. In Luhwindja was er weinig industriële exploitatie, maar werd de artisanale ontginning georganiseerd door de traditionele chef. Sinds enkele jaren is er echter een multinational goud aan het produceren in Luhwindja, wat uiteraard gevolgen heeft voor de toegang van de artisanale mijnwerkers, en ook voor de positie van de traditionele chef. In Mukungwe ten slotte woedt er tot op de dag van vandaag een gewelddadig conflict rond de controle over de mijnen tussen twee groepen van de lokale elite. De hoofdstukken tonen aan dat verschillende categorieën mensen (breed gedefinieerd als mijnwerkers en handelaars, bedrijven en elites) op diverse manieren toegang proberen te

SAMENVATTING

verkrijgen, behouden of controleren, of anders gezegd: proberen te profiteren van de goudexploitatie en handel. Hoe ze dat doen en in hoeverre ze daarin slagen, hangt af van machtsverhoudingen en structuren op lokaal, maar ook op nationaal en internationaal niveau. Wanneer de externe context verandert, worden mensen dus genoodzaakt om hun strategieën aan te passen, en op die manier is 'toegang' een dynamisch begrip.

Hoofdstuk 8 analyseert de regels, machtsrelaties en activiteiten van artisanale mijnwerkers in en rond de mijnschachten. Hun activiteiten worden helemaal niet gestuurd door statelijke wetten of bureaucratie, maar beantwoorden niettemin aan vrij specifieke regels. De mijnwerkers gebruiken ook een aantal mechanismen gebaseerd op rechten (zoals het recht om de grond van je voorouders te bewerken), relaties (zoals de mogelijkheid om investeringen te laten financieren door een geldschieter) en structuren (zoals de kennis en technologie die ze hebben verworven tijdens tientallen jaren van artisanale exploitatie) om zich ervan te verzekeren dat ze kunnen winnen bij de exploitatie. Dit 'gewin' valt trouwens niet enkel in monetaire termen uit te drukken, maar heeft ook veel te maken met zelfstandigheid, vrijheid, moraliteit, identiteit en sociale status. Hoofstuk 9 gaat dieper in op het mechanisme van de relaties en toont aan hoe mijnwerkers en handelaars afspraken maken rond prefinanciering en terugbetaling. Beide partijen hebben er belang bij dat deze afspraken goed worden nagekomen, en daarom zijn er opnieuw regels die deze praktijken in goede banen leiden. De toegang tot relaties wordt hier als het ware beschouwd als de toegangspoort naar andere mechanismen. In hoofdstuk 10 analyseer ik een reeks mechanismen in de goudhandel, van het zeer lokale niveau tot het globale niveau. De vraag is opnieuw hoe de handelaars in staat zijn om te profiteren van de handel in goud, gezien het feit dat de prijsmarges in elke stap relatief klein zijn.

In deel vier worden dan twee externe dynamieken besproken die in de laatste jaren de goudsector hebben beïnvloed: formalisering en industrialisering. Hoofdstuk 11 analyseert formalisering (door de Congolese overheid) en certificering (door internationale spelers) als mechanismen om controle te verwerven over de toegang tot goud en andere mineralen. Deze beleidsmaatregelen hebben tot op zekere hoogte effect gehad, maar slagen er niet in om volledig grip te krijgen op de goudsector. Ik argumenteer dat dit verklaard kan worden door het feit dat de interne dynamieken van de sector zoals beschreven in de voorgaande hoofdstukken, diep geworteld zijn. Hoofdstuk 12 analyseert dan de impact van industriële ontginning in Luhwindja en toont aan dat ook hier grote druk werd gezet op de toegang van artisanale mijnwerkers, maar dat die zich hiertegen op verschillende manieren verzetten.

In hoofdstuk 13 worden de belangrijkste conclusies van dit onderzoek nogmaals op een rij gezet en wordt de bijdrage van de dissertatie op academisch en op ontwikkelingsgebied in de verf gezet. De toepassing van 'access theory' op artisanale goudmijnbouw en goudhandel resulteert in een complexe en genuanceerde analyse die structuren en machtsverhoudingen blootlegt en toont hoe deze mensen beperken, maar ook hoe mensen deze kunnen gebruiken. Een dergelijke analyse die gestoeld is op een uitgebreid empirisch onderzoek is noodzakelijk voor een beter begrip van de goudsector in Oost-Congo, een sector en een regio die vaak ongenuanceerd worden voorgesteld. Ik kom tot het besluit dat formalisering enkel zal slagen indien er eerst een heleboel bredere hervormingen worden doorgevoerd in de publieke administratie, de veiligheidssector en de economie. Bovendien zou de prioriteit moeten liggen bij het ondersteunen van de artisanale sector, zeker op korte en middellange termijn, omwille van de grote werkgelegenheid die de sector creëert. Op middellange en misschien ook lange termijn zou dan een cohabitatie van artisanale en industriële mijnbouw mogelijk gemaakt moeten worden.