

Policies for the Regulation of Transnational Corporations due to Human Rights Violations in Latin America: Case Studies

Adriana de Azevedo Mathis

Gustavo Zambrano

Magdalena Correa Henao

Maria Luiza Alencar Mayer Feitosa
(organizers)

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Latin America Collection

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Introduction

This book is the third in the “Human Rights and Companies in Latin America” Collection jointly put out by the publishing houses at Universidade Federal de Goiás and Universidade Federal da Paraíba, and coordinated by the Latin American Graduate Consortium on Human Rights.

The Latin American Graduate Consortium on Human Rights was created in 2008 by the Graduate Law Program of Universidade Federal do Pará. Funded by the Ford Foundation, its goal is to foster scientific cooperation in the field of human rights education and research. Today, the Consortium comprises 15 universities in seven countries: Pontificia Universidad Católica del Perú, Universidad Austral de Chile, Universidad de Buenos Aires, Universidad Externado de Colombia, Universidad Iberoamericana, Universidad Nacional de Asunción, Universidad Nacional de La Plata, Universidad Nacional de Lanús, Universidade de Brasília, Universidade de Fortaleza, Universidade do Vale do Rio dos Sinos, Universidade Estadual Paulista, Universidade Federal da Paraíba, Universidade Federal de Goiás, and Universidade Federal do Pará, which houses the Consortium’s administrative office. Information on the various activities carried out by the Consortium is available from www.consorciodh.ufpa.br.

Since 2016 and also under a grant from the Ford Foundation, the Latin American Consortium has run the “Policies for the Regulation of

Transnational Corporations due to Human Rights Violations in Latin America” project, whose goal is to look into and compare Latin American countries’ national approaches to the prevention, control, and redress of impacts caused by the mining industry on human rights. This project’s results make up the “Human Rights and Companies in Latin America” Collection, whose previous issues include the “National Diagnoses” put together based on the legal and governmental frameworks of each of the seven countries which are home to the universities belonging to the Latin American Consortium, and the “Handbook on Human Rights and Transnational Corporations in Latin America,” meant for members of the legal profession.

This issue features the results from case studies conducted in five Latin American countries, namely Argentina, Brazil, Chile, Colombia, and Peru. The investigation primarily looked into how transnational mining corporations operate in Latin America and a few situations of illegal mining, and subsequently analyzed the relationship between such processes and the violation of human rights. Devised based on an interdisciplinary approach to the field of Human Rights, these studies were carried out at various Latin American universities by countless researchers and undergraduate and graduate teachers and students linked to different fields of knowledge.

While the studies were being conducted, the field of research was defined for each country and area where mining operations are run by transnational corporations, which also included some cases of illegal mining. Given the project’s initial goals, systematization requirements, impact analyses, and the analysis of players’ behavior, our attention then turned to the following aspects: 1) workplace conditions, focusing on the exploitation of vulnerable people; 2) the environment, focusing on the protection of indigenous people’s and ancient maroons’ land and cultur-

al rights; 3) intervention in the countries' internal politics, focusing on the corruption and collusion practices which benefitted certain companies, kept government officials from being held accountable, and compromised the protection of people's and communities' human rights.

So as to make reading more palatable and considering the length and scope of the studies, this publication has been split into two parts. While keeping in mind the different economic, social, and cultural realities found in the Latin America, the first part brings together the data obtained from the case studies carried out in Spanish-speaking Latin American countries, considering the head researchers' affiliation: Argentina (Universidade Nacional de Lanús – Unla), Chile (Universidad Austral de Chile), Colombia (Universidad Externado de Colombia), and Peru (Pontificia Universidad Católica del Perú - IDEH-PUCP). The second part presents the case studies conducted at six Brazilian universities associated with the Latin American Consortium on Human Rights: Universidade Federal de Goiás (UFG), Universidade Federal do Pará (UFPA), Universidade Federal da Paraíba (UFPB), Universidade de Fortaleza (UNIFOR), Universidade Estadual Paulista (UNESP), and Universidade do Vale do Rio dos Sinos (UNISINOS).

During the research design process, preparatory activities required for conducting the case studies in each country and area were defined: organizing specific case studies (interests and duties); the means necessary for conducting the field research (costs and funds); relationship between the research project's subject and its particularities at the various universities making up the consortium (dimensions and aspects); university resources to support the research in each place (action planning); suitable case study methods, procedures, and techniques; collaboration possibilities by those involved in doing the research; and research viability at the various universities making up the consortium, consid-

ering the availability of information, human resources, material conditions, institutional conditions, and partner institutions.

Without purporting to exhaust all of the particularities of the case studies presented here, we can mention a few global trends found in the analyzed countries and areas, which trends will be looked into later on in this publication.

In most of the cases studied, violations of human, economic, social and cultural rights (HESCR) are either directly or indirectly related to the political choices made by the Latin American countries under examination here, which have opted for a peripheral liberal development model based on the extraction and export of commodities.

In all of the countries analyzed, despite their political differences and greater or lower degree of social initiatives, we find they have in place a (market-based) production-oriented development model built on the fundamentals of a macroeconomic policy that touts the creation of jobs and wealth, along with certain welfare initiatives carried out via minimum income supplementation programs and education and training programs. Such developmentalism carries common trends in terms of how governments deal with the market when mining is concerned, something we have found in all of the Latin American countries studied here. These trends are: expanded, heightened extraction activities; growing demand and use of ores to supply the mineral processing industry; increased environmental and social impacts on the population, experienced in an unequal manner.

In the neoliberal globalization scene, the national States' role is redesigned and a notion of liberal democracy takes hold, under which notion social rights and civic affairs become a threat to capitalism. It is an ideological strategy by the political and economic powers-that-be to make democracy less identified with liberal rights, according to

the tenets of neoliberalism and, more recently, the conservative ultra neoliberalism.

Along with the crisis of democratic institutions, the downfall of certain classic political institutions (political parties, workers' unions etc.), and the national States' sovereignty crisis, we find that several conservative ultraliberal countries advocate the idea of a "government-free society" where the mightiest rule and where, at times, the government plays the role of "capital manager." Finally, in various parts of the world we find life becomes more and more informal and an individualistic culture has grabbed hold of all aspects of living in society.

Also with respect to the relationship between government and liberal democracy, some political theorists mention a clear "disconnect between government and civil society." On the one hand, we find the government is "demonized" and, on the other, the civil society's alleged "virtuous nature" is praised. In these new political frameworks, the nation state shows up as a negative element, whereas the civil society (networks of private organisms comprised of major transnational corporations, social organizations, unions, professional corporations, and social movements) is the positive element.

It should be noted that, given the society-wide fear of all kinds of violence, individual freedom is exchanged for more law enforcement which, ultimately, may lead to more violence. In such backdrop, violence and repression are found not only within governmental law enforcement agencies but also within organized society's private bodies.

Furthermore, in contemporary capitalism and as social relations become more complex we find that, while the government lets go of the role as mediator between capital and labor it played in the Fordist-Keynesian era, not only is civil society becoming less and less politicized and every-

thing government-related seen with suspicion but also people are distancing themselves from the classic institutions of politics.

In such scenario of major changes that characterized the transition from the 20th century to the 21st century, a model to control and contain social movements was put in place via a militarized conflict management based on neoliberal ideas and, more recently, conservative ultra neoliberal positions which have been spreading across the globe, including to Latin America.

In this backdrop where new social issues emerge in the political scene, the power wielded by transnational corporations worldwide has grown and there is a need to curb the violation of human rights. We must also create international mechanisms to guide transnational operations around the world via Corporate Social Responsibility practices. However, at the same time there is a push for the creation of mechanisms to curb human rights violations, all over the planet we see an increase in racist and discriminatory attitudes against immigrants from areas which do not benefit from the globalized world's economic policies. Hence, anti-globalization movements across the world denounce an oligarchical globalization process that heightens the differences and widens the gap between countries and regions of the world.

In people's everyday life, and in some case studies, we find it has been hard to hold transnational corporations, mining companies especially, accountable for the social and environmental damage to land where they carry out research and mining, notably on indigenous land and in underprivileged communities. Furthermore, in most cases, governments tend to side with companies, which makes it harder to have preventative and protective measures in place to prevent social and environmental damage.

At the same time, the organized civil society's defiant social movements have been increasingly pushing for the protection of social rights and the environment. In such backdrop, discussing the protection, guarantee, and advancement of human rights requires several types and strategies of social mobilization, including new forms of resistance, and encompasses the need for governments to set up universal and targeted public political initiatives that ensure people's access to historically achieved social rights. In that regard, it should be noted that, from a critical approach to human rights, economic, social, and cultural rights are related to the government's positive obligations. In other words, governments are required to comply with and enforce rules and regulations and also carry out actions and interventions by implementing social public policies.

Nevertheless, human rights transcend the field of formal law and stand, in real life, as a process of political fights and social achievements by the more underprivileged classes, which fights and achievements stem from fields of strain rife with social conflicts and diverging, contradictory interests. Such policies are run by the government from a public fund and involve certain actions and activities contained in government plans, programs, and projects. Therefore, they are social processes inscribed in society which can be considered neither as exclusive initiatives by the government or the exclusive outcome of the working class' fight and pressure. However, most of these case studies point out there are low investments in social public policies in mining areas.

Particularly in Brazil, the case studies report situations involving the following human rights violations: criminalization of social movement leaders and intimidation of associations fighting for human rights; heightened social conflicts in the area and expropriation of community assets, thereby compromising people's self-governing right and their right to control areas where mining takes place; high rate of violence

against defiant social movements and, particularly in some areas, homicidal violence against poor young black males. We should also mention we found some situations of forced labor within the mining chain of production and high rates of human rights violations (child labor, sexual abuse, and neglect against children, teenagers, and the elderly).

Therefore, it is important to consider that, based on the neoliberal production restructuring process taking place in Europe and the US in the last decades of the 20th century as a response to the welfare state crisis, we have simultaneously seen (i) the introduction of new technologies; (ii) a process leading ample sectors of the economy and life in society to become more informal; (iii) the adoption of strategies to deregulate, relax, and largely expand the process of labor outsourcing and subcontracting; and (iv) the return of atypical forms of work. These quintessential capital restructuring and reorganization measures have heavily impacted the social protection of labor, outsourced workers' relations, workers' representation organizations, and workers' forms of resistance. We have also seen longer harder working hours and a loss of labor rights, especially in Latin American countries that have basic social protection initiatives in place.

As the process of labor outsourcing and subcontracting takes a deeper hold on all sectors of production and particularly in the mining industry, certain issues should be pointed out. They include the difficulty or failure to inspect and run company practices related to outsourcing processes and the deficiencies in workplace health and safety policies, which have led to a considerably higher number of unreported workplace accidents. Especially in Brazil, the case studies show a closer affiliation to the rationale imbued in and tangential to regulation policies and the violation of human rights in mining activities. The field has proved to be

challenging given the strong influence exerted by transnational corporations and their contractors on mining areas.

Despite national and local differences, a few similarities and distinctions between the case studies should be considered, particularly with respect to working conditions, the mining industry's policies on fringe benefits and wage incentives, environmental issues, and corruption practices, listed as the project's initial questions. Next, we mention a few points that should be looked into in greater detail.

Regarding benefit and incentive policies, we have found: (i) the lack of records showing benefit and incentive policies are extended to outsourced workers by transnational corporations; (ii) flawed or missing corporate social policies in contractor companies; (iii) different policies regarding fringe benefits and wage incentives for transnational corporation employees and outsourced workers; and (iv) failure by affiliates and transnational corporations to provide more detailed information on how they draw up corporate social policies which go beyond the market's rationale and are oriented towards the needs of workers involved in the mining chain of production.

Given the transnational corporations' relationship with the judicial branch of government, we have found that in some of the areas analyzed and particularly in Brazil workers have a hard time when it comes to having access to labor judges. Such complications stem not only from the massive number of lawsuits but also the incompatibility between local working hours and the judges' high local turnover, which factors tend to hold up court cases. In the short term in Brazil, now labor law has been reformed there may be a drop in the number of claims and suits filed by workers against transnational corporations because of issues related to a lack of evidence and workers' inability to afford lawsuit costs, under the new legislation.

Based on field observations, we found that in some areas, notably those where mining takes place, there is a labor-related law practice market that masks the actual employment claims. We have also found that in most cases judges fail to acknowledge the expansion of transnational corporations' activities is directly related to increased conflicts over land. Finally, we have also seen that the network of institutions representing workers' rights is either frail or non-existent. Where certain local bodies do exist (especially in several Brazilian cities), such as a Federal Police Bureau, Labor's Wage and Hour Bureau, Brazilian Social Security Institute etc., they are hardly efficient.

A case study conducted in Brazil shows the need for a stronger exchange between government agencies in charge of controlling transnational corporations' activities in their territories and International Courts and Organizations in order to further the criminal prosecution of transnational corporations' crimes that go beyond national borders and impact neighboring countries. Such cooperation, or exchange, is required to lessen the potential social and environmental impacts on the populations living close to mines. These impacts are caused by criminal practices such as illegal mining and clandestine ore trade, which violate the tax laws of the country and area at hand.

While, on the one hand, few case studies have found initiatives to improve labor and environmental practices among the transnational corporations analyzed, on the other, most of these studies also mention people hardly ever take action to fight for their social and environmental rights in mining areas. The studies also point out to a lack of public initiatives by local governments to make better use of funds obtained from the royalties paid by transnational mining corporations and thereby improve their communities' living standards. Finally, local governments do not seem to

put much effort into expanding the range of economic activities in their cities and the creation of wealth based on mining.

To sum up, we can say that environmental issues raised by mining activities carried out by transnational corporations in the areas studied are far from becoming the focus of attention by national states. Neither are such issues the subject of concerted efforts by local unions.

In the past few years, despite anti-globalization movements decrying the environmental and social atrocities practiced by transnational mining corporations to benefit the market, in the areas where they operate there remains a lack of information about the social and environmental damage they cause. There is also little or no local discussion about the major green issues that affect humankind as a whole. Additionally, transnational corporate largely manage to evade charges for human rights violations in the areas where they do business.

Now, more than ever, as globalization accelerates rapidly around the world, we must urgently come up with alternatives to global capitalism to tackle both the deepening social contradictions seen today and the impacts from privately-owned means of production and class conditions in contemporary capitalism. Today, despite all of the initiatives surrounding the so-called information and technology revolution, humankind is yet to achieve a post-mercantile sociability and capital's self-destructive tendency can still be seen throughout the world.

These case studies point out something Elmar Altvater calls the "nature-blindness of economics," a situation in which the market's disregard for or neglect of the environment contributes towards making nature submit to the violence of capitalism. Such obfuscation may allegedly be found throughout the entire organized civil society, particularly in some types of unions and social movements operating in areas where trans-

national mining corporations do business, and especially when we look into their local demands related to high-priority issues.

Most of the time, organized civil society bodies are contaminated by the spiel of transnational corporations and governments of various political slants (including those which are clearly populist), which advocate a peripheral development model based on the extraction of mineral commodities as the driving force of development. They claim mining creates jobs and wealth but fail to mention the major environmental and social damage for people in the areas where they operate, such as Latin America, and the impact on the planet's survival.

Finally, thinking about alternatives to the fossil industrial capitalism that comprises a specific energy model (Altvater) means once again bringing to the fore of debates a criticism of neoliberal globalization and the growing world disorder. It also means addressing the major issues which have been briefly mentioned in this introduction and are discussed in greater detail in the case studies. Such issues involve a criticism of the development model based on the extraction of commodities, the relationship between government and democracy in today's capitalism, and environmental and social issues that cannot be understood unless we consider the metabolic process between humans and nature as a part of capital's destructive system.

Adriana de Azevedo Mathis

Maria Luíza Pereira de Alencar Mayer Feitosa

PART I

**Case Studies:
Colombia, Peru, Argentina, Chile**

Territorial and collective rights in Colombian mining policy: Cerrejón and la colosa case studies

*Jaime Arias Restrepo*¹

*Natalia Ávila Escobar*²

*Álvaro Toledo Romero*³

*Lucía Torres Ariza*⁴

*Laura Escobar Arango*⁵

Introduction

Within the framework of the research project on Company and Human Rights of the Latin American Graduate Consortium on Human Rights, which intends to advance applied research, academic collaboration and the exchange of information on the impact that extractive companies have on human rights in Latin America, in relation to Colombia, the issue related to social impacts and situations of risk and vulnerability of human rights was studied in two of most emblematic cases of the country's extractive sector: the Cerrejón coal complex and the La Colosa gold mining project.

The first one, Cerrejón, was selected based on the criterion of representativeness of the value chain of the mining cycle. It is a mine located in the state of La Guajira (one of the poorest in the country), with over thirty years of exploration. However - as we will see on the follow-

ing pages - throughout its trajectory, the project also generated several rights violation events, which led indigenous and black communities affected to report them to the National Judiciary; these complaints involve not only the extractive company, but also several environmental, mining and territorial entities of the Government.

Due to its importance within Colombia's large mining policy, the other case chosen for this study is gold mining in La Colosa. In fact, the multinational company Anglo Gold Ashanti and its exploration initiative in the state of Tolima, constitute a clear sample of the current national policy for large-scale exploration.

In both these cases, the research and analysis presented below started from indispensable elements, according to each one of them. Following that rationale, in the first, the right to prior consultation of ethnic communities, the process of involuntary resettlement of populations and the environmental impact were taken into account; and, for the second, territorial ordering, popular consultation, social investment and transparency and social uncertainty in the exploration phase were considered.

For this reason, the integral reconstruction of the problem was made not only from the bibliographical and documentary review of each case; but also from fieldwork that allowed the incorporation of undocumented information and events into the study. To this end, meetings were held with communities, leaders of social organizations, civil servants and, in the case of Cerrejón, Company employees.

Thanks to the survey of a sufficient collection of information, we were able to develop more complex thematic characteristics of analysis, ensuring with them a comprehensive case study. This, in turn, made it possible to obtain a broad look at the social, territorial and historical context of mining processes, avoiding an instrumental assessment of

public or sectoral mining protocols regarding human rights, prior consultation procedures or environmental assessment.

Therefore, in the development of this research, methodological aspects of interdisciplinary work are applied, from sociological and environmental perspectives of mining; including territorial and judicial - with regard to constitutionality and relief actions), which make social participation visible in the cases studied. All this in order to carry out an omnicomprehensive and critical reading that would lead to a complete diagnosis of the human rights situation in both processes.

This study does not intend, however, to exhaustively assess the performance of companies or the control exercised by the institutional power within their obligations in mining concession contracts. The aim here is to achieve an understanding of a context of assessing the risk or the human rights vulnerability of the communities affected by these projects. Making sure - of course - that the violation of rights is visible when this occurs and to give voice to the complaints found, also offering a series of recommendations to improve such situations.

This is how this work is presented, bringing together the results of a nearly two-year research in relation to the historical configuration of fundamental rights vulnerability, evidenced by the update that the new Political Constitution of 1991 and other norms imply, without having yet found a way to develop it in normative and regulatory instruments. That, analyzed in specific cases of resettlement of Afro-descendant communities, as well as in the reflection on the problem in the definition of areas of influence, to consider a historical and territorial context; the difficulties of prior consultation on the achievement of rights; the transnational company in relation the role of the Government; and the dissemination and access to information on a mining project. These issues are addressed

around the articulation between territorial planning and mining planning as a transversal axis of risk and human rights violations.

1. Large-scale multinational mining and territorial planning

1.1. Territorial realities and planning for large-scale mining

Initially, as a concrete reference to the previous analysis, we will consider the municipality as the holder of the territorial planning power, in conformity with Judge Rojas⁶. The fragility of Colombia's municipalities was accentuated by the approval of laws with a centralist tone. For this reason, "Colombian presidentialism, adapting to the needs of the municipal system and the fragility of the intermediate sphere, strengthened and intended to become an alternative to decentralization"⁷ (Constitutional Court, Judgment C-123, 2014).

In this sense, the current form of exercise of the policy of large-scale mining projects in the country could be interpreted under the neoliberal principles, since the Government disengages itself from the fundamental factors of the Federal Government-Municipality articulated planning, from which to conceive a territorial model for local basic social needs, in terms of infrastructure, public services, health, education and employment, among others. This has consequences in the chaotic transformation of the municipal productive structures by the economic forces, triggered by an unregulated large-scale mining project (in relation to labor, demand

6 Justification for the vote of Judge Alberto Rojas Ríos in Judgment C-123, 2014.

7 Justification of the votes of Judges Alberto Rojas Ríos and Jorge Iván Palacio in Judgment C-123, 2014.

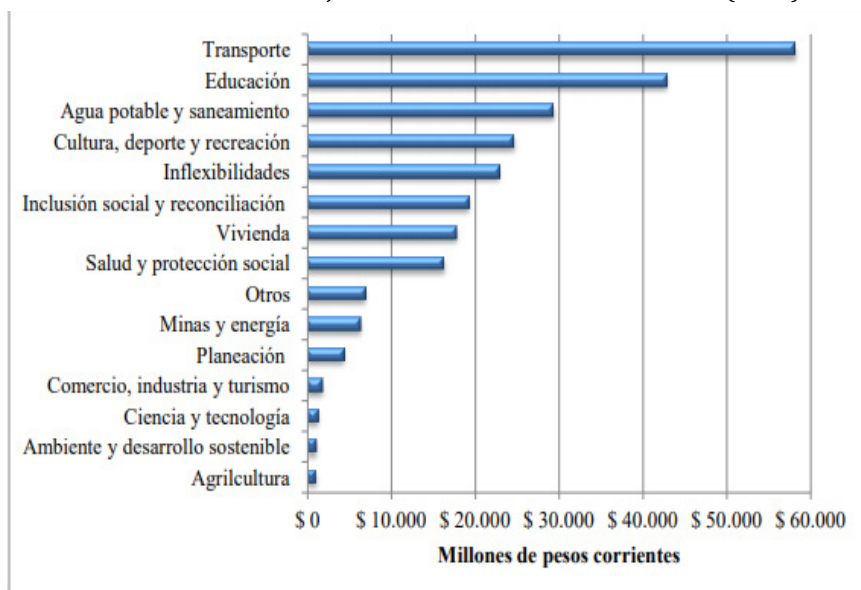
for goods and services, governance, public investment of benefits etc.), placing the local territory according to the private mining model.

Under that rationale, the national mining policy is seen simply as a revenue-generating activity, of economic consideration and, also, assumed regionally and locally, ignoring the special condition implied by three elements: strategic planning of a non-renewable resource, the Federal Government-Municipality articulation and soil-subsoil synthesis.

The problematic context mentioned above shows, in the case of Cerejón, how the territorial evolution is marked by the mining project. In 1954, the Intendência Nacional de La Guajira (Decree 1824, of 13 June) was created, with capital in Riohacha and the population of Uribia as a center for indigenous affairs. Later, through Legislative Act 1 of 1963, the state of La Guajira was created. In other words, from the state's fifty-five years of legal existence, for forty of them it lived with the mine, which began its exploration phase in 1977. It also identifies a new state institutionality in the face of a historic tradition of indigenous and black communities, which serves as an environment for the mining project.

Currently, coal represents 42.4% of the state's GDP and, expanded to the mining and quarrying sector (including hydrocarbons and other minerals), 55%; followed by (very correlated with the previous one) the industry of social, community and personal services that occupies a 14% rate. This value is even more relevant in the economies of the main municipalities under economic-territorial influence of the mine: Barrancas, Hato Nuevo and Albania, which gives an idea of the importance and dependence of the mining activity developed by the municipalities in the region, where there is no integrated plan for mining-territorial development that takes this reality into consideration.

Figure 1. Value of projects approved per industry for five municipalities in the area of influence of Cerrejón 2012-2015. Source: Fedesarrollo (2016)⁸.



Fuente: Reporte Avance Ejecución SGR - septiembre 15 del 2015.

In 1984, the Colombian Agrarian Reform Institute constituted the Middle and Upper Guajira reserve, being the largest in the country, as one of the main recognitions of ethnic rights to date. Then, it defined an area of 12.994 km² as the territory of the 27 indigenous reserves, currently recognized by the Government through the Ministry of the Interior, which is equivalent to 62% of the territorial space, where mining titles with reserve areas were overlapped in 115.4 km². The reserve has a population of 273,814 inhabitants, which corresponds to 29% of the demographic density of the territorial entity.

⁸ Figure taken from the report *Tax contribution from the mining operation of El Cerrejón to public coffers and tax status of the territorial entities in its area of influence in the state of La Guajira. La Guajira 2000-2014*, Fedesarrollo 2016. Available at: http://www.repository.fedesarrollo.org.co/bitstream/handle/11445/2970/Repor_Febrero_2016_Fuentes_y_Delgado.pdf?sequence=3&isAllowed=y

Nonetheless, the areas with presence and transit of indigenous communities continued to be much larger, and instruments such as prior consultation with these ethnic groups are implemented under the figure of direct impacts and not as an integral consideration of the territory and, in municipal development plans reviewed, there is no link with mining planning.

This reality is assumed by the company in La Guajira from its environmental management plan, its human rights policy and its Corporate Social Responsibility (CSR) program; but, as in the case analyzed for the exploration phase of La Colosa in Tolima, there is the absence of a clear and formal mechanism for articulating the PTO with development planning and territorial planning.

This constitutes structurally a risk to the rights of communities, expressed in citizen participation for the construction of their development plans and territorial ordering, as warned by some magistrates of the Constitutional Court⁹ (Judgement C-123, 2014). This reveals the current conflict between ordering soil based on the “productive vocation and the priorities established by the inhabitants of the territories at the local level” and “the decisions regarding the concession of mining titles” made by the Federal Government, which rationally should be solved under the articulation and complementarity mechanisms provided for in the standard, as was analyzed in the previous chapter. However, the situation is not limited to the problem of mining titling, but includes the lack of nation-region development policies in the mining model.

Although this complex situation arises in particular scenarios, observed in the issues related to resettlements, previous consultations, impacts on air quality and areas of influence - identified as potential

9 Observation of vote by Judges María Victoria Calle Correa and Luis Ernesto Vargas Silva.

circumstances for the violation of rights, according to data that will be mentioned in later lines -, according to the present analysis, the projects have a structural deficiency component in the territorial planning linked to the ordering of the subsoil.

1.2. Empirical evidence of soil-subsoil dysfunction in La Guajira

One of the most sensitive social problems identified in relation to the Cerrejón mining complex was that which refers to the transformation of the socioeconomic and environmental structures of the communities in their territories of origin, whether due to the advancement of the mining operation or the effects of its contamination. These issues were developed through land purchase mechanisms or through involuntary resettlement processes. A historical review allows us to establish that, since the beginning of the mining operation, in the 1980s, these impacts have been of great relevance.

Recently, the advancement of jurisprudence has made three processes of involuntary resettlement known as: 1) Patilla and Chancleta, resettled communities, considered in Judgement T-256 of 2015, in which Afro-descendant communities are recognized as the subject of collective rights, 2) Roche, a resettled Afro-descendant community, which is currently in the process of prior consultation - like Patilla and Chancleta -, 3) Tabaco, an evicted and non-relocated community.

To illustrate the risks of human rights violations in the activities of multinational mining companies and the Colombian State, the previous cases were analyzed. The information presented in this chapter was obtained from visits by the group of researchers from the Universidad Externado de Colombia to the resettlements of Patilla, Chancleta and Roche, in the municipality of Barrancas, in which interviews were conducted with

community leaders and representatives, public officials and with the Land and Resettlement Management of the mining company Cerrejón.

In this approach, the historical tensions about social participation and the process of recognition of communities as subjects of law, in relation to the mine and in a broad territorial context were found; which forced us to adopt a structural view, to better understand the meaning of territorial transformations, as a starting point from which to try to explain the current conflicts.

The communities recall the arrival of the mining complex in 1976, describing the way in which the construction of the first camp began in the region next to the village of Tabaco: upon its arrival, the workers of the consortium toured the land to collect samples, hired people to build the camp, but - according to them - there was no socialization on the mining project. “They arrived saying they would make samples, and they didn’t ask for permission for anything. They arrived with their machines and dug (...). In the end, that was when access to land started to get difficult ”(Roche Community, 2017).

In the beginning, when people opposed to it, they paid to enter the properties. Then, the purchase of land on the outskirts of the villages meant limiting the mobility of the residents of these communities, with authorization from the owners of the properties. This weakened their own economies, which, added to the migration generated by the search for services such as education - the villages only had elementary schools -, which also caused the weakening of the territory, which had a reduction in its population (Patilla Community, 2017). The Center for Research and Popular Education (Cinep, 2016) reports on how the land was acquired:

There were several company’s operations and modes of acquisition of properties - the main ones included buying and

selling, buying and selling in the community and common share, auction, expropriation, declaration of public utility, domain transfer by solution or cash payment and allotments. In 1982, the company started to make purchases and sales in common and equity sharing and in 1992 the corresponding subdivisions were made. The dynamics of privatization of access routes to the municipalities was also presented, which made the interchanges and transport routes that the local communities carried out and used become obstructed and, in many cases, eliminated (p. 15).

This allows us to consider that this process had not only an abstract impact on land possession, but on the entire social and productive structure. In this sense, it was necessary to reflect deeply on the relationship between pre-existing social territorial forms, their incorporation and recognition in the state structure, and the short and long-term planning of the mining project; because that would be the structural fragility that makes communities' rights vulnerable in the process of changing land use and transformations in productive structures and the distribution of benefits in the mining value chain.

In this case, for example, the cultural and material conditions developed by Afro-descendant communities in La Guajira have not achieved sufficient appreciation as heritage of the same Government. This can be seen in deficiencies related to the recognition of property titles, access to education, public infrastructure, access routes and economic security, among other aspects mentioned by the community. In other words, it is a "low value" territory in negotiations for acquisition and change of use, and an unclear distribution of mining income, as part of its value chain. It should be noted that the situation mentioned occurs under a process of valuation of subsoil and a devaluation of soil.

This is evident in the road disintegration and the scarce connectivity between the urban locality and rural settlements, the reserves the indig-

enous territories that form the local area, which becomes a limiting factor to achieve the social and economic development of the municipality. The poor conservation of the roads makes it difficult to access rural settlements, preventing social, economic, institutional and political flows from being carried out normally. For example, if a person residing in the city of San Pedro wants to study high school, this person must go to the urban area, facing serious difficulties in transportation and communication to establish this social bond.

As considered in the case of La Colosa, in Cajamarca, these situations would require a special type of planning, since the strong mining territorial transformations are not included in a parallel territorial planning process. In this sense, for the case of Cerrejón, these situations are related to the expansion of the project's mining areas in which there are also uncertainties regarding the factors of mineral reserves, transferred to territorial planning and communities, such as doubts as to their benefits in the process, extractive activities and participation in the wealth of the value chain.

In the statements collected from former residents of the villages of Patilla, Roche and Tabaco, the weakness in the forms of land tenure is reiterated, in an initial moment, when the plots were acquired individually. Most inhabitants owned the land, but did not have deeds of ownership.

They began to deceive people, they bought hectares, twenty thousand pesos (...). For me, for two hectares, they paid a million pesos (...). Then, to win people over, Cerrejón came and offered a bus, so they wouldn't need to walk. (Roche Community, 2017)

In 2000, they began to request the registration of the properties. Then, they made a purchase and sale and negotiated with the company. The older descendants had a document issued by the parish. For these lands, they called it the

Agustín Codazzi paper [name of the institute of registration authority in Colombia], but the whole lot was included. So, that was how it appeared. (Patilla Community, 2017)

They arrived at the Tabaco community, and offered ridiculous prices. The first ones who left there, from Tabaco, gave in to pressure from those who wanted to expel them. With some of them they negotiated, with different prices. There was a group that remained and that today is the Social Forum for Reallocation of Tabaco. Sales are from before 1995. (Tabaco Community, 2017)

On the other hand, it is the residents who decided not to sell in this first stage of land acquisition those who refer to territorial changes, such as their mobility within the territory.

The river was also bought by them. When we lived there, we went to the river to fish and the [company] watchmen who were there called the police and took us in detention. For me, once I was there with Tomás and they said: - “Come here”. - “You come here” - I said, because I was not in mine land, - “I was inside the river and this is not yours”. Then I was afraid. (Tabaco Community, 2017)

This territorial fragility - which can also be seen in reports about the disappearance of other communities - “Manantial, in 1985, and Oreganal, in 1992, were the object of a silent expropriation” (Múnera, Granados, Teherán and Naranjo, 2014, p. 58) - slowly ended the territory. After several years of buying, few families were left who would later enter into a negotiation process with Cerrejón for their resettlement. The fact that this is a fairly unknown story is one of the causes of the conflicts that we see today about the recognition of people who should be part of this process, as well as the forms of compensation.

Although information about the communities existing before the mine and its resettlement or displacement processes is very limited, a reconstruction carried out by Cinep, based on the testimony of some of the current inhabitants, refers to seven: Tabaco, Oreganal, Sarahita, Manantial, Patilla, Roche and Chancleta.

From this historical perspective, what has happened since the company's arrival is the disintegration of a territory from the acquisition of the land necessary for the implementation of the mining project, through various mechanisms. A retrospective look of part of the current inhabitants of the resettlements reveals affection for the territory, which shows a negative assessment of the changes that the arrival of the company has generated in their lives.

This is confirmed through the revision of the municipal development plans, in which it is evident that mining is not part of long-term planning, nor of the instruments of territorial planning. Although the planning identifies the need for territorial integration with other municipalities and the local state body, structural and territorial planning is not seen since the closure of the mine (Barrancas Municipality, 2002).

Also within a historical perspective of recognition and rights of ethnic communities, according to the document *La Visibilización Estadística de los grupos étnicos colombianos* (The Statistical Visualization of Colombian Ethnic Groups) of the National Administrative Department of Statistics (DANE, s.f.)¹⁰, under different identification criteria, from a historical record of eleven national censuses, only four of them include the black population of the country: that of 1912, with 322.499 persons, equivalent to 6.36% of the national population; that of 1918, with 351.305, equivalent to 6.0%; 1993, with 502.343, equivalent to 1.52%; and that of

¹⁰ https://www.dane.gov.co/files/censo2005/etnia/sys/visibilidad_estadistica_etnicos.pdf

2005 with 4,311,757 persons, which represented 10.6% of the Colombian population. Censuses of the years 1905, 1928, 1938, 1951, 1964, 1973 and 1985, on the other hand, show no record of this population.

It should be noted that the last two registered censuses (1993 and 2005) were after the 1991 Constitution and the last one (2005) was carried out after the implementation of Law 70, of 1993, which included transitional article 55 of the Constitution of 1991, recognizing the territorial, political, educational and environmental rights of Afro-descendent Colombian peoples. The criterion for ethnic identification in the 2005 census was cultural recognition of customs and traditions or physical characteristics, such as belonging to indigenous communities, Rom, Raizal in the San Andrés Archipelago, Palenques de San Basilio and Colombian Afro-descendants, blacks, mulattos or other Afro-descendants. For the state of La Guajira, the black population determined by the census was 14.8% 11 of departmental population. The Population Census carried out between the years 1777 and 1778, considered by many to be the most complete of the 18th century, reported a total population of 828,775 inhabitants, with 15% indigenous and 5% black.

Also, we can highlight that the lack of planning of mining activity over territorial coverage, in the case of Cerrejón, and that thirty-five years later it also appears in the case of Cajamarca, which emerges in the current arguments of the communities, regarding specific situations of resettlement, contamination and disruption of the territory. Therefore, human rights protocols to guarantee individual and collective rights, in the development of these specific processes, can be resolved through negotiation and participation mechanisms, such as prior consultations, CSR practices, the redefinition of areas of influence and through court

11 Source: DANE, 2005 General Census.

sentences. It is necessary to rely on processes of articulation of territorial planning with the planning of mining activity with deep state intervention, in order to guarantee rights in a structural and sustainable way.

1.3. Mining resettlements and socio-cultural transformations.

Cerrejón, throughout its mining activity, carried out several resettlements of the Wayúu and Afro-descendant indigenous communities. This happened with families that did not agree to sell to the company, despite the different forms of pressure exerted by it. The families that remained in their properties, with evidently limited environments, started negotiation processes for their resettlement.

As Cinep (2016) mentions, there were eleven resettlements and displacements caused by the mining activity of Cerrejón, between 1989 and 2001. On the other hand, the company reports only five cases of resettlement, even when it was not possible to verify this data or the terminology applied. The first is the resettlement of the Rocha community in 1997 (but only in 2002 did the Barrancas City Hall carry out the topographic survey). In 2004, after the change of ownership of the company, this process was interrupted and continued with individual purchases. In 2006, the rapprochement and negotiation with the community resumed and, in that same year, the negotiation table was created, with the participation of community leaders from Patilla, the Municipality of Barrancas, the Municipal Public Prosecutor's Office and representatives of Cerrejón.

In 2008 the process begins with Chancleta and, in 2009, with Las Casitas. The construction of resettlements begins with Roche in 2011, continues in 2012 with Patilla and Chancleta, at the end of that year (Cerrejón, 2017).

Resettlements of Afro-descendant communities according to the company Cerrejón.

Community	Total families registered for relocation	Families that signed Agreements	Pending families
Roche	25	23	2
Patilla	46	46	0
Chancleta	57	47	10
Tamaquito II	31	31	0
Las Casitas	31	20	11
Total	190	167	23

Source: Cerrejón (2017).

This scenario reflects problems related to the difficulty of accessing coherent information about resettlement processes and the fragile and fragmented monitoring carried out by state institutions. The company uses a technical perspective of the process, based on the World Bank's guidelines named *Social and environmental performance standards of the World Bank's International Finance Corporation for resettlement* in the absence of a national policy on resettlement and a specific territorial planning framework linked to the planning the mining activity, and considering the need to make a resettlement only when all possibilities to avoid it have been exhausted and when it has been decided which would be the most viable option to carry it out and where. As stated by one of its employees: "Before making the decision, a technical evaluation was carried out in which the impacts of mining activity on the environmental level and the presence of coal to be explored in the long term are analyzed" (García, 2017). That can be problematic for communities, which

are subject to the company's deadlines, seeing how their internal conditions and those of their surroundings vary during the process.

Thus, the company claims that the resettlements of Chancleta and Patilla are carried out to avoid future environmental impacts, generated by the advance of mining in other areas (García, 2017). However, this statement ignores the previous acquisition of land in the former Patilla and Chancleta co-regiments and the neighboring settlements. We can identify two additional issues with that: on the one hand, the rigidity of technical mechanisms for defining the population to be relocated while their conditions and expectations are variable; and, on the other hand, the divergences of appreciation regarding the diagnosis of impacts and the assessment of their living conditions and, therefore, the forms of compensation proposed by the company.

The company defined the following aspects as rights of the relocated people: 1) Payment for land and for improvements at the price of commercial tax defined by a market institution recognized in the area and a house on a 300 m2 lot with a built area of 80 m2 with public utilities; one hectare of land for each house, for agricultural activities ; 2) Twenty million per (each) family for the development of a new or complementary activity to that carried out in the place of origin ; 3) Compensation for material damages, moral damages and emerging damages due to resettlement (includes compensation of seven minimum wages, for larger losses that can be proven through documentation); psychosocial support for people of African descent during the resettlement process.

In this case, the values were defined by the real estate company of Santa Marta or Valledupar (includes the recognition of a UGC structure, a standard measure that defines the agricultural funds, standardizing goats, pigs, cows etc., and from which additional resources are delivered to acquire

land that would allow them to establish the production of the same number of animals that they had in their place of origin); recognition of 150% of the land value as additional compensation (García, 2017).

In this sense, interviews with members of these communities make clear the feeling of injustice of resettled residents - in face of what is recognized by the company - when they manifest the difficulty in maintaining a dignified life with what they received:

They have violated all of our rights, they say they have already settled the livelihood issue. But you know... A family cannot live on one hectare. (Roche Community, 2017)

In my case, I was the last to leave, I was expropriated. They took everything I had. We were demanding our rights. I was demanding a piece of land to continue with my activity, which I knew how to do, which I inherited from my grandparents. I didn't want to lose the little that I knew how to do. They refused, they told me to sell these animals and get out of there, because they needed the land. As I did not accept their arrogance, they intimidated me with Esmad, took my daughters in handcuffs. (Roche Community, 2017)

However, support for productive projects in general does not seem to have met the expectations of maintaining their own livelihood. As a community member reports:

When they arrived, there showed some support, but when we arrived there with a little money - in my case, I received fifty million pesos in 2012. With my productive project I bought my house, although I have my house, it cost twenty million, which was the limit, but my house grew in value. El Cerrejón wanted us to invest in agriculture. We can't do that here, we had the rainy season there, but here, we plant and if

we don't irrigate every day, the plantation dies; because this land was used for cattle breeding and the land is dry. There, in Patilla [Nuevo] there are two people who plant a lot, but there is not enough for forty-six to irrigate their crops. (Patilla Community, 2017)

Changes and transformations for new working conditions are not perceived by part of the community as an improvement in their quality of life. For them it does not represent economic stability:

What the company offers does not improve quality of life. They talk about jobs. What jobs? They need preparation that communities do not have. So, what they do is destroy the social fabric, because if residents work in agriculture, as a farmer or peasant, becoming a machine operator is a completely different thing. (Ojeda, 2017)

Regarding the moral damage aspect, the indicators are not clear, as there is no research and evaluation process on this dimension. As reported by Ojeda:

The way in which the mining expansion process is taking place also generates psychological processes that are passed on from generation to generation, a resentment, because I have already noticed when the residents participate in the meetings, they show anger towards the company. In the case of Roche, the cemetery is there, the cemetery has to be relocated according to its uses and customs - the concept of a burial vaults, for example, does not exist. The cemetery is there and they are exploring around it. (Ojeda, 2017)

In the same sense, there is no recognition of the collective dimension of the emotional damage that has been generated with the change of territory. Wilches-Chaux (2014) discusses this fact with what is called *in-*

dicators from the soul. A notion that includes tranquility, solidarity and security. On this aspect, there is also a limitation, represented in the individual assessment of these damages and not of the existing community, for which it would be necessary to have a territorial planning framework.

1.4. Tension between agricultural and mining activity

1.4.1. Agrarian structure, large transnational mining and the government

Considering all of the above, it is clear that the consultation processes generated questions about the role of the Government in rural development. Thus, in the cases analyzed here, that is, both in Cajamarca and in the region of La Guajira, it is not difficult to observe a Government that is not very active in this regard. So, it is evident that the position of the peasants demonstrates a discontent with the passivity of public authorities, which allow the appropriation of these spaces by private actors. Linked to this, a representative of the peasants of the locality of El Diamante, faced with the study and possible gold exploration of the company Anglo Gold Ashanti, states that they had to:

Believe in whatever the company said, since the Government never emerged (...). They come to solve people's problems and the Government fails to appear; that is why we are neither in favor nor against these mining projects, because if quality of life is improved, what we have left is to believe in them (Local representative in El Diamante, 2017).

In his opinion, it is the Government's fault, because the inhabitants of the regions affected, directly or indirectly, by mining projects have no alternative but to accept the activities resulting from mining, to the point that, if the multinationals cause some damage, consider that the Govern-

ment should be held responsible, based on failure to fulfill its obligations to promote and protect human rights.

There, community disintegration processes were also noticed due to the partial evasion of community members or a non-collective reallocation of all group members, generating processes of rural-city migration, due to the preferences of many families to relocate to urban areas and larger cities.

In the same context, there were also families in the municipality of Cajamarca displaced by the violence, survivors of the massacre in Potosí in the town of Anaime ¹² (National Center for Historical Memory, s.f.), and also on relocating families to places where they were later evicted by the FARC guerrillas, having to return to their plots in El Diamante.

Despite all the information collected, the field study carried out did not confirm the previous versions on the purchase of land. However, it was possible to highlight the existence of potential risks arising from the absence of state agencies responsible for monitoring vulnerable communities in the face of armed conflict, land restitution processes, access to financing for their agricultural models, among other aspects. These conditions call attention to the lack of analysis of the territorial relationship between the effects of the armed conflict and a large-scale mining project, also considering the lack of clarity on the ways of action and peace building in cases where land restitution coincides with victims and multinational mining companies, as can be seen in the jurisprudence of the Constitutional Court, especially in Judgement C-035, of February 8, 2016¹³.

¹² According to the National Center for Historical Memory: “(...) This fact caused the displacement of inhabitants of the locality”. <http://rutasdelconflicto.com/interna.php?masacre=532>

¹³ Judgement C-035 of 2016. In addition to problematizing the overlapping of lands destined for restitution to victims of armed conflict, in accordance with Law 1448 of 2011, and the strategic mining reserve areas, over which the second interest prevails on the situation of the victims of the armed conflict in Colombia.

Finally, with regard to the processes of land purchase by Anglo Gold Ashanti, it is possible to verify that the granting of study and exploration rights on the soil - by the Federal Government - has direct consequences on the soil regime. “Thus, it can be concluded that fragmentation in soil-subsoil planning is not functional from an empirical point of view (...) due to the evident fact that the extraction of mineral resources from the subsoil necessarily requires an intervention in the soil”¹⁴ (Constitutional Court, Judgment C-123 of 2014).

In this case, the non-participation of the Government in the planning of geological uncertainty, specific to the exploration, demonstrates that, by not defining the gradual stages in the probability of realizing the certainty of the ore deposit and proceeding to the planning and evaluation of the exploration phase, it generates evident territorial effects, since the conditions for assessing the mining project would be privileged over the planning conditions of land uses and, consequently, providing distortions in the possibilities of territorial complementarity, such as the dependencies of mining observed in the state of La Guajira.

According to the Cajamarca Spatial Planning Scheme (EOT) (2007, still under update), 24.28% of the land was dedicated to agricultural use and 19.21% to agroforestry use. These rates are only surpassed by the protection and conservation lands that represented 32.43% of the total area of the municipality. The agroforestry use includes “the altitude range of 2.600 to 3,000 MASL”¹⁵ (Municipality of Cajamarca, 2007, p. 85).

The mixed production system comprises cassava, beans, potatoes, peas, fruits (passion fruit, garnet and tree tomato) and pastures for cattle in areas not used for crops equivalent to 10,343.39 ha. The system charac-

14 Observation of vote by Judges María Victoria Calle Correa and Luis Ernesto Vargas Silva.

15 Recently, the zoning of *páramos* restricts agricultural activities.

terized as specific activities comprises permanent coffee and associated crops, such as orange, sycamore and banana, in addition to productive forests with private cultivations of pine and eucalyptus equivalent to 2.974.78 ha in the municipality (Cajamarca, 2007, p. 137).

During the research carried out in Cajamarca, it was possible to observe how the advance in gold mining in La Colosa began to generate changes in traditional agricultural practices, with the weakening of some agricultural sectors being evident, the relative increase of others and an apparent dynamization of industries related to mining, such as restaurants, transportation, accommodation, commerce and services in general.

According to the aforementioned EOT, there has historically been gold and silver mining in this municipality, in the pre-Columbian era and then, with the arrival of the Spanish:

Many indigenous tribes that occupied their territory stood out for the exploitation of gold and silver, as well as for their processing. The main reason for the conquering of the territory of Tolima was its mineral wealth, especially gold and silver, an activity carried out in 1544 by Captain Hernán Venegas Carrillo (Municipality of Cajamarca, 2007, p. 41).

The EOT also highlights that there are gold and silver reserves in the municipality, as well as other metallic minerals, such as mercury, antimony, zinc and molybdenum. Also, reserves of non-metallic minerals, such as graphite and talc, in addition to rocks and construction materials, pozzolans, gravel and sands. Likewise, it is possible to find activity in gold deposits, which has been progressively decreasing “due to the depletion of mineral resources or lack of investment capital” (Cajamarca Municipality, 2007, p. 43). It is important to highlight, in this regard, that during the visit

to Cajamarca, the current existence of approximately three hundred families that are dedicated to the mining of precious materials was reported.

The EOT adds that, considering the large number of “old explorations and events, an important gold-bearing potential that requires a detailed assessment by public bodies (Minercol Ingeominas) and private investors, which could constitute another important aspect to the region’s economy” (municipality of Cajamarca, 2007, p. 43).

Thus, we can see that on the basis of the ordering and development of the municipality, the predominant activity is agriculture and, although mining is identified, the municipality’s EOT does not consider it as a defined land use, although it is recognized that gold potential, conceived as an industry that could economically boost other activities, such as agricultural, cattle raising and tourism. Although an articulation is conceptually foreseen, in practice there are no mechanisms that can establish binding conditions for the assessment of mining projects linked to the territorial planning and concrete mining planning by the national mining institutions.

Also, the weakening of the agrarian sector is seen mainly in the transfer of labor from agriculture to mining and related industries, as well as to other major infrastructure works, such as the construction of the La Línea tunnel and the duplication of the road between Ibagué and the high areas of La Línea.¹⁶ In the words of the Planning Secretary of Cajamarca, the labor that was dedicated to the field “migrated to the project, and this caused the daily rates to increase, because there was an evasion of the agricultural sector for the exploration and the tunnel, and those who worked there found it difficult to return to the field (Cajamarca Planning Secretary, 2017).

¹⁶ National infrastructure projects to improve national road corridors, located at the junction of the Central mountain range, in the states of Tolima and Quindío.

Considering this, it is possible to contemplate the existence of a weak agricultural production structure, with low wages and precarious work conditions, in addition to limitations in social security conditions. This, adding to a complex territorial scenario in the relationship of the place with the departmental and national planning, as demonstrated by the construction of a strategic road corridor in the communication of the center of the country with the west and the sea port of Buenaventura, defined by national order in the National Council for Economic and Social Policies (Conpes) and with environmental licensing by ANLA.

To corroborate this, in the words of the legal representative of the Association of Cajamarca Bean Producers (Aprofil):

The presence of the mine did affect us. But not just the mine, also the La Línea tunnel, the duplication of the road, because this people returned to countryside older. It is us, the old people, who work the fields. Young people realized that working in the mine would give them paid vacation, medical insurance, and they became lazy for our work (...). They make verbal contracts, we don't pay social security or anything. It became expensive. Before the mines, we paid fifteen thousand, including food and accommodation. Now, we are paying, at least, thirty thousand, with food and accommodation, which add up to at least another fifteen thousand. That is, it is fifty thousand pesos a day, more than the minimum. It is expensive and without Government subsidy, it is difficult. (Aprofil Representative, 2017)

The growing demand for labor by the mine is also confirmed by Anglo Gold Ashanti, stating that between 2012 and 2013 it was Tolima's largest employer (Anglo Gold Ashanti, 2014, p. 25). Also, it intended to generate two thousand five hundred direct and seven thousand indirect jobs, in the

construction and assembly stage of the mine; seven hundred and fifty direct and two thousand indirect during the operation¹⁷.

An apparent boost to the agricultural sector was generated due to the financial subsidies granted by the company to producer associations. According to Anglo Gold Ashanti, in its commitment to comply with international standards, one of its main activities is to support initiatives “to encourage the diversification of the existing economic activity, give preference to the products and services from local suppliers and contribute to their development when possible” (Anglo Gold Ashanti, 2014, p. 49). However, the fact that these subsidies were defined in a study stage, in which there was no improvement in the right of exploitation, generates social interpretations of intention in the direction of compromising a favorable opinion of the community for approval of the project, as expressed by several regional leaders. This without having defined an environmental study or popular consultation.

Now, as a reference to a situation of impact on land tenure, in the case of Cerrejón, one of the most important aspects to be considered in this historical process is perceived - the issue of land acquisition and purchase in the years of the beginning of the project, as this generated - and still generates - a constant indisposition in the communities. This is how the Wayuu leader of the Kamusuchiwou community describes:

In the territories where Cerrejón is currently operating, we lived there for some forty years and were evicted through public forces and machines, with a great deal of intimidation; we left and had a compensation - but not monetary, through improvements to very poor houses. We left the area they oc-

17 Information obtained from Portafolio. “What Cajamarca loses with the stoppage of the La Colosa project: Angelo Gold also suspends social programs in which he has invested 54 billion pesos in 14 years. The Mining Company did not explore a gram of gold” April 27, 2017. <http://www.portafolio.co/economia/lo-que-deja-anglogold-ashanti-en-cajamarca-505333>.

cupied, and migrated. And we arrived at the territory where we are now and we realized that this is part of the concession that the Government gave them, it is part of the mining reserve. And we have debates, concerns, because we want this to be resolved. Our proposition is that this area be added to the Upper and Middle Gujira reserve, but they say that it is very difficult, that this part is not their property, that it is a property of INCODER, INCORA, the Federal Government. The area where we are suffers a lot from contamination, because we are very close to the mine. The best place for us, in terms of water sources, was the land they now occupy. When they arrived we had no alternative but to migrate, we were forced to do so. These lots are not registered, were considered landfills and the reserve did not exist. The first reserve was created in 1983, and then expanded in 1994, and they arrived in the eighties. This remains unresolved. The National Land Agency are aware of our position in this matter. And nothing happens because there is a lot of apathy by the company, and we, as leaders, also demobilize and our only resistance is to say: “We stay here”, however, there is a lot of contamination, and our right to live in a healthy environment has been violated. (2017).

1.4.2. Limits between corporate social responsibility and the government’s role

According to press information, the multinational Anglo Gold Ashanti “made social investments for some 6 billion pesos between 2014 and 2016, focused mainly on strengthening the environment and its agricultural vocation”¹⁸. Likewise, the Planning Secretary states that “the agricultural sector has benefited from multinational projects, such as beef cattle breeding, strengthening agricultural production, promoting avocado cultivation, and supporting organizations such as Aprofil” (Plan-

¹⁸ *Ibid.*

ning Secretary of Cajamarca, 2017). In the field work, it was possible to verify the economic support to the Association of Avocado Producers of Cajamarca, Aguacatec, mainly with regard to the commercialization and certification of the product, as well as to the Association of Bean Producers of Cajamarca, Aprofil.

Around these supports, there is a concern among producers with a phenomenon known to them as “buying consciences”, that is, the search for publicity and support from the peasants for the company and its projects.

For the Municipality, the support is part of the “social licensing” that the company must build with communities. However, for the NGO Colombia Solidarity Campaign, this action generates a division in the community, favoritism towards the company and constant tension with the inhabitants who are against the project (Colombia Solidarity Campaign, 2013, p. 89).

These projects are also focused on various infrastructure sectors, since the company promoted the installation of home gas, improvements to the square, market, local school, the park and the municipal stadium, as highlighted by the Municipal Planning Secretary (Planning Secretary of Cajamarca, 2017). According to press reports, Anglo Gold Ashanti also supported the education sector, improving the infrastructure of classrooms and cafeterias, in addition to promoting training for young people. It also supported the health sector, in “improving infrastructure and delivering an X-ray and ultrasound room to the Santa Lucia hospital” and the sports and culture sector, making donations to the gym, improving community sports spaces and sponsoring the football team Deportes Tolima¹⁹.

19 Obtained from Portafolio. “What Cajamarca loses with the stoppage of the La Colosa project: Angelo Gold also suspends social programs in which he has invested 54 billion pesos in 14 years.

The NGO Colombia Solidarity Campaign (2013) considers that:

Although it is difficult to escape indirect links with the company, which has such a strong presence in the territory, the economic relations existing between the political actors chosen by the Cajamarca community and the mining company increase the risk of manipulation and control of democratic structures.

In that context, it is evident that the transnational company has an impact on territorial planning in the absence of government planning, putting the control and protection of the public interest by Government institutions at greater risk. There is a lack of institutional articulating function in the intermediary regulation between the nation (national interest projects) and the local territorial units, that is, the Government and the Tolima Regional Autonomous Corporation, Cortolima²⁰, which in view of the limitations of municipal entities and given the wide territorial impact of a large-scale project, would be obliged to intervene in the variables of articulation with regional development plans. This being the context in which Corporate Social Responsibility (CSR) activities do not have a clear reference for action to regulate and control the EOT, the Development Plan and the effective participation of communities.

In general, it can be said that this lack of articulation and organization of spatial planning instruments with large-scale mining projects reveals the limitation of tools to make constitutional warrants that favor food production over other activities (Article 65 of the Constitution).

The Mining Company did not explore a gram of gold” April 27, 2017. <http://www.portafolio.co/economia/lo-que-deja-anglogold-ashanti-en-cajamarca-505333>.

20 Decentralized body to foster sustainable development and environmental culture to promote the rational and appropriate use of the region’s natural resources, following in a proactive and participatory way progress initiatives, based on the principles of public ethics.

The effects of national decisions on the exploitation of subsoil resources, on the municipality's soil and on its territorial ordering, do not find a common planning mechanism within EOT. The La Colosa mining exploration project affects land uses, generating - directly or indirectly - productive transformation processes that could find positive solutions in a scenario of adequate planning.

1.4.3. Social participation - popular consultation

Popular consultations are participation mechanisms established in Law 134 of 1994, in compliance with the principles of participatory democracy, established in the Constitution of 1991 (articles 103, 104, 105 and 106). In Judgment T-445 of 2016, the Constitutional Court ruled on the validity of a popular municipal consultation on mining matters, based on the analysis of three criteria: first, the participation of communities in issues that could affect them; second, territorial autonomy; and, thirdly, the relationship between land and soil use. This consultation took place in the municipality of Pijao, Quindío, on July 9, 2017. 97.76% of the constituents voted “No” to the question: “Do you agree that metal mining projects and activities are developed in the municipality of Pijao?”

An evidence of the dysfunction of the mining model in favor of harmonization with territorial processes is approximately seventy cases of consultation in the country, nine of which have already been voted against mining and hydrocarbon projects, including processes in the municipalities of Cajamarca, Tolima, Pijao, Quidío, Jesús María and Sucre, Santander and Arbeláez, Cundinamarca, which makes possible the existing tensions

between the mining order²¹ that the national government promotes and its impact on land use in the territorial ordering of municipalities.

The peak of popular consultations on mining in the municipality highlighted the violation of the constitutional principle of territorial autonomy, which directly affected the municipalities, as it was not taken into account by the national government when making decisions on the development of mining projects in the their territories.

In view of the proliferation of requests to speed up these consultations on mining in the municipality, the reasons presented by the National Registry of Civil Status and the Ministry of Finance, on which jurisdiction should grant the resources for its realization, whether the Federal Government or the municipality, are seen by social organizations as a limitation to their occurrence. Under this contention, the authorities justified the suspension of several popular consultations on mining and energy planned in the country, between November and December 2017: El Peñón, El Carmen de Chucurí (Santander), Granada, La Macarena, El Castillo (Meta) and Córdoba (Quindío).

In this sense, a leader of the Ibagué Environmental Committee assured that there are fewer guarantees when the Government decides to delegate the responsibility for financing popular consultations to municipal governments, because they do not have the necessary budget to carry them out. Specifically on the Cajamarca case, he declared:

We make this assessment because last year, the mayor of Cajamarca, who was a miner, died - he passed away last year. He said that Cajamarca's popular consultation cost 600 million pesos. So, of course, it's a lot for a municipality, they

21 Tensions between subsoil use related to the Mining Code, specifically with regard to the provisions of Articles 5, Ownership of Mining Resources, 6, Non-alienation and non-prescription, 13, Public Utility, 37, Prohibition and 38, of Territorial Planning.

don't have the resources for it. In the end, the Registry said: "No, it doesn't cost all that money. It is approximately 50 million pesos. (Social leader of Cajamarca, 2017)

But, in addition to that, other types of actions appear to ignore popular will. For example, the demands presented, by means of a tutelage action, by the Ministry of Mines and Energy, arguing that these popular consultations generated a violation of the fundamental right to work of the people who work in the development and execution of these projects (Contagio Radio, 14 November 2017).

This position vis-à-vis popular consultations by the federal government was read by civil society organizations - who are in favor of holding consultations on mining - as a way of boycotting or extending these processes which, in the final analysis, would mean silencing public participation and disregarding territorial autonomy under the right to decide on their territories. that is what was said by community leader member of the organization *Conciencia Campesina de Cajamarca*, Tolima, who defines the consultation as:

"This is a time bomb, not just for Cajamarca, but for the country. To disregard the popular consultation in Cajamarca is to disregard the popular consultation in Piedras, Arbeláez, Cumaral, in the state of Meta, where they are being held. In other words, it is already a national problem. Another issue is that people are thinking about how to defend their territory, and continue to put up barriers. (Social leader of Cajamarca, 2017)

In any case, the importance of holding popular consultations is evident, both by popular initiative and those called by the municipal authority, so that the opinion of the communities regarding the megaprojects promoted by the national government is known. These are procedures

that enrich the debate and foster an increase in participation, from the territory, in national level decisions.

Now, on the debates about the binding character of popular consultations on mining - current and future - we must refer to the applicable law. Law 134 of 1994²² and Law 1757 of 2015²³ are normative instruments that establish that popular consultation is mandatory as a mechanism for popular participation. If the question submitted for consideration obtains half plus one of the valid votes, and provided that at least one third of the population of the electoral census participated. In other words, it is mandatory to respect the popular will, regardless of whether it was called by the president, governor, mayor or the public.

2. Social participation and access to information

In the case of the Anglo Gold Ashanti extractive project to explore one of the largest gold mines in the world, in Cajamarca, Tolima, access to information surrounding the project is an issue. In this sense, for example, the Tolima Environmental Committee, Conciencia Campesina, Cosajuca (Cajamarca Youth Socioenvironmental Collective) and a city councilor, agree to point out that the population knew about the gold mining project at the end of 2007, through a public statement made by the then President of the Republic, Álvaro Uribe Vélez.

Other versions speak of the previous arrival of the company Sociedad Kedahda, identified by the community as a Canadian company that

²² By which rules are dictated regarding mechanisms of popular participation.

²³ That is why provisions are made regarding the promotion and protection of the right to democratic participation.

was carrying out an excavation, as well explained by a member of the Cosajuca de Cajamarca organization, who worked at that company.

Before that, [Uribe Vélez's public statement] I was aware that there was a company, which they called "The Canadians" and that they were behind a mine, but let's say it was ambiguous (...). When in 2007, Álvaro Uribe says that, It was something like: "Ah! It is not Sociedad Kedahda, it is Anglo Gold Ashanti ". So, this was the moment of greatest tension, because before, although they were here, there was no First, it was not clear what mining was, and second, it was not known who the actor was. (Cosajuca, 2017)

This concern coincides with the Colombia Solidarity Campaign (2013) document in *La Colosa: Una Muerte Anunciada. Informe Alternativo acerca del proyecto de Minería de Oro de AngloGold Ashanti en Cajamarca, Tolima, Colombia*, about the arrival of AngloGold Ashanti (AGA) in Colombia. The NGO says:

AGA arrived in Colombia in 1999. The Colombian subsidiary of AGA was legally constituted in 2003, under the name of Kedahda, which allowed it to operate in Colombia secretly for several years. Kadahda was a direct subsidiary of two companies based in the British Virgin Islands, a well-known tax haven. (p. 27)

In this sense, Anglo Gold Ashanti announced, in a 2014 report, about the Kedahda Society, that it was not created with the intention of maintaining secret operations of the company nor with the intention of hiding and, therefore, that the change of legal person (as of today) "obeyed commercial criteria and sought to consolidate the name and brand of Anglo Gold Ashanti in Colombia" (Anglo Gold Ashanti, 2014, p. 9). Likewise, the company ensures that as a sample of the transparency in the communication of its activities with the communities and the municipal

authorities, in 2009 it held a public hearing in Cajamarca on the La Colosa project, to which all the competent authorities of the national, state and municipal spheres were invited (Anglo Gold Ashanti, 2014).

This company report is seen as a response to aspects that generated conflict and that were expressed in mobilizations by civil society organizations and movements. This was the subject of debates and influenced the outcome of the popular consultation in Cajamarca, in March 2017, without having observed a more systematic and reliable mechanism to accessing information.

Similarly, information about the stages and technical characteristics of the mining project is confusing, in contrast to the company's statements when it mentions public hearings and social spaces of the La Colosa project. On that regard, we have the experience and perception of the organization Conciencia Campesina, of Anaime de Cajamarca, in open socialization, dialogue or public debate scenarios, which manifest:

A large-scale mining project with a 40-year mining title that can be extended to 70 years. We ended up discovering that La Colosa would no longer be just La Colosa, but that it would be La Colosa Regional. Yes? Which were making platforms in the Anaime canyon, as well as in La Colosa, without disclosing it to the community. [At the end of 2009] The community acts up, calls the company and expels them from the region, saying: "You are not welcome here" and they socialize La Colosa Regional Anaime and say: "We are going to make platforms like this, which are holes like so and so. (Conciencia Campesina, 2017)

Continuing with the questioning of the information presentation process by the company, with the absence of a public authority and without explaining the legal process by which it was configured as a concrete project, with social, environmental and economic guarantee:

In this audience called by Anglo Gold in Anaime, they talked about La Colosa Regional, and said: “The La Colosa process is over; now we are going to focus here, at this point, which is the Las Ormas mall, which is a large reserve of water for the aqueduct of Anaime (...). Yes, in the socialization, the company said that and spoke about the Anaime-Atocha mining project, La Colosa Regional. This Colosa Regional project was to expand the project, expand it to other parts. Yes? Then, the community said: “No”. They drove them out. Anglo Gold went out the back door at that public hearing. (Conciencia Campesina, 2017)

In this problematic context, within the framework of the Federal Government-Municipality tension in Colombia, with major mining projects planned to be carried out under study and excavation that affect the territory; the participation of municipalities in the decisions on these large-scale projects, the national government had no knowledge, as the organization Foro Nacional por Colombia says:

The management of the mining sector was and remains one of the most centralized in all government functions in Colombia. Two principles underpin this scheme: the constitutional declaration that natural resources are owned by the Colombian State and the definition of mining as a public benefit activity (Mining Code). Thus, the central government configured a highly hierarchical mining management model, in which it centralized major decisions along the sector’s value chain: the central government is the one that grants the titles, grants licenses, supposedly supervises the fulfillment of the concession contracts, receives the benefits and distributes them to municipalities and states. Under the law, states and municipalities have defined some obligations related to the sector, but none that can affect the decisions of the central government. (Foro Nacional por Colombia, 2016, pp. 1-2)

This situation illustrates a dysfunction in the participation of the national government - already analyzed in this text - that not only centralizes the decisions, but that does not fulfill its function of articulating itself to the planning of the study phase to articulate to, at the same time and in a coordinated way, spatial planning. In this sense, mention is made of the relationship experience - in which a councilor from the municipality of Piedras and the Corproopia Corporation coincide -, when in January 2013 the community prevented the AGA company from entering the territory, due to disagreement with the intention to install a tailings dam in the locality of Las Perdices on the Doima pathway and the rejection generated by the way it entered the territory in 2010, without disclosing the activities they would carry out there (Piedras Councilor and Corproopia, 2017).

When Cortolima realized that the community was pressuring, he decided to pay it a visit. When these company people got there, they didn't warn anyone, they arrived with machines. This surprised the population, because they arrived as mercenaries, with helicopters and everything. There, Cortolima punished them and ordered the company to remove everything. The company received a deadline, because it had not requested authorization, even for Cortolima, to enter the territory (...). The correct thing - what the Mayor should have done - was to summon the community, so that people would know, directly from him, what would happen in the municipality with mining activity. And they didn't say anything. The mine had paying army personnel. And we don't have an escort, we can even get shot by the authority itself for defending our people's rights. (Councilor of Piedras, 2017)

According to this context, it is possible to identify, from the community's point of view, several problematic points about information management and the emergence of conflicts in the transnational commu-

nity-company relationship. First, there was no broad, transparent and clear feasibility about the mining project in its phases and the territorial scope of what was called La Colosa Regional in the municipalities of Tolima that would be within the project's area of influence. This was identified by the communities as an error by Anglo Gold Ashanti and which reflected in the bad relationship between the company and some social sectors in the municipalities of Ibagué, Espinal, Piedras and Cajamarca, who expressed their discomfort in fact, as roadblocks, to prevent the passage of company employees to areas where there was intervention during the exploration stage.

Second, in neither version is it possible to identify active participation, follow-up or supervision by the competent entities of the national, state and municipal governments regarding the strategies and processes for disseminating information on large-scale mining activity, with scope that can mediate the community/company relationship and thereby guarantee the rights and duties that must be respected and fulfilled by all parties. This would contribute to the fulfillment of the principles of coordination and competition between the national government and the municipal governments, since the beginning of the mining value chain (concession of the mining title and exploration phase). It is necessary information for the articulation of the mining and territorial ordering, which require the effective participation of the social sectors.

Faced with the information gap and institutional incapacity, the communities relied on the experience and knowledge of national and international civil society organizations that dealt with the mining issue in Colombia based on cases of open pit mining in countries like Peru, the Argentina, Chile and Brazil; as well as collaborating in the dissemination of the results of research on environmental impacts, but that it would also have limitations in considering possibilities for mining project designs that could generate social benefits.

2.1. Social investment and exploratory uncertainty

An important experience related to the Corporate Social Responsibility (CSR) policy is that of the Anaima community, in Cajamarca, since in the first socializations - according to Conciencia Campesina - the company did not refer to the mining project, but reached the communities offering programs for the community welfare, which were part of the Government's duties. This subsequently led to mobilizations and the decision not to allow the company to assume responsibility for the Government's own activities.

The company came to socialize its project in the rural region. In other words: "It arrived offering to paint the school. They organized commissions to improve the roads". And we said: "But, fixing the school, this is the responsibility of the City Hall, the Ministry of Education. Maintaining the roads, this is the responsibility of the municipal administration, because a company does not have as much power to replace the duties of the local government". We said: "We don't agree with the company replacing the local government." A very strong division in the community was created, and the two people who opposed the project had to paint the school. We made a letter by hand and gave it to employees of the mining company and the then mayor, and painted the school. So, we learned to say: well, we must move on and get to know this opponent. And the company even communicated the project to us, served us *tamales* with chocolate, with bread, as a way to buy the community's support. (Conciencia Campesina, 2017)

According to some organizations, this was discussed among the community. In these debates, discontent and opposition to the company grew, because it did not divulge the project in a clear and transparent way from the get go, and wanted to buy people's support. This is what the organizations Corproopia, Cosajuca, Conselho Ambiental del Toli-

ma and Conciencia Campesina reported. The community prevented the company from making the El Águila road, by means of a *minga* (peaceful and silent march), with the help of people from nearby villages and organizations, such as Apacra and Agrotuanaime. Seeing this mobilization, the company withdrew from discussions in the rural area and went to the urban areas.

In turn, we can highlight the regional character of social mobilizations in relation to the project, as it also considers the company's regional strategy, for example, in the city of Ibagué, capital of the state of Tolima, where the state also remained absent and, in addition to not having a proposal to involve the municipality in exploration as a component of mining planning, also has no proposal for the state, despite the magnitude and relevance of the project at the regional level. The Tolima Environmental Committee, as an expression of this regional dimension, says:

What did the multinational do when it arrived here in Ibagué? It financed Deportes Tolima, the Conservatory of Tolima, financed the folkloric festivals of the municipality, the hospital ... They were trying to build a favorable environment for the project, and thought they would be able to finance Deporte Tolima, the conservatory, delivering chairs and video projectors to community assemblies. In Cajamarca the same thing, the market square, the gym, Wi-Fi, the hospital, the association of avocado producers, the association of bean producers. If that were so, the company would do these things in the rest of the world. They were buying people's conscience. (Tolima Environmental Committee, 2017)

Also, we observe major limitations of the multinational company and the national state to conceive a mining-territorial project that allows communities to be linked in the object-based debate on cost/benefit, which in addition to options for the global debate on the role of multinationals in resource extraction in Latin American countries, left communities with

no options to participate in the future of their territories. An aspect in which social organizations play a fundamental role in monitoring communities in their right to participation and access to information.

(...) The mobilization consisted of going to the villages in municipalities to talk to people and inform them about what was happening and about what Anglo Gold Ashanti proposed, considering the information that national and international NGOs outside the municipalities had. Mainly, they counted on the monitoring of Ecotierra for that moment, as mentioned by a councilor from Piedras. As Conciencia Campesina also highlights, the importance of the presence of the international NGO Colombia Solidarity Campaign for this situation was the international visibility given to what the community was experiencing. As a result of these decisions and spaces for the community to meet, the Ibagué Carnival March was born, which has been celebrated every year on June 5, since 2013, and has been replicated in several municipalities in Tolima and other states, such as Quindío. (Tolima Environmental Committee, 2017)

From this, several social investment issues can be identified regarding the phases of the mining value chain. Especially, in the study phase, the mining concession contract constitutes a mere expectation, both for economic geology in the discovery of a mineral deposit and for the improvement of the utility company's right, when determining and exploring a deposit, through approval technical-legal instruments for mining design and environmental licensing, whereby the corporate social investment actions carried out by the multinational at this stage represent risks for communities such as: the lack of continuity and sustainability of social projects, due to the uncertainty of viability economic and legal exploitation; the establishment of asymmetric power relations, without binding rules; the constraint of community participation in decision-making in consultation spaces; taking positions, without a con-

crete project, and the risks of division and enmity in the communities. For these reasons, it is essential to regulate the CSR of multinationals, specifically, in the mining exploration stage.

2.2. Popular consultations on mining in Tolima and building participation

In the cases of the Cajamarca and Piedras consultations, in addition to those that are pending in the municipalities of Ibagué and Espinal, it is possible to highlight some aspects directly related to: 1) the community strategies used during the process of requesting and holding popular consultations and the support of senators of the Republic through their UTL, as well as that of international and national NGOs external to the community; 2) the role of the company within the campaigns and the popular consultation day; 3) guarantees from national authorities during popular consultations; 4) the determination as to whether consultations are binding or not, which may have popular consultations as a mechanism for participation and decision-making on the limitation or restriction of large-scale mining activity in the territories, which is yet to be defined.

It is clear that the requests for popular consultation were motivated by the knowledge acquired in their processes and the advice offered by environmental organizations on the socio-environmental impacts that large-scale mining activity brings on the lives of communities. Community organizations claim that their fundamental rights to life, a healthy environment, food security, water, territory and participation could be affected by the progress of these projects.

As mentioned above, the way the company entered the territory and built its relationship with the communities, was interpreted by the communities as a mistake by the mining company, as it was not clear and

transparent about its interest in mining exploration and the purpose to compensate for the Government's role. Added to this was the precariousness in the dissemination and access to information about the La Colosa Regional project for the communities, by the Ministries of Mines and Energy, Environment and Sustainable Development, the Ministry of Agriculture and the National Mining Agency, the National Department Planning (DNP), the Government of Tolima and the city halls, which learned of the presence of Angelo Gold Ashanti seven years after it had started the study or pre-feasibility phase, with the help of information obtained from research NGOs such as Ecotierra, Colombian Solidarity Campaign, Pax Christi and, later, Tierra Digna and Dejusticia.

The municipality of Piedras was the first to carry out a popular consultation to repudiate the mining activity, specifically due to the possible location of the tailings dam, in the villages of Doima and Campo Alegre, where the wastewater and toxic waste resulting from the exploitation and production of gold would be treated. This consultation was held on July 28, 2013, with the following question:

This result generated controversy and a protective action by the company before the Administrative Court of Tolima, for the alleged violation of fundamental rights to due process and the good faith by AngloGold Ashanti Colombia SA (...), adding that the text submitted for consultation is not impartial, does not comply with the requirements of loyalty, clarity, non-directive, non-biased or equivocal, with which the freedom of the voter is guaranteed (Council of State, Administrative Litigation Room, 11001-03-15-000- 2016-03415-00, 2016).

In their defense, the National Mining Agency and the Ministry of Mines and Energy have spoken out, relying on the argument of mining activity as State property and with a character of public utility and social

interest, therefore, municipal and state authorities could not define a limitation or restriction to mining projects, supported by Decree 934 of 2013. Despite this, the Government Council denied the injunction. When interviewed, a Piedras councilor said of the decision:

The State Councilor established that the consultation in the municipality of Piedra was legal - both constitutionally and juridically. When Anglo Gold contested the consultation with Piedras, arguing that in Piedras the decision to consult had not been made legally, the Council of State overturned that challenge. The Council acted responsibly so that the consultation did not end up in the trash, they said: “No sir, the consultation is legal and no entity, other than the Council, can change the law.” The Tolima Court also said it was legal, both the question and the consultation. So far we have had no problems with that. There are many laws here in Colombia, but there is always a loophole to circumvent them. (Councilor of Piedras, 2017)

After this first consultation, the Tolima Environmental Committee, working together with other community organizations opposing the project, presented the strategy of promoting popular consultation in several municipalities:

As we knew that the La Colosa mining project would have impacts on the Coello river basin, we wanted to consult on the entire Coello river basin; there are seven municipalities. We started with several meetings in all municipalities, including Cajamarca, Robira, Coello, San Luis, Flandes, Espinal and Ibagué. At the time, we said: “We cannot do seven popular consultations because we do not have this capacity”. So we prioritized three consultations. Espinal’s, because all the waste would arrive and contaminate the Coello River; then Ibagué, for being the capital; and third, Cajamarca, because there is where the mine is located. (Conciencia Campesina, 2017)

When talking about the capacity to make popular consultations, the organization *Conciencia Campesina* refers to the human and economic resources involved in the process of social mobilization in these municipalities, which are necessary for publicizing and disseminating the campaign and setting up the headquarters of the Promoting Committee for the Participation Mechanism for Democratic Popular Consultation on Mining in Cajamarca-Tolima, among other requirements of Law 1757 of 2015, which determines the requirements to activate this participation mechanism. The Tolima Environmental Committee refers to the experience they had during the promotion of popular consultation in Ibagué:

We made these posters and we had to get 140,000 votes. Imagine how many posters we had to make! Yes? So, our impression was, at least, 300,000 posters, 300,000 pamphlets. Many of us were in debt, because nobody financed us. So, we had to raise funds. We got some support, but not near enough ... with friends from NGOs, but we had to constantly ask for money. We had to set up a headquarters, so when we changed the date from October 2nd to October 30th, we had the exact money to pay for the headquarters at the center and after that, with almost another month, where would we get the money from? That was the discussion all along. You see, people cried and cried. (Tolima Environmental Committee, 2017)

The population's fear, as mentioned by the Tolima Environmental Committee and what was published in the local newspaper *El Nuevo Día* (August 26, 2013), was the possible contamination of the tributaries of the Coello River, due to the use of cyanide, if the industrial treatment plant that the project requires was built in its territory²⁴.

However, this was one of the popular consultations that did not prosper. The City tried to take it forward, but the Municipal Council of

El Espinal asked that it be suspended. The Tolima Environmental Committee explained that it was a complicated process due to the media's political issues and the economic interests of some employees who were part of the City Hall and Council of this city.

In Ibagué, the process of requesting popular consultation was complicated because when it was approved in 2016, its date, October 2nd, coincided with the national plebiscite for the approval of peace agreements between the Government and the FARC, signed in Havana. For this reason, the consultation had to be rescheduled for the same year, in December; but, at that moment, the Government Council decided to suspend it, because the question was elaborated in a negative way, so that - according to it - it would influence the voters' response, and gave a deadline for the Tolima Administrative Court to rephrase the question, considering the Council's proposal: "Do you agree - yes or no - that metal mining projects and activities are developed in the municipality of Ibagué?" Regarding this situation, the Tolima Environmental Committee perceives a complex and blocking scenario to popular consultations:

So we said: "If we win in Espinal, that puts us in the spotlight ... Then we won in Ibagué and lastly in Cajamarca". What did the government do? It started to block us. Blocked in Espinal, blocked in Ibagué, there was a change of government ... The balance of forces has changed because, before, the governor was the one who helped us at least a little in the authorizations. But that changed, and the mayor was against the movement. Then it changed. We made a life commitment, which is like a previous commitment that we make to all political candidates. We made him sign this commitment during the campaign, not to receive money from Anglo Gold and to help strengthen consultations. We did this with Guillermo Alfonso, and when he won, in the first act, he says: "Well, let's make the appointment" and we will get into all of that. This opened up a great national debate, but that consultation ended up losing in Ibagué. So they did

with Espinal and they would do so in Cajamarca. It turns out that in Ibagué we learned our lesson. (Tolima Environmental Committee, 2017)

The Tolima Environmental Committee problematized the state's situation in the context of popular consultations, when explaining its position vis-à-vis mining activity, as the Committee was not opposed to mining activity in general, only some types of large-scale mining, which would cause greater impacts compared to the mining carried out by the small miners of Tolima, who used artisanal and smaller scale techniques.

Thus, one of the tensions that arose during popular consultations happened between these community organizations and the artisanal mining economic sector, due to the questions that arose in view of the scope of the consultations on mining and the way in which the question on mining activity was constructed. In other words, what the artisanal miners did not want was that there was a question about the approval of the mining activity, in general, because that would include them.

In the specific case of Tolima, as explained in relation to the characteristics of the state in this document, where artisanal mining activity has historically developed; in addition to explaining the types of materials it refers to, as clay, silver, copper and construction materials, among others are extracted in its territory. Returning to the discussion on spatial planning and mining planning, the Department was asked the question of defining which economic activities would be carried out in the state, in what proportions and territorial extension and in what way the mining of small and large producers would articulate. That is, we return to the unfinished tension between the coordination of the provisions for the use of the subsoil and the use of the soil and the vocation of the land and the mining potential.

In Cajamarca, something similar to Ibagué happened with the popular consultation, since, at the time of receiving the approval for its realization, it was requested that the question be changed, because its phrasing was allegedly negative, and this would influence the voters' response. But, in addition to this inconvenience, there was also political pressure from public institutions and the national government to interrupt popular consultation, violating the right to popular participation, as stated by the representative of the Tolima Environmental Committee:

First, when we started with the consultation, there was a lot of manipulation, including the Government sending its senior officials, Deputy Minister of Mines, ANLA employees ... Council spaces. The debates that the Municipal Council should have to try to disqualify the consultation process. In Ibagué, in Cajamarca, in Espinal, everywhere. Yes? The Prosecutor's Office, which we call the Public Prosecutor's Office, which should be based on the interests of the population, did the opposite, sending communications, putting pressure on all State institutions acting in the interests of the company and not of the Colombians. Due to corporate power, they threatened city officials, who were reprimanded if they promoted consultations or spoke in our favor. (Tolima Environmental Committee, 2017)

During the process of promoting popular consultation in Cajamarca, campaigns were carried out that sought to influence the votes to be held in March 2017. On the one hand, some social sectors promoted the vote "No" to mining, including environmentalists and community organizations. On the other hand, there were those who campaigned for abstention from voting, among them organized social sectors, some with professional ties with Anglo Gold Ashanti. It has even been mentioned that the company was part of this campaign, financing the promotion of abstention from voting, carried out through the Aprominca organization.

Anglo Gold Ashanti says that out of 16,000 voters, only 7,000 actually voted. Yes? That the vast majority did not even vote. But what they don't tell the community is that Anglo Gold Ashanti participated, not directly as employees, but through Aprominca, with funding. They registered a lady on the Abstention Promotion Committee. In popular consultation there are three scenarios for proselytism: "yes", "no" and abstention. They promoted abstention. All their employees were told: "Please, don't even leave home - not even with your families - to do activism." And that happened in Cajamarca. On the one hand, pamphlets began to be passed under the doors of Cajamarca, at night. So the first pamphlet said: "Who benefits from popular consultation? Nobody. If nobody benefits, but it harms Anglo Gold Ashanti. Who benefits from it? Well, politicians who think they can manipulate the population. We will not vote". The other said: "The mining consultation will not affect La Colosa. Why? The State Council said it will not suspend existing projects". Third: "To vote means to vote for Julio Roberto and Gustavo Petro" (...). Cajamarca is not communist, we will not vote. (Tolima Environmental Committee, 2017)

This context created a gap to question the participation, directly or indirectly, of the company during campaigns of political proselytism and in the days of holding popular consultations, since those who must decide on the territory are its inhabitants, with transparent information that the Government should provide. Also, its intervention in these scenarios contributes to a politicized treatment of large-scale mining activity and the determinations that are made about it. Something about which the Government Council was critical in assessing and approving the formulation of questions for popular consultations. For this body, the question must be phrased in such a way as not to direct voters to one or the other answer and, thus, to guarantee neutrality in the consultation process.

Considering the above, regarding the political positioning or the absence of national authorities and even the Public Prosecutor's Office, whose actions in a way interfere or fail to fulfill their function as bodies guaranteeing the fundamental rights of Colombians and as representatives of the people's interests before anything else.

The consultation in Cajamarca was held on Sunday, March 26, 2017. For the day 16,312 citizens were qualified, who voted in the 18 tables authorized by the Registry. The minimum number for the consultation to be valid was 5,438 voters and the winning option should have half plus one of the votes, according to Law 1757 of 2015, on participation mechanisms. Of 6,241 votes, 76 were for "Yes" and 6,165 for "No", so that the consultation exceeded the minimum established by law (National Registry of Civil Status, 2017).

There is still no clarity about the scope of Tolima's popular consultations on the La Colosa project. Whether or not its result was related to the presentation of the project and the feasibility phase, foreseen by the company for 2018, or the environmental licensing stage, whose start was scheduled for the same year, within its operations schedule, as if read in the report called *Lo que usted debe conocer sobre AngloGold Ashanti 2014* (Anglo Gold Ashanti, 2014, p. 11).

On the other hand, although in this case the question referred to mining activity in general, it is impossible to deny that the focus of discussions for decision making by the community was on the Anglo Gold Ashanti project, which made it necessary to analyze the participation mechanism as information to which the community has access, which in this case possibly could equate the concept of "mining" with the "La Colosa project" and voted accordingly, with impacts for an opinion they might have on other different mining projects.

While voters expressed their opinion in this regard, through Resolution 1087, of 2017 (June 9), the Ministry of Environment and Sustainable Development denied the request to subtract an area of 169.33 ha. of the central forest reserve for the development of the La Colosa mining project, by Anglo Gold Ashanti, under technical and legal arguments, with which the project would cease to have any viability, if the criteria remain in a possible subtraction request for an exploration phase in which the environmental impacts would be much greater.

What calls for reflection on these decision contexts is that, although in this case the decisions coincide, the articulation of public decision mechanisms throughout the mining phases must be analyzed with social participation and the construction of social trust in the process and institutional decision-making apparatus.

An additional factor is the invalidation and declassification of the information on which community organizations argue their opposition to the mining project during the social mobilization process, to speak out against the development of the project. National mining authorities, such as the Ministry of Mines and Energy and the National Mines Agency, have been skeptical, invalidating the arguments of the communities and contesting the interventions of third parties, such as the national and international NGOs that assisted them. This makes it necessary to confer upon the debates a mechanism that can provide a minimal objectivity and confidence between the different views on these projects.

Consequently, and as we have seen in the exposed experiences, of popular participation and social mobilization, state bodies such as the Attorney's Office, the National Registry of the Civil State or the Ministry of Finance were apathetic towards the guarantees and financing of popular participation, a fundamental right of communities to carry out the consultation process. On the contrary, they took decisions that do not guarantee

respect for this right of the population, extending the procedures for processing popular mining-energy consultations, as seen at the national level and, especially, as happened with Espinal and Ibagué in Tolima.

This has also been the position of some public officials or municipal entities - mayors, councilors, governors and even members of the Departmental Administrative Courts themselves - who have expressed disagreement with the opposition widely expressed by the population. That is, they boycott or delay approval processes or cancel popular consultations.

This led the communities to develop other strategies, such as signing the life pact with the elected mayors, in which they commit themselves to guarantee the communities' popular participation rights, regardless of political positions or disagreements. This has meant that guarantees of participation during social mobilizations that precede popular consultations, processes through which communities have sought to guarantee the defense of their other fundamental rights, such as the right to life, to water, to a healthy environment, to territory and participation, depend on the political will of each employee.

2.3. The concept of the mine's area of influence in the territorial perspective

The delimitation of the area of influence of the projects is part of the mandatory environmental management for mining projects in Colombia. Its determination is in direct relation to the process of identifying environmental impacts, understood as "any change in the biotic, abiotic and socioeconomic environment, which is contrary or beneficial, totally or partially, that can be attributed to the development of a project, work or activity". The definition of this area is in Decree 1076 of May 26, 2015, which establishes that the area is:

That in which the significant environmental impacts caused by the execution of a project, work or activity, on abiotic, biotic and socioeconomic means, in each of the components of these means are manifested in an objective and as quantifiable as possible way. (Ministry of the Environment and Sustainable Development, Decree 1076 of 2015).

These areas of influence are defined through an environmental impact study, carried out by the interested party in the environmental licensing process, which is assessed by the competent authority, in this case ANLA. Receiving the endorsement, the area is established in the Environmental Management Plan (PMA), where it has the corresponding management measure.

A review of the terms of reference of the National Environmental Licensing Authority for mining projects (ANLA, 2016) makes it possible to note the definition of the scope of the EIA (Environmental Impact Assessment) process:

(...) Comply with the provisions of these terms of reference in accordance with their belonging to the mining project, in the same way it must verify that aspects that may affect and/or have a serious impact on renewable natural resources or the environment, or introduce considerable or notable changes to the landscape.

As noted, there is a marked focus on natural resources, the environment and the landscape, without an explicit reference to aspects related to a socio-environmental or territorial vision.

For the specific case of the expansion of the port of loading of the Cerrejón project, two new approaches are observed in the decisions on protection of the Constitutional Court. In fact, in Judgement T-704 of 2016 a concept of technical connectivity is introduced in the definition

of the area of influence, considering that in the evidence of a current impact there would be an additional impact, due to the expansion of the port and, therefore, the area of influence would comprise not only those affected communities but also those potentially affected, thus resulting in the obligation to carry out a prior consultation.

This ruling orders the National Environmental Licensing Authority to review the Comprehensive Environmental Management Plan (PMAI) for the entire Cerrejón mining project, and to analyze whether it is sufficient to deal with the contamination that occurs in coal mining. A decision that would raise doubts about the company's compliance with environmental obligations or the insufficiency in the established management measures. In this sense, ANLA's monitoring manual defines:

Projects, works or activities subject to an environmental license or Environmental Management Plan, during construction, operation, dismantling or abandonment, are subject to control and monitoring by environmental authorities, with the aim of: 1) Verifying the implementation of the Environmental Management Plan, follow-up and monitoring, and contingency, as well as the efficiency and effectiveness of the management measures implemented. 2) Verifying and demanding compliance with all terms, obligations and conditions arising from the environmental license or Environmental Management Plan. 3) Corroborating the real behavior of the environment and natural resources in relation to the development of the project. 4) Assessing the environmental performance, considering the management measures established to control the environmental impacts. (ANLA).

Precisely, paragraph 5 of the same decision orders the company to implement a plan to reduce environmental, social and cultural damages, to compensate for the damages caused by the exploitation of coal to the environment and to the rights of the affected communities, which reflects a

comprehensive view of the environmental management. This, regardless of the assessment that leads to the configuration of the concept of damage caused and the designation of a reduction measure between the types of measures (prevention, correction, compensation and reduction), whose technical and legal debate is not the scope of this investment.

It is relevant for the analysis of the scope of the environmental management instrument - considering and depending on the environmental, social and cultural integrality -, a territorial conception in the planning of large-scale mining projects - as analyzed in the case of Cajamarca - considers the problem of the participation of public agencies in the planning of mineral reserves in the short and long term and their impact on the mining operation, which in the case of Cerrejón includes the rail system and the port of loading.

In turn, the development of the mining-territorial model in its harmonization with land use and, in this case, with the particularities of indigenous territories for the distribution of the benefits of the value chain, whose lack has perverse effects on the perception of communities as to the mining project: “It seems that it is better to live in the area of influence of the railway corridor, because that way we have many benefits”, says a Wayúu indigenous person. And, in the case of Cajamarca, there is a clear need for a regional vision in planning. In what the communities called La Colosa Regional.

The lack of latent articulation at this point can be seen in the different changes and alterations that the project has undergone over time; which, without a doubt, had effects on the territory, without the instruments of territorial planning and development plans having been adjusted. Despite the centralization of the mining policy, there is no National Development Plan harmonized with the regional plans, which “runs” in parallel with the mining planning, with the increase of its production

and with the goals of the decommissioning plan, among others aspects. Some of these changes are illustrated from the mining expedient:

- The then Ministry of the Environment, through Resolution 670, of 1998, accepted the Environmental Management Plan presented by the companies Carbones de Colombia S.A. (Carbocol) and International Colombia Resources Corporation (Intercor), for the project to open and operate the New Areas to be explored in Cerrejón Norte, located in the jurisdiction of the municipalities of Hato Nuevo, Barrancas and Maicao, in the state of La Guajira. Subsequently, through Resolution 1010, of November 8, 2001 and Resolution 304, of April 9, 2002, the Ministry authorized the expansion and operation of the infrastructure of Puerto Bolívar, in the municipality of Uribia.
- In 2005, Resolution 2097 of the Ministry of Environment, Housing and Territorial Development established a Comprehensive Environmental Management Plan for Coal Exploration, Rail Transport and Port Operation in the region called Cerrejón, covering the old areas Cerrejón Zona Norte, Patilla, Cerrejón Central, Oreganal and New Mining Areas.
- Finally, and in the current case, in October 2014, through Resolution 1386, and in March 2015, through Resolution 263 of the National Environmental Licensing Authority (ANLA), this Ministry amended the Comprehensive Environmental Management Plan (PMAI), authorizing the works and activities necessary for the increase in the maximum annual production of coal, from 35 to 41 million tons in Project P40.

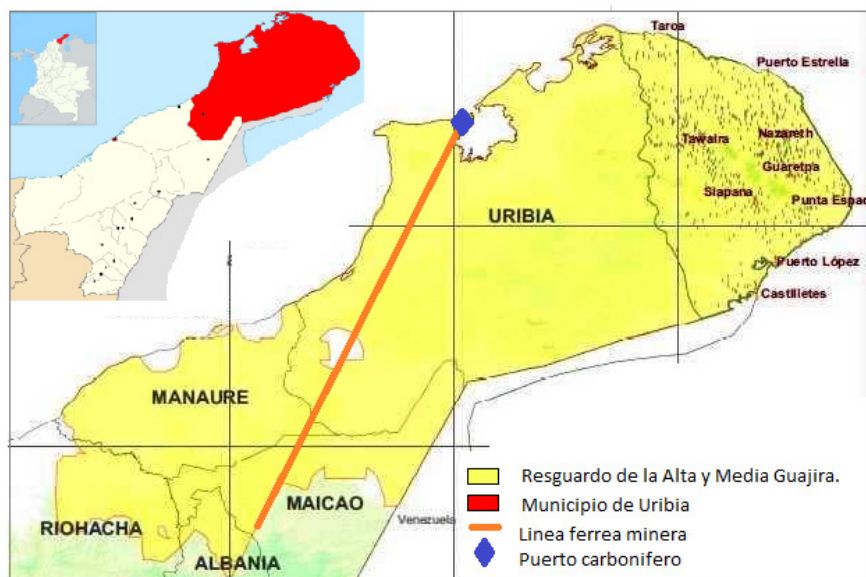
Next, the focus will be specifically on this latest PMAI change and the tensions it generates in relation to two works that are part of the P40 project: the expansion of Porto Bolívar and the diversion of the Bruno stream.

2.4. Uribia: the territory and environmental impact

Uribia is the northernmost municipality of La Guajira and Colombia, the majority of its population is part of the Wayúu people, its territory is contained in the largest indigenous reserve in the country, that of Alta and Media Guajira. Constituted in 1984 and expanded in 1994, it has an extension of 1.067.505 ha²⁵ (Government of La Guajira, 2017). This territory contains the final stretch of the railway for mining and the port of loading of coal in the mining complex of Cerrejón, which receives boats of up to 180.000 tons of weight, 300 meters long and 45 meters wide. The navigable channel is 19 meters deep, 225 meters wide and 4 kilometers long. Also, it receives boats of up to 30.000 tons, with machines, parts, fuel and other materials for the mining operation (Uribia Municipal Administration, 2016).

25 Colombian Agrarian Reform Institute. Resolution 28, of July 19, 1994, which expands the indigenous reserve, constituted by Resolution 015, of February 28, 1984, in favor of the Wayúu community of Alta and Media Guajira, with vacant lots located in the jurisdiction of the municipalities from Riohacha, Maicao, Uribia and Manaure.

Municipality of Uribia. Adapted from Government of La Guajira and Incoder, 2017.



Although mining, transport and coal mining have consolidated themselves as some of the most important economic activities in the municipality, “the revenues generated by these activities are not observed in the processes of designating and distributing revenues among communities” (Government de La Guajira, 2017, p. 103). In fact, the Wayúu people are currently experiencing an unprecedented humanitarian crisis, characterized by a lack of drinking water, food insecurity, unemployment and, in general, a high percentage of Unsatisfied Basic Needs (UBN). Although this humanitarian crisis clearly relates to several factors: the absence of an articulated national Government policy, institutional weakness of territorial entities, historical and structural exclusion of indigenous populations in the country, differences in the application of the differential focus, inter-ethnic and inter-clan conflicts (Ombuds-

man's Office of Colombia, 2014), it is also clear that the inequality in the distribution of benefits and impacts of mining activity has a complex influence on this crisis, generating conflicts in the region.

These conflicts can be observed in the recent decision of the Constitutional Court, Judgement T-704 of 2016, which responds to a protection action filed by the Wayúu indigenous communities Media Luna 2, Lechemama and Malla Norte, 3 of the 16 communities that inhabit the Media Luna area²⁶, close to the railway and the activity of Puerto Bolívar. This protection is within the framework of the fundamental right to a healthy environment and the ethnic rights of indigenous communities, especially the right to prior consultation and has as one of its fundamental points the definition of the areas of influence of the three works that were part of the expansion of Puerto Bolívar: increase in the dredging volume of the navigable access channel to the port, construction of a new tugboat pier and expansion of the capacity of the current desalination plant. This is because in the EIA the 16 communities that inhabit the Media Luna sector were not considered within the area of direct influence.

Based on this analysis, the criteria for defining the areas of direct influence used for this project ignored some impacts that are outside the atmospheric component and that are related to contamination and access to surface water sources. The actioned received a decision in favor of the community, which generates debates in relation to the depth and diversity of the criteria used to define the areas of direct influence and in relation to the possibilities of determining whether such criteria account for the impacts to the community.

2.5. The diversion of the Bruno stream

The diversion of the Bruno stream was initially authorized in Cerrejón, through the Environmental Management Plan license for the opening and operation of New Mining Areas (NAM), by the Ministry of the Environment, through Resolution 670, of July 27 of 1998, which included the diversion of the Bruno stream (Corporación Autónoma Regional de La Guajira - Corpoguajira - 2016), ratified by Resolution 2097, of December 16, 2005, as part of the Comprehensive Environmental Management Plan. Then, the National Agency for Environmental Licenses approved the execution of the works, by means of Resolution 759, of July 14, 2014. Corpoguajira, through Resolution 0096, of January 24, 2014, authorized Cerrejón to make the necessary forest use for the construction, and established to compensate two hectares for each hectare intervened, with a planning of 195 ha in the lots located in the Monte de Oca forest reserve, for a total of 121,865 trees. In this sense, the corporation guaranteed that a previous consultation was carried out with the indigenous communities certified by the Ministry of Interior and Justice (Corpoguajira, Resolution 0096 of 2014).

Based on that, Cerrejón carried out the diversion of the Bruno stream²⁷. According to the company, it presented the project to the competent national and local authorities, based on 18 years of study and drawings carried out “by national and international experts, who concluded that it was technically, socially and environmentally viable” (Cerejón, 2016)²⁸. It also informs that the diversion works of the stream were carried out on lands that were owned by the company, acquired in 1998, in the form of purchase of lots. He explained:

27 This refers to one, among other interventions in water sources of equal importance during the execution of the mining expansion plan, including the diversion of the Tabaco stream and the damming of the Palomino river. As mentioned, these interventions of high ecological impact are carried out by Cerrejón in order to maintain or increase the levels of coal production.

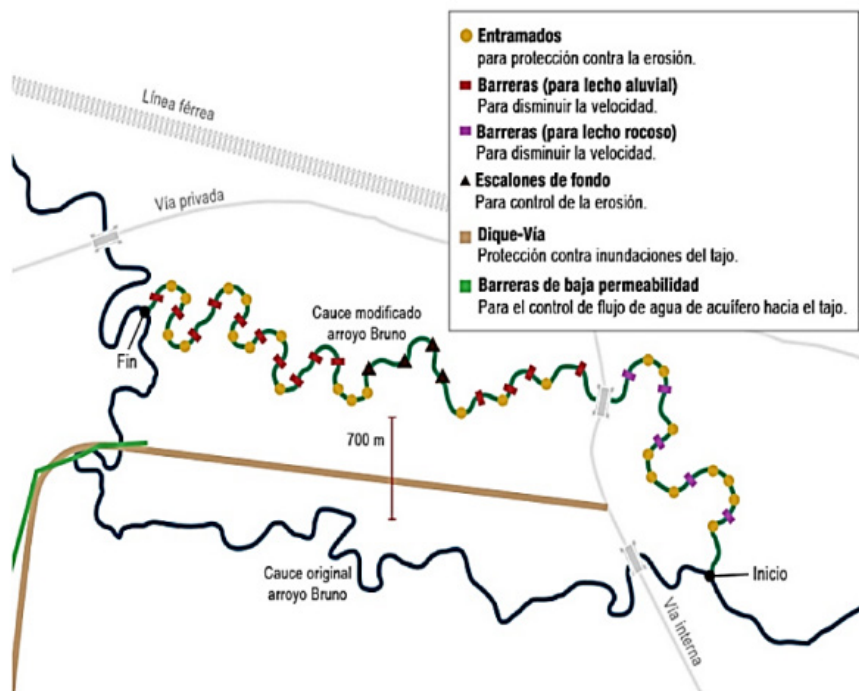
28 The presentation of the La Puente-Bruno stream project ends in Corpoguajira. Published on June 10, 2016 and consulted on October 30, 2017, at the following link: <http://www.cerrejon.com/site/sala-de-prensa/archivo-de-noticias/presentacion-del-proyecto-la-puente.aspx>

The hydraulic design was based on diverting the river 700 meters to the north, replicating its geomorphology. With an environmental compensation for reforestation for 05 years. The project had the international support of the company Aluvión, and Ingetec, from Colombia. This was the first time that a project of this magnitude was carried out in Colombia. And it was done based on comparative ecological engineering. The work cost 32 million dollars and was completed in 2 years. The forecast was initially one and a half years, but there were delays due, first, to the suspension order issued by the Court of La Guajira, and then by order of the Court. (Cerrejón Employee, 2017)

The drawings and works of the diversion of the Bruno²⁹ stream are of a definitive character and had as their main objective the recreation of the conditions of the natural bed. Cerrejón guaranteed that “nothing is thrown into the river, nor are permanent users identified or the collection of surface or underground water; the new bed has the same length as the original, the end of the works is 1.2 km² away from the mouth of the stream over the Ranchería river”. (Cerrejón, s.f.).

29 More details, on the company website Cerrejón: *Descripción de las obras*, <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente/descripcion-de-las-obras.aspx>

Image on the diversion of the Bruno stream. Source: Cerrejón30.



According to Cerrejón, the hydraulic diversion works are currently closed and are in the process of supervision, monitoring and adapting the ecosystem and the formation of runoff. The river is already on its new route, where the structure operation was assessed, including an event of high precipitation and runoff.³¹

However, despite the strict regulations and environmental technique with which the company Cerrejón carried out the project, complex and problematic results emerged in social and legal terms, related to the

30 <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente/descripcion-de-las-obras.aspx>

31 The research team monitors the work.

definition of the area of influence and the consequent recognition of the impacted communities, the right to consultation and the identification of socio-environmental impacts and their management measures.

2.6. “Waters above” of the diversion of the Bruno stream

As territorial antecedents and recognition of rights, considering the emerging problem, we have that the Tirojuancito stream, or Bruno, is a water affluent of the municipality of Albania, La Guajira, which is born in the protective forest reserve Montes de Oca³², close to the territorial limit between Colombia and Venezuela, and travels 26 kilometers until it ends in the Ranchería River. This stream is one of the three main sources of water in the municipality, considered of great ecological importance because it is a region of production and water reserve for the Lower and Middle Guajira. The diversion of the Bruno stream is also part of the P40 project, specifically the extension of the pit called La Puente. As stated by the company:

This is an active vein of Cerrejón, the second from which a greater volume of production is extracted. It is characterized for having a complex geology and for being one of the best sources of coal, related to the calorific power of the extracted mineral. Since 2000, operations have started in this area. Currently, there is a new filling in the areas that have already been intervened. (Cerrejón, s.f.)³³

In defining the area of direct and indirect influence of the EIA of these works, only the Wayúu indigenous community, from Campo Herrera, was recognized as impacted, and thus recognized in Resolution 2104, of November 2012, of the Ministry of Interior, under the complaint of other communities that also considered themselves affected by the work.

So that only with this community did a prior consultation process take place, whereby the Wayúu community Horqueta 2 filed a protection action before the Administrative Court of La Guajira, on May 2, 2016, denouncing the Ministries of Interior and Environment and Sustainable Development, the National Environmental Licensing Authority, Corpoguajira and Carbones del Cerrejón Limited, for violation of their fundamental rights to due process, prior consultation, regarding the works initiated by the company for the diversion of the Bruno stream bed and the inconveniences caused by the passage of the company's freight train (Council of State, Judgement 44001-23-33-000-2016-00079-01, 2016).

In view of this, the company argued in the process that the Horqueta 2 community had not been included because it was located “waters above” the diversion, so that it would not be affected by water consumption or traditional and spiritual practices, nor would they be affected by coal particles, as it is located above the operation; while in the operation area the wind blows in another direction.

The sentence was favorable to the community because both the Administrative Court and the Council of State stated that the human rights violations of that community are due to the articulation that exists between the institutions responsible for carrying out the process and the reductionist vision of the defendants (Cerrejón, ANLA, Ministry of the Environment, Ministry of the Interior and Corpoguajira) carried out the corresponding administrative procedures (Council of State, Judgment 44001-23-33-000-2016-00079-01, 2016).

3. Area of influence and territorial historical remediation

As in the case of the Bruno stream, the environmental measures for the expansion of Puerto Bolívar were defined in 2005, as part of the Comprehensive Environmental Management Plan and the P40 expansion project. This expansion included the development of “three main activities: increasing the dredging volume of the navigable channel to access the port; the construction of a new tugboat dock; and the expansion of the capacity of the current desalination plant”. (Constitutional Court, Judgment T-704, 2016). These specific activities were authorized by ANLA by Resolution 428, of May 7, 2014. The indigenous communities of Media Luna were not consulted as part of the process of obtaining the corresponding environmental license because, like the Wayúu community Horqueta 2, they were not within the area of influence of the project, which generated major problems.

In the case of the expansion of Puerto Bolívar, it is essential to highlight that one of the most important historical environmental impacts identified in the municipality of Urubia and in the Media Luna sector, is the coal dust produced during rail transport, during unloading, handling and boarding Puerto Bolívar, which affects water sources, homes and schools, according to the Government of La Guajira (Government of La Guajira, 2017).

As a result of this impact, in 2016, the Corporación Autónoma Regional de La Guajira, Corpoguajira, imposed a preventive measure on the company Cerrejón, after a field visit, due to the amount of dust present on both sides of the railway (at a distance of approximately 60 meters), on the walls of the fishing storage center of Asopeswa (Association of Artisanal Fishermen Wayúu in Media Luna), on the beach and on the Jiwappana stream - previously used by the community in rainy seasons - because “it is evident that an impact on the resources of air, water, soil,

flora and fauna and others may be progressively affecting the health of the people who live there”(Corpoguajira, Resolution 1749 of 2016).

The impacts of coal dust are also considered by the Secretariat for Indigenous Affairs of the Municipality of Uribia:

This situation is at the expense of the rights of the Wayúu people, generating more poverty than they had to endure traditionally. Day by day, the passage of the train generates contamination, releasing coal particles in the water sources close to the train path, the consumption of this water causes diseases in children and the elderly. (Government of La Guajira, 2017, p. 107)

For the communities of Media Luna, these impacts are evident, as stated by the legal representative of the Asopeswa Fishermen’s Association:

There have been cases of sick people and even deaths due to the coal dust that comes from Puerto Bolívar. Also, at this moment there are people with respiratory diseases, vision and skin irritation, all caused by this powder. (2017).

This statement is supported by a traditional authority in the region:

At the edge of the beach there is also visible contamination with coal caused by Cerrejón, this is harmful for fishermen, for marine flora and fauna, as the biggest source of food in this area is fish, considering that it is a coastal area. (Corpoguajira, 2016, p. 3-4)

In general, a Wayúu leader claims that the mining developed by Cerrejón is responsible for the conditions suffered by the indigenous people, “plundering our wealth, contaminating our habitat and leaving countless environmental problems” (Government of La Guajira, 2017, p. 111).

A member of the Kamusuchiwou community - which is one of 16 Wayúu communities in the Media Luna sector - says that fishing activities have been drastically affected by the reduction in the number of fish compared to 50 years ago.

These aspects were taken up in Judgement T-704, 2016, which states:

With regard to the Media Luna 2 community, the evidence shows that Puerto Bolívar produces coal emissions that contaminate the air and, because it is close to the port (approximately 2 kilometers from the village), the inhabitants have been suffering health problems, economic losses and contamination in its environment, as can be seen in Resolution 1749, 2016, issued by Corpoguajira. (Constitutional Court, Judgment T-704, 2016).

According to the same sentence, these impacts would increase with the project to expand the port, considering a comprehensive view of the entire mining complex. For the Constitutional Court, the Puerto Bolívar expansion project, and the consequent three planned works, is part, in turn, of the P40 project, so that “the environmental and social impacts will be deepened with the expansion of Puerto and, in general, with the expansion of the Cerrejón project, with the approval of P40”(Constitutional Court, Judgment T-704, 2016).

With all that has been said, and in reference to the impacts, the company guarantees that everyone is identified and that they have mitigation measures, in the sense that the damage is not produced by coal dust, but by the emission of particulate material, in relation to which the company complies with all the standards and limits established by Colombian legislation in Resolution 610, 2010, of the Ministry of Environment (Cerrejón, 2015). Thus, it considers that it cannot be true that

the activity of Cerrejón is affecting human health, since if it complies with the established standards, it cannot simultaneously affect health.

In this sense, Corpoguajira, in its air quality monitoring program in the mining corridor and area of direct and indirect influence of the mines in operation, in order to establish whether the controls implemented by the mining companies are complying with the objectives set or if it is necessary to strengthen them, stated in 2007:

After monitoring in the area of Puerto Bolívar, north of La Guajira, in the area bordering the port, it was possible to determine that the concentrations present in the two stations are below the daily standard in each of the contaminants. For Malla Norte Station the average TSP values were 43.11 (ug/m³) and PM₁₀ 40.14 (ug/m³), for Escuela Station the average TSP was 52.93 (ug/m³), and for PM₁₀ it was 49.068 (ug/m³). The area is characterized by high temperature and winds from the coast. In general, no other value was presented that exceeded the standard, which indicates a normal zone with no impacts to be observed with regard to particulate material. (Corpoguajira, 2007, p. 80)

Likewise, in 2009, it was stated: “We can deduce that, effectively, there is a significant contribution of emissions of Total Suspended Particles (TSP), by the coal exploration companies, notoriously affecting the air quality, but that do not affect human health” (Corpoguajira, 2009 , p. 4). Regarding the preventive measure, and as part of the Action Plan that the company was required by Corpoguajira to present, Cerrejón carried out actions to clean the railway, the water, the storage center and the homes of the communities and Media Luna. In addition to that, the company is conducting studies on the winds, to define the location and type of barrier in Puerto Bolívar; updating the dispersion model; and integrating the monitoring stations, to receive real-time alerts on the levels of

particulate matter emissions and to be able to implement the controls during the extraction, stacking and in the transfer zones of the coal.

In relation to Judgment T-704, 2016, specifically regarding the Constitutional Court's statement that the expansion of Puerto Bolívar would increase the impacts if we consider an integral view of the mining complex, the company states that the judgment goes beyond the benchmark when it debates the impacts of the three works contemplated, because:

It extends the analysis of impacts to the entire operation. They consider that this comprehensive view of the mining activity must be specific to each case, and that it cannot be generalized, since when an intervention is made that affects the entire operation (for example, in the case of the P40 project, in which production, transportation and exports are expanded), it is justified to analyze all impacts in general and their effects on communities, but, if it is the case of a specific work by which the entire operation will not be affected (for example, expansion of a specific pit that does not imply an increase in production, because it will replace a closed pit), there is no reason to analyze the impacts on the railway and the port, nor the entire operation. (Constitutional Court, Judgment T-704, 2016).

For the Constitutional Court, it is necessary to have a retrospective look at mineral exploration in terms of guarantees and violation of human rights and ethnic rights. Indeed, the decision orders the company Cerrejón to:

Implement an immediate plan to reduce environmental, social and cultural damage in the area, for which it must compensate for the damage caused by coal mining in the environment and the rights of affected communities. If necessary, it should negotiate the compensation with the affected communities. (Constitutional Court, Judgment T-704, 2016).

Faced with this decision, the company states that, effectively, and ultimately, the Court is asking for a retroactive consultation of the entire mining project and its impacts and mitigation measures for the past 30 years. This historical and retrospective look at the impacts of the Cerrejón coal complex has become increasingly important as, over time, the spectrum of ethnic and territorial rights has expanded, which in turn has increased their demanding processes, not only in current situations, but also in historical situations of the explorations.

Effectively, when the study on Coal began in 1977, and when, in 1985, its exploration began, the 1991 Constitution did not exist, therefore, there was no formal recognition of the rights of ethnic, indigenous and Afro-descendant communities in the country. In this way, an open pit mining exploration project was developed in indigenous territories, without undergoing prior consultation processes or considering the guarantee or violation of fundamental rights of these populations, as was argued throughout the document.

In this sense, it is essential to start a plan for the reduction and compensation of impacts that includes the effective participation of all communities affected by mining. According to the company, this implies having a debate with the communities to know what are the impacts that they suffer, which ones are real, which ones are perceived, which ones were not considered which have a measure and are not the object of compensation. The company declares that it has already started this process, which brings together approximately 300 communities and will have an approximate duration of 05 years. In the opinion of Cerrejón, this is an opportunity to consider all impacts and measures that have not been contemplated and to provide closure, so that the only thing that can be presented, after the process is advanced, is a new impact or a new measure. The idea is that, as a result, it is possible to obtain a socially legitimized project.

Although this initiative is fundamental, it is vital to consider the conflicting axes defined in the impact identification process and its mitigation measures: the consideration of the cumulative effects, the impacts on health and assistance. The socialization and historical consultation processes of the mining complex should, therefore, consider these aspects, as well as guarantee the effective participation and the differential approach.

Regarding the diversion of the Bruno stream, the debate on the identification of impacts and management measures was evident during the development of the previous consultation with the community of Horqueta 2, which was the result of the protective action. In fact, the first point of conflict is the recognition of the close relationship between the diversion works of Bruno stream and the expansion of La Puente cave; because, although the diversion was made for the expansion, Cerejón understands each project separately. Therefore, the company carries out prior consultation with the communities per project - that is, independently. In view of this, the community expressed its disagreement and proposed that a single consultative process be carried out for the two works, as they “felt all the impacts at the same time and not separately” (CONSULTATION IN LA HORQUETA, 2017).

It doesn't happen that one day we suffer the impacts of the La Puente pit and the other day we suffer the impacts of the diversion of the Bruno stream, but we experience the impacts simultaneously, and these impacts must be added to those generated during 30 years of coal exploration, for which we were not consulted long ago (FIELD WORK IN LA GUAJIRA, 2017).

In other words, this fragmentary perspective from which administrative and legal procedures arise in order to be able to mine coal is based on the planning and projection of the phases of the open-pit mining val-

ue chain, and not from the view on impacts generated in communities. In view of which, it should be considered that coal mining in La Guajira is a growing activity, with a tendency to expand the mine in order to maintain the coal production and export targets proposed by Cerrejón.

A second aspect, recurring in the complaint of the communities, is the environmental contamination and the respiratory diseases generated in children and adults by the spread of the coal dust during the exploration and the transport of the mineral from the mine to the port, for more than thirty years of mining activity. The company does not recognize this impact - on the contrary, this contamination is the preparation of food on wood stoves, a daily activity of the community, and not the mine. Also, it ensures that the community has no evidence that it is the mine and the transport of coal that generates the spread of coal dust and, as a result, respiratory diseases (FIELD WORK IN LA GUAJIRA, 2017).

At this point, it is possible to observe a question of delegitimizing demands and impacts, which the community makes and identifies, due to the fact that it does not have studies to prove them. The point is that the company also does not have studies that, likewise, demonstrate that it is not the mining activity that causes these respiratory diseases due to the coal dust that spreads through the air and affects the respiratory system of children and adults in La Horqueta 2 and all the communities close to this project. That is to say, in the case of the impact on health, there is supposedly a lack of evidence and studies on these impacts, as well as a deficiency in the appointment of competent entities for their realization.

The third aspect identified by the community, and which at that time was not recognized by the company, on the grounds that the consultation was made exclusively for the diversion of the Bruno stream - not for the expansion of La Puente pit or for the works or operation of the mine for more than thirty years in the territory - relates to noise and vibra-

tions caused by the mine's explosions, as well as by the railroad through which the coal is transported, which cracked the walls of the houses. Regarding this last aspect, the Wayúu community Horqueta 2 explained that the company had gone to some houses to review and conduct some tests, but that they never reported the results and also did not see any actions in that direction (FIELD WORK IN LA GUAJIRA, 2017).

Finally, there is the most important socio-environmental impact for the community: the expansion of the territory, which it identifies as being a transversal aspect and on which it should present the identification of other impacts and, consequently, its management measures, understanding the territory as this traditional ancestral construction that the Wayúu indigenous communities made of their ways of life. According to the community: it is an integral, ethnic and territorial perspective from which it must be approached and worked on the basis of these consultative processes that must be taken into account and, especially within the projections of mining expansion in the territories.

Finally, the community attorney mentioned that “the environmental impacts experienced by the community as a result of the diversion of the Bruno stream are serious, they should not be fragmented or minimized”³⁴, making reference to the scope of the management measures that must be established and articulated between the community and the Cerrejón company. With these measures, we seek to avoid or minimize such impacts, classifying them in three types: a) That it ceases occur, b) That it does not occur as much (minimize), c) Correct what happened. If it is not possible, then compensate for the damage.

However, related to this theme, the Municipality of Albania, within the Municipal Development Plan, says:

The municipality of Albania must be considered one of the municipalities with the greatest vulnerability in environmental matters, given its condition as a mining territory, set in what was the flood valley of the Ranchería River. The impact on ecosystems is permanent despite the efforts made by operators in the mining activity, since the impact on flora and fauna is permanent, added to this by the splint and indiscriminate hunting as it is considered a source of income and food for the natives of the territory (Albania City Hall, 2016, p. 169).

The foregoing raises the question of the effectiveness of the company's management, mitigation and compensation measures. That is, that the rigor with which administrative processes are carried out within the framework of the Environmental Impact Assessment, the definition of areas of influence, the recognition of impacted communities, and the carrying out of prior consultation and management measures does not ensure that fundamental rights of communities to water and food security are not violated during the development of mining activity and that these do not have a cumulative effect.

In addition to that, as a result of these protections, there is a tension related to the historical debt due to the consultations not carried out with the communities impacted by Cerrejón during its mining activity, due to the lack of a participation mechanism at that time. This is manifested by the Ombudsman's Office of Colombia, Guajira Regional Office, stating:

The legal vacuum in the rule that governs companies is problematic, because prior to the 1991 Constitution there was no prior consultation and the rule itself says that the activities that come before this rule are governed by the previous rules and not the most recent ones. Cerrejón, until now, has not made any previous consultations during its time in the state. For example, for the renewal of the concession

they did not make prior consultation and renewed it until the year 2030. (Employee of the Ombudsman's Office of Colombia, Guajira Regional Office, 2017).

This requires a reflection on the exegetical view of the non-retro-active application of the norm or the consideration of a mechanism for periodic updating for new social, political and climatic conditions; both in long-term mining planning and in territorial planning that should be linked to the value chain, and in many cases respond to an even more structural historical debt.

3.1. Prior *a posteriori* consultation - a unique case

As has been stated, since the communities close to the Puerto Bolívar expansion and diversion of the Bruno stream were not within the areas of influence initially defined in the EIA, prior consultations with these communities were not carried out. However, from the protection cases filed by the communities of the Media Luna sector and the Horqueta 2 community, these processes began to be carried out, not without tensions such as those mentioned below.

Regarding the case of the expansion of Puerto Bolívar, the first tension occurred in relation to the certification of non-presence of indigenous communities in the areas of influence of the three works that comprised the project, by the Ministry of the Interior, based on a list of certified ethnic communities, which was subsequently rectified based on a field check. The National Environmental Licensing Authority declared to the Ministry of the Interior that, within the administrative procedure for granting the corresponding license, problems were detected with the Wayúu indigenous communities in the Media Luna sector, “especially with the Kamúsúchiwo community, because it considered that they it

was being legitimately recognized in the administrative certification act”(in the background review of judgement T-704 of 2016).

The Ministry of the Interior then carried out a verification visit from which it concluded that there are indeed 16 communities, all with a traditional authority recognized before the Secretariat for Indigenous Affairs of the Municipality of Uribia; but that, however, they would not be affected by the works. And so, it issued Resolution 87 of 2013 which certifies that there is no presence of ethnic communities in the area of influence of the project subject to verification.

Although the indigenous community of Media Luna is close to Puerto Bolívar, it is not directly within the area of influence of the specific project of the three additional works (...) nor will it be impacted by it, a situation that generated the certification that states that the presence of indigenous communities in the project’s area of influence has not been identified. (Constitutional Court, Judgment T-704, 2016).

4.5. What the Court said in its decisions was that the impact on the territory, understood as physical space, is only one of the hypotheses of the duty to consult. In this way, the environment could also be one of them and that, in any case, the existence or not of a community in a certain region and, therefore, of the duty of consultation, could not depend on the certificate issued by the current Minister of the Interior, in his National Directorate for Prior Consultation (...). (Constitutional Court, Judgment T-704, 2016).

It is important to differentiate here between two situations; on the one hand, the lack of updated information by the Minister and, on the other, the imprecision of environmental impact studies to define the areas of influence of the impacts of a project. Additionally - in the case of recent jurisprudence - the expansion of this concept to a broader territorial vision, especially in the case of indigenous communities.

Based on this, and in finding that the Media Luna communities were being affected by the activity of the Port and that this impact will increase with the construction of the three works that are part of the expansion of Puerto Bolívar, the Court finally showed the configuration of this impact and, therefore, ordered prior consultation with these communities.

Thus, there is an obligation to consult ethnic communities when these projects are being carried out, as well as works or activities that affect them, through a complex procedure and prior to any measure that affects them. By disconnecting from this process, a fundamental right is violated, since prior consultation is a basic instrument to guarantee the ethnic, social, economic and cultural integrity of these communities, so that “prior consultation is not only an end in itself, being also an instrument for the protection and surveillance of other rights. This guarantee materializes other prerogatives, but, in particular, the prevalence and surveillance of ethnic integrity”(Constitutional Court, Judgement T-704, 2016).

On the other hand, in the argumentative part of Judgement T-769, of 2009, for the case of prior consultation of the prospecting and exploration project for a mine belonging to Muriel Mining Corporation, in the states of Antioquia and Chocó, the Constitutional Court, referring to a ruling by the Inter-American Court of Human Rights on the case of the Saramanka-Surinam people, said:

(...) When it comes to large-scale development or investment plans that have the greatest impact within the territory of Afro-descendants and indigenous people, it is the duty of the Government not only to consult with these communities, but also to obtain their free, informed and prior consent (. ..), since these populations (...) can go through profound social and economic changes, such as the loss of their traditional lands, eviction, migration, the depletion of the resources necessary for their physical and cultural sub-

sistence, the destruction and contamination of the traditional environment, among other consequences; for which, in these cases, community decisions can become binding, due to the serious level of impact they suffer (Constitutional Court, Judgement T-769, 2009).

This not only problematizes the binding consideration of community decisions, but also, once again, evidences the absence of development plans linked to large mining projects and the normative vacuum to structurally address the issue of retroactive rights. Since, although the environmental management plan has the instrumental function of configuring management measures on some specific environmental impacts, the management of positive and negative impacts of the mining model in the territorial scope and synergistic with other forms of production, lacks an explicit development instrument on which to act to obtain binding consent on the integral territorial model.

Finally, the Court, in the jurisprudential analysis of Judgment T-704, of 2016, states that obtaining free, prior and informed consent from ethnic communities; the principle of good faith; the active and effective participation of communities (where their point of view should focus on the decisions that are taken, so that it cannot be limited to a simple notification); peer dialogue (prior consultation is not a right to veto ethnic communities, nor can it be an imposition); in a way that adapts to the specificity of each situation and the diversity of the country's ethnic peoples.

Constitutional analysis is fundamental for this study, in the sense that it is a case in which the structural components of the mining project are already implemented under legal and technical policies of the past, and with transformations assimilated in the ways of life of the communities, which happened without any consent consultation.

Returning to the specific case, the process of prior consultation with the communities of Media Luna began, in which, according to information from the company, prior consultation and opening stages took place, there were agreements regarding the methodology (in which 20 meetings were scheduled to be held until January 2018), and the first meeting ended, to analyze and identify impacts and formulate management measures. Also, a technical visit was made to Puerto Bolívar to verify the activity of the desalination plant. In the process, the community has certain guarantees, such as having seven advisers (environmental engineers, mechanical engineers, lawyers, systems technicians, social workers) and the company is complying with Presidential Normative 01, 2010, which includes the duty to meet all expenses related to logistics and assistance to the community. Cerrejón (2017).

When analyzing this particular situation, in the development of this prior consultation process, two new issues emerge that are essential to address: the adjustments made by the company in the works that integrated the expansion in Puerto Bolívar and the legal advice to ethnic communities.

In relation to the first, it is essential to clarify that the three works that included the expansion of Puerto Bolívar and that were included in the P40 project: the dredging of the navigable channel, the expansion of the desalination plant and the construction of the tugboat pier, will not be fully conducted, since the company does not consider it pertinent to do them, as the annual production of coal has not yet reached the level of 40 tons. What will be carried out today is the partial expansion of the desalination plant, an activity that is subject to prior consultation. This work will have a minimum cost of 700.000 dollars and will be destined to industrial uses, uses in the Puerto Bolívar camp and for the supply of water to the communities, by means of a water truck. Cerrejón (2017).

This change was informed to the communities in the previous consultation stage and generated discomfort, since, in part, they had not been previously communicated about this change. As a reaction, the representative of the communities stated that it was facing a “fraud of the judicial resolution, since the company, today, is giving up consulting on all activities after there is a judicial sentence” (Ministry of Interior, 2017, p. 6). On the other hand, because - as the communities said - one of the works had already been carried out, specifically, the dredging of the navigable channel. This last reason is added to the fact that the communities claimed that years ago an expansion had also been made in Puerto Bolívar that had an impact and that the communities were not consulted, as described by the leader of the indigenous Kamusuchiwou community (Leader of the kamusuchiwou community, 2017)³⁵.

Regarding this second issue, there are effectively conflicts related to legal advisors hired by ethnic communities when requesting legal protection. In the specific case of the Media Luna communities, the indigenous leader Kamusuchiwou claims that he had conflicts with the representative, who has a power of attorney granted by the 16 traditional authorities. “He does not want to give detailed information on how the process is going and why he maintained direct and unilateral communication with Cerrejón, while we have to be at these meetings. We have never had relations with lawyers” (Leader of the kamusuchiwou community, 2017).

Added to these tensions are the processes of previous consultations on the diversion of the Bruno stream, initially with the community of Campo Herrera and later with the community of Horqueta 2.

In August 2013 and May 2014, Cerrejón “carried out a prior consultation process with the community of Campo Herrera” (Cerrejón, nf)³⁶.

36 <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente/descripcion-de-las-obras/la-consulta-previa.aspx>

This process was monitored by the Ministry of the Interior and included the participation of Corpoguajira, the Prosecutor's Office and the Ombudsman's Office (control bodies), the Office of Indigenous Affairs and the community of Campo Herrera and its associations. (Cerrejón, s.f.)³⁷.

During the visit of the research team to the Bruno diversion region, officials from Cerrejón stated that the consultation lasted eight months and that it was carried out with a community of 30 families, located more than 5 kilometers from the diversion, in their indirect influence area. Within this process, the company donated 40 hectares for productive projects and 10 for environmental preservation. Likewise, training for subsistence agriculture was carried out and animals were delivered to the community. Regarding the water supply, the community has access to the Ranchería River and there is a well built in a preservation area. With regard to cultural strengthening, a payment ritual was developed at the point of diversion from the river. The ownership of the land remained as a collective title, both the 48 hectares that belonged to the community and the 40 donated by Cerrejón. The idea is that this land can be transformed into a preservation area. The agreements started to be implemented since 2016 (official from Cerrejón, 2017).

After this consultation with the community of Campo Herrera, the process began with the community Horqueta 2, after the latter imposed the protection on the company and the Government. A particularity of the case is that the nature of the consultation is *not prior*, since the works involved have already been built and are in operation. However, part of the demands of the community refers to the fact that they were not consulted for the works and operations that have already been carried out and that have more than thirty years of coal mining. In this sense, the company

37 <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente/descripcion-de-las-obras/la-consulta-previa.aspx>

argues that it did not do so because at that time there was no prior consultation mechanism within the laws that regulate mining in Colombia.

Thus, what is intended to be highlighted here is the absence of a procedure, since there is no strategy to define instruments that resolve the retroactive character of the ethnic territorial focus, in response to the lack of this norm and the accumulated impacts generated by the coal exploitation and export activities on the human and fundamental rights of indigenous communities.

Another relevant point observed is the way and mechanisms in which previous consultations are developed within a framework of social, economic and political inequality. During one of the meetings, attended by the research team, there was a hard discussion between the company Cerrejón and the community Horqueta 2. On the one hand, Cerrejón, based on the formal points of prior consultation, on the dynamics of identifying positive and negative social and environmental impacts generated by the works, to propose solutions and comply with legal requirements and, on the other hand, the community, stating that in the consultation, neither the Government nor the company come to understand the cosmovisions of their territory, exposing the historical character of the socio-environmental problems experienced on a daily basis, highlighting the limited scope in the application framework of the prior consultation instrument and also the identification of management measures.

With that, as a problematic subject, the differences between knowledge based on an economic model and an imperative Western life, legitimized by the Government, and the ways of knowing the community are evident; because, despite having the support of professionals and organizations that defend their interests and position, communities have their own criteria vis-à-vis the Government and the company. These dif-

ferences undoubtedly weaken the guarantee of ethnic and fundamental rights that the latter must uphold.

In this scenario, the role and action of public institutions, as guarantees and mediators of the process, is limited to being only witnesses or moderators in the consultation process, without the capacity to intervene in the face of the demands of communities in the intercultural sphere. Especially, to recognize its vision in the construction of a public policy model that integrates the different forms of life. The Government does not appear here as an actor in the territorial model for mining, to guarantee communities their participation in the decisions on these economic projects.

Thus, the great limitations of the participation mechanism for prior consultation are observed, in terms of demand and solution to the historical problems experienced by these communities in their territory as a result of mining activity, and in the projection of their future rights, remaining in the receiving end of social and environmental impacts generated by mining.

As can be seen in this research, the previous consultation did not answer the structural problem of the territory, the right of communities to remain in it and respect for their ways of life; on the contrary, what was seen was the reduction of their territories due to the expansion of mining projects. Without a comprehensive mining-territorial planning instrument, it is not possible to make a comprehensive consultation that actually complies with the guidelines of the ILO Agreement 160.

The Government, the company and the communities need to have mechanisms that address the historical character and that solve both the specific impacts and the historical debts, since there was no consultation with the communities prior to the beginning of the mine work because, at the time there was no law for the recognition of the fundamental

rights of ethnic communities, nor even the instrument of protection, acquired from the current Political Constitution of 1991. This reveals the need for other types of instruments, the application of which will no longer be prior, that can look back and settle the accounts in future terms.

4. Final considerations

4.1. A historical view on the violation of fundamental and ethnic rights in the mining value chain.

The evolution of the recognition of fundamental rights, configured since the Political Constitution of Colombia in 1991, with a broad vision of ethnic and collective rights and an important ecological vision, generated a transition between collective and individual rights in the communities affected by mining activity projects, with visible changes in the different forms of negotiation between companies and communities, established since the 1970s/1980s, within the framework of a precarious model of public development.

In the Cerrejón mining project, the adjustment supposes these provisions occur amid the evolution of its prospecting, exploration, expansion and decommissioning cycle. Since the beginning of its exploration activity in 1979, the exploration phase in 1985, the expansion of new mining areas in 1998, an extension of the contract in 1997, the vein of public participation in 2000, the change of owners in 2002 and the establishment of a Comprehensive Environmental Management Plan in 2005.

While, on the part of the mining-territorial policy, in the state of La Guajira, an institutional transition has been observed since 1983, when the La Guajira Regional Autonomous Corporation (Corpoguajira) was

created³⁸ by Decree 3453, initially linked to the National Planning Department (DNP), which had among its main functions to “prepare, adopt and execute the Master Development Plan in the jurisdiction, in accordance with the policies and guidelines of the national, regional and departmental development plans”; as well as “formulating mechanisms for the coordination and execution of plans, programs and projects that public entities of all kinds must carry out (...)”. In 1984, the Government recognized the indigenous territory of the Medium and Upper Guajira reserve, which together with 27 reserves total 12.994 km², 62% of the state. This, together with the functions of Carbocol S.A., created in 1976, representing the interests of the nation³⁹ in association contracts for the prospecting and exploration of Cerrejón Zona Norte, constituted an institutional design to link the mining project to territorial development, which was gradually dismantled or turned into inoperative as was analyzed in this study.

An analysis of the complexity of the previous transit reveals normative gaps for its implementation and updating, which for the case of the Cerrejón mining project in La Guajira, highlights the lack of instruments for full guarantee of respect for the human and fundamental rights of communities, as seen in the study of the particular resettlement processes of Afro-descendant communities, in the expansion of La Puente pit that led to the diversion of Bruno stream, and in the expansion of Puerto Bolívar, where communities manifest a historic debt, especially for the loss of land and territories, strong impacts on their cultural activ-

38 It currently defines its mission as: “Corpoguajira is the highest environmental authority in the state of La Guajira, responsible for managing renewable natural resources and the environment, generating sustainable development in its area of jurisdiction”. <http://Corpoguajira.gov.co/wp/mision-y-vision/>

39 Political Constitution of 1886. Art. 2. Sovereignty resides essentially and exclusively in the nation, and public powers emanate from it, which will be exercised under the terms established by this Constitution. Art. 4. The Territory, with the public property that are part of it, belongs exclusively to the nation.

ities and negative impacts on health, due to noise and air contamination due to the passage of the train and the coal dust that spreads in the air.

This transition also had repercussions in situations of fragmentation within communities, as in the case of Afro-descendants, where - as noted in the previous chapter - there is a special view of the negotiation process with the company and about the requirements of their rights, which they were not only done collectively, but, in many cases, individually or privately. A situation that was perceived as a disarticulation of the members and, in practical terms, produced an impact of the forms of negotiation in the new forms of recognition of the subjects of collective rights. This is partly due to the lack of institutional follow-up, including, due to the lack of knowledge of the jurisprudence in this matter by the communities.

On the other hand, the lack of a specific normative development for the implementation of the historical, legal and evolutionary transition of mining activity, added to the absence of the Government in territorial and mining planning, was assumed by the company under precepts of corporate social responsibility, guides for good practices and human rights protocols. This converted the problems in replacing the role of the Government in guaranteeing these rights due to its functions of territorial development.

The foregoing makes the need for periodic mechanisms for reevaluation and updating of changes in socio-environmental, climatic, demographic, political, economic and cultural transformation of communities unquestionable, as a dynamic context of mining activity that would allow the definition of targets subject to review on environmental and social management, together with the evolution of technical market variables and mining planning, which imply the expansion and concept of decommissioning.

The technical mechanisms for designating the value of compensation, as in the case of resettlement of black communities, are seen as insufficient given the lack of recognition of a historical and territorial context where their social demands are configured. In applying the criteria to characterize families based on the magnitude of compensation, such as the right to resettlement, tensions in the negotiation processes and agreements between the company and the communities were notorious.

This has consequences not only in the comprehensive updating of the mining model, but also with effects contrary to the communities' own integrity, such as the tendency towards their internal fragmentation. Adding this to the gaps in the national legislation on resettlement that does not allow to account for specific realities, which in turn are linked to instruments of territorial planning, so that they are part of the normative and administrative decisions of the development of mining activity at large scale in their particular contexts.

4.2. Absence of a socio-territorial view on the environmental management of mining activities

There is a negative perception by the ethnic communities of La Guajira about the environmental impact studies carried out by the company, the definition of its areas of direct and indirect influence and the corresponding management measures. In this sense, several problem points will be identified here.

Considering the differential focus, it is important to critically consider the concept of direct impact presented by the Constitutional Court in relation to the instruments to fulfill the purposes of ILO Agreements 169. This notion proposes to review the perspectives on which the areas of direct and indirect influence are defined, integrating broader conceptions about territory and time, which are not limited to the physical and

present occupation of space. Although the direct impact is defined for each case in the intention of expansions, modifications, changes in the conditions of the project and the corresponding impact on its surroundings, in a fragmented and short-term manner, which causes, in each case, historical tensions and demands for socio-territorial integrality. A situation that would be at the basis of the Court's pronouncement, but that, without a doubt, would require the development of instruments, in addition to licensing and environmental management plans, that fully consider territorial planning, mining planning and regional development.

Therefore, in these changes it would be necessary to provide for long-term planning and, at the same time, an update of the articulated mining/territory model as a process of collective and participative construction with communities and in which public institutions have an active and regulating integral role and not just monitoring the process.

As an illustration of the previous situation, there is the case of the Bruno stream, a significant place within the worldview of the Wayúu, Horqueta 2, Paradero and Gran Parada indigenous communities. The stream was diverted by Cerrejón for the development of its project to expand La Puente, one of its lodes. The company had to carry out a prior consultation *a posteriori*, that is, when the deviation had already been carried out, since under a fragmented approach it had defined an area of influence in which the communities were not present - and, therefore, would not be affected -, so they were not consulted. However, the Court recognized the demand from communities in which they express complaints for a long-term historical process, considering that the diversion of the stream would have an impact on their culture, and ordered the consultation.

In contexts like the previous one, the importance of revising a methodology for determining areas of influence in the modification or expansion of mining projects is clear, since it is necessary that it has a specific

character, considering the socio-cultural conditions of the territory and the historical development of the projects themselves. Likewise, prior consultation mechanisms must seek to fulfill their basic purpose: “The fundamental right of the community to preserve integrity”, and to cease to appear simply as a negotiation of specific interests. This is because the experiences presented confirm the lack of a comprehensive view when applying these instruments and mechanisms, which prevents real participation by communities (in structural terms, from their social and cultural ways of life), as the main participants of decisions on their territories, which must affect the limits and dynamics that would define mining activity.

Another component of the problem is the recognition of impacts on human health, such as respiratory and skin diseases that have arisen within communities and which, on repeated occasions, have been reported by these and some institutions. Although there is a presumed lack of evidence and studies on these impacts, such as a deficiency in the designation of competent entities for their verification, a study carried out by the company ensures that there is no direct causal relationship between contact with particulate matter emissions and the emergence of these diseases. According to this study, although there may be a certain number of respiratory diseases in the La Guajira region, there would be no evidence that they are related to coal mining, but that they would correspond to social practices, such as the preparation of food on wood stoves, among others.

It is necessary to take into account that the referred study represents the company’s perspective and that it was carried out on a small scale. In this sense, there is institutional incompetence and the absence of a public policy to advance epidemiological research on the part of independent institutions, which make it possible to clarify the relationship

between coal mining and the effects on human health, and which aim to ensure a healthy environment and the health of potentially affected communities in La Guajira.

4.3. Certification of the presence of ethnic communities in the definition of areas of influence

Regarding the relationship between the determination and zoning processes of the areas of direct and indirect influence of the project's modification components; the certification of the presence of ethnic communities and prior consultation constitute an integral, determinant dimension of the fundamental right of the community to preserve integrity; which, in a project in an advanced stage with accumulated historical and territorial impacts, requires a complex and integral problematization that also acts on these conditions, and not in a fragmented way. This, in the understanding that prior consultation is not an end in itself, but a means to guarantee ethnic rights.

Complementing this, it is essential that the Government, in all its hierarchies, make strenuous efforts for the systematic registration of the country's ethnic communities, within the certification process of the Ministry of Interior, through the elaboration of in-depth studies that lead to a detailed understanding of socio-territorial relations. Everything must be done in an articulated way between national and territorial institutions and with other private organizations. Furthermore, providing for the coordination of information management, so that the Government as a whole - and not just the Ministry - is aware of the territorial realities and fully and participatively assesses the impacts that these communities may suffer as a result of the mining activity.

4.4. Prior consultation and free, prior and informed knowledge

It is crucial to build, in a participatory manner, planning and monitoring instruments that are related to the need for historical recognition of violations of the fundamental rights of ethnic communities, with an integral and historical focus on the impacts and affects generated. Under that light, territorial and ethnic perspective, the problem of land and territory are especially important, as cardinal elements for the reconstruction and historical compensation and for the preservation and current and future guarantee of these rights.

Since general views with exegetical applications are a risk for the concrete solution of problems and the real claim of rights, in matters of resettlement, it is necessary to review and build a regulation that incorporates a specific differential, socio-cultural and territorial approach, as well as the particularities of long-term mining planning. This, considering the updated context of collective rights, from the government's function of providing basic public services, labor, productive projects and reconstruction of social structures, among others. All on the basis of territorial planning by the Government, so that the decision and the consequences on resettlement do not depend exclusively on the transnational company and the World Bank's performance standards, but that they are coupled with the country's territorial realities and policies and their municipalities.

The follow-up and legal advice that should be provided to ethnic communities also requires regulation on how, who and by what mechanisms and methodologies to carry it out. On the other hand, the company cannot be solely responsible for the process in its entirety, as this distorts the consultative process, as well as the action of the Government, which must guarantee the fundamental rights of ethnic communities.

4.5. Timely, transparent and objective dissemination and access to mining project information

There are deficiencies in society's access to information, especially regarding decisions made on the planning and development of the mining project in the long term. This is, of course, both with respect to the changes and expansions in the mining activity in Cerrejón, and in the results of exploration, in the case of La Colosa.

In the first case, the situations found show, without a doubt, that ethnic communities are limited to the role of subjects of decisions taken by the Government and companies, rather than playing a determining role in decisions that affect their life dimensions. This reality can be observed in the current circumstances, but also since the beginning of the project, in 1984, due to the lack of information and previous participation, the insufficient socialization of the negotiation processes, the absence of debate, of accompaniment and advice for the communities, as well as the lack of development of mining regulations, linked to socio-territorial problems.

Thus, the projections for exploration, expansion, change in the state-mineral model and, in general, the long-term decisions of the mining operation do not adequately consult social realities, which prevents the incorporation of effective participation within the affected population. Thus, the subsequent development of the spectrum of collective rights for ethnic communities constitutes a debt expressed in current negotiation scenarios. This requires a broad and structural participatory process over the territory, including in the future perspective of mine decommissioning planning. The violent forms of relationship with the communities and the violation of their rights are encouraged by the Government itself, who is unable to reach a comprehensive mechanism that resolves the “updating” of these rights.

4.6. Disclosure of information on the exploration process

It is fundamental for the development and improvement of the principle of public utility, guaranteeing the right to democratic citizen participation of the communities, and the territorial authorities that represent them, in making decisions for the social and economic development of their territories, with access to information as to the research and exploration projects of large-scale mining activity that the national government plans to carry out in its territories.

It is necessary to coordinate the generation and dissemination of information by the national mining authorities, the Ministry of Mines and Energy and the National Mining Agency, responsible for granting mining titles to a private entity, defining mechanisms of certainty in view of the expectations of the phase of study and environmental assessment of mineral reserves that can be detected. Since exploration expectations are a risk, there must be a method of public information, in stages, to clarify the steps to be taken for decommissioning and to clarify the uncertainties about geological and mining risks to society. Obvious flaws in the way Anglo Gold Ashanti arrived in Tolima.

In the investigation phase, the presentation of public information about the project to the community, by the company, must offer transparency and be the result of verifiable protocols by the national, state governments and, mainly, by the municipality and its communities, as a scenario to minimize the risk of distortion of their access, management and dissemination. In the same way, this access must be followed by information on the results of mining exploration, on the assessment of extraction and benefit mining methods.

In turn, the research phase on mining must have a mechanism for the expectations generated about this type of activities that impact local

forms and costs of life, abrupt dynamics in the demand for labor, its connection with other economic sectors developing in the region, expectations of job stability - all with special and careful treatment in terms of exploration expectations.

The failure to disseminate information about the socio-environmental impacts that mining activity would generate was the cause of strong local and national debates between the private sector, the Government (national, departmental and municipal), communities and NGOs that research and work in defense of human rights related to mining. The disqualification of arguments from the sectors involved happens, in many cases, without having an independent and reliable information base between the parties.

This difficulty lies not only in the availability of data, but also in the design of a social, economic and environmental assessment methodology that allows a clear and simple understanding of mining activity by society. It is also necessary to make a reliable analysis of the cost-benefit ratio of the entire value chain, in relation to the economic activities of the territory; as the construction and expansion of transparency useful for decision making.

4.7. The role of the transnational company in the territories: investment and social participation

The role of the transnational company in the territories in terms of social investment and relations with territorial authorities, representatives of residents, implies problems in social investment actions. This, especially in the investigation stages, when the characteristics of the project have not yet been defined, socialized or assessed, represents the risk of affecting the acceptance of the project and the social consultation

process. On the other hand, the company's social investment practices, in a scenario of public deficit (institutional, administrative, economic and political), also constitute a risk scenario regarding the overvaluation of the real benefits and objectives of large-scale mining activity.

Local, regional and national political interests are not alien and may have an impact on the form and effects of the company's social investment, so that it can be used to generate resources or political capital, directly or indirectly, in favor of certain political campaigns or economic interests, ignoring the priorities and ways of life of communities in the territory. Because the analysis of local government configurations must be able to recognize a transparent scenario of democratic commitment by companies.

The convergence of emerging new normative provisions that regulate and allow the participation of the population in matters related to mining, such as popular consultation, requires clear mechanisms to explain to the community what this instance of participation is, its dimension and the scope of the decision in which they will participate, or also to explain the issues to be debated and the consequences on the social and economic development of their territories, including the design of the "question". Allowing the full exercise of the right to manifest on a territorial ordering and enterprise in which economic, social and environmental viability is guaranteed, and not limited to a simple plebiscite on mining, but to a consultation that concretely evaluates the alternatives for the development of regions.

References

Acosta, A. y Schuldt, J. (julho-agosto de 2006, p. x). Petróleo, rentismo y subdesarrollo: ¿una maldición sin solución? *Nueve Sociedad. Democracia y política en América Latina*(204), Recuperado de <http://nuso.org/articulo/petroleo-rentismo-y-subdesarrollo-una-maldicion-sin-solucion>

Acuña, J. P. (1999). Los Wayúu y los Cocina: Dos caras de una misma moneda en la resistencia indígena en La Guajira, siglo XVIII. *Anuario Colombiano de Historia Social y de la Cultura*(26), 1-24. Retrieved on November 15, 2017, from <http://www.bdigital.unal.edu.co/20600/1/16760-52514-1-PB.pdf>

Agencia Nacional de Minería (maio de 2017). *Código colombiano para el reporte público de resultados de exploración, estimación y clasificación de recursos minerales y reservas mineras (Borrador)*. Retrieved from https://www.anm.gov.co/sites/default/files/DocumentosAnm/ccrr_v1.docx.pdf

Alcaldía de Albania. (2016). Plan de desarrollo del municipio de Albania - La Guajira. Creer para crecer juntos 2016-2019. Retrieved on September 5, 2017, from Mayor Pablo Parra Córdoba: https://drive.google.com/file/d/oB2qdYdy_dG45XohMNVFvU2tCYUk/view

Alcaldía de Cajamarca. (2007). *Esquema de Ordenamiento Territorial*. Retrieved on November 25, 2017

Alcaldía de Cajamarca. (s.f.). *Aspectos generales del municipio*. Retrieved on November 22, 2017, from http://www.cajamarca-tolima.gov.co/informacion_general.shtml

Alcaldía de Cajamarca. (s.f.). *Mapa de Cajamarca Tolima*. Retrieved on November 13, 2017, from http://www.cajamarca-tolima.gov.co/mapas_municipio.shtml?apc=bcEl%20municipio%20en%20el%20departamento-1-&x=2097554

Prefeitura de Ibagué, T. (s.f.). *Location*. Retrieved on November 18, 2017, from <http://www.ibague.gov.co/portal/seccion/contenido/index.php?type=3&cnt=53>

Alcaldía de Piedras, T. (s.f.). *Información general*. Retrieved on November 18, 2017, from http://www.piedras-tolima.gov.co/informacion_general.shtml

Alcaldía de Uribia. (May 2016). *Plande Desarrollo del Municipio de Uribia “Todo por Uribia” 2016-2019*. Retrieved on September 3, 2017, from <http://www.uribia-laguajira.gov.co/Transparencia/PlaneacionGestionYControl/PLAN%20%20MUNICIPAL%20DE%20%20DESARROLLO%20DE%20URIBIA%20%20VERSION%20%20FINAL%20%20MAS%20%20FIRMS%20%20MESA%20DIRECTIVE%20%20Y%20%20PARRAFO.pdf>

Anglo Gold Ashanti. (2014). *Lo que usted debe conocer sobre AngloGold Ashanti 2014*. Retrieved on November 25, 2017, from Informe de gestión de la empresa en Colombia: http://www.anglogoldashanticolombia.com/wp-content/uploads/2014/12/lo_que_debe-saber-de-anglogold-ashanti-colombia-colosa.pdf

Arango Mendoza, JA (April 2014). *Proyecto de minería de oro La Colosa. Identificación ambiental de la zona de explotación y sus impactos*. Retrieved on November 17, 2017, from a Master's Thesis in Environmental Management from the School of Environmental and Rural Studies of Pontificia Universidad Javeriana de Bogotá: <https://repository.javeriana.edu.co/bitstream/handle/10554/13504/ArangoMendozaJulianAndres2014.pdf?sequence=1>

Bernal Arévalo, M. (July-December 2015). *Control social en el asentamiento colonial Nuestra Señora Santa María de los Remedios*

del Cabo de la Vela. (I. C. Antropología, Ed.). *Revista Colombiana de Antropología*, 51(2), 241-263.

Campeing, C. S. (November, 2013). *La Colosa: Una muerte anunciada. Informe Alternativo acerca del proyecto de Minería de Oro de AngloGold Ashanti en Cajamarca, Tolima, Colombia*. Cajamarca, Tolima. Colombia.: BM Colombia Solidarity Campaign. Retrieved on October 31, 2017, from https://colombiasolidarity.org.uk/attachments/article/610/LA%20COLOSA_Una%20Muerte%20Anunciada.pdf

Celedón, N. (November 6, 2014). *Esperamos que La Colosa tenga licencia ambiental en 2020*. Retrieved on November 15, 2017, from the online newspaper Portafolio - AngloGold Ashanti company website: <http://www.anglogoldashanticolombia.com/noticia/esperamos-que-la-colosa-tenga-licencia-ambiental-en-2020/>

Censat, CCAJAR, Cinep - Programa por la paz y Fuerza de Mujeres wayúu. (2015). *Informe de verificación arroyo Bruno, posibles impactos de su desviación*. Bogotá, Colômbia: Cinep. Retrieved on August 5, 2017, from <http://censat.org/es/publicaciones/informe-de-verificacion-arroyo-bruno-posibles-impactos-de-su-desviacion>

Centro Nacional de Memória Histórica. (s.f.). *Masacre de Cajamarca*. Retrieved on November 30, 2017, from Rutas del Conflicto: <http://rutasdelconflicto.com/interna.php?masacre=194>

Centro Nacional de Memória Histórica. (s.f.). *Masacre de Potosí*. Retrieved on December 10, 2017, from the official website of the Historical Memory Center: <http://rutasdelconflicto.com/interna.php?masacre=532>

Cerrejón. (2012). *Sistema de Gestión de Seguridad y Salud en el Trabajo (Sg-Sst)*, November 3, 2012. Cerrejón. Retrieved from <https://es.scribd.com/doc/204821335/Sistema-de-Gestion-Cerrejon>

Cerrejón. (2015). *Cada gota de agua cuenta: Informe de sostenibilidad 2015*. Puerto Bolívar, La Guajira: Cerrejón. Retrieved on September 10, 2017, from http://www.cerrejon.com/wp-content/2015-min/Informe%20sost_2015_version%20ejecutiva-min.pdf

Cerrejón. (2015). *Desarrollo sostenible y responsabilidad social en los reasentamientos*. Cerrejón. Retrieved on October 31, 2017, from <http://www.cerrejon.com/site/desarrollo-sostenible-%E2%80%A2-responsabilidad-social-rse/reasentamientos.aspx>,

Cerrejón. (June 10, 2016). *Finaliza presentación del proyecto La Puente – arroyo Bruno en foro de Corpoguajira*. Retrieved on October 30, 2017, from <https://www.cerrejon.com/index.php/2016/06/10/finaliza-presentacion-del-proyecto-la-puente-arroyo-bruno-foro-corpoguajira/> Cerrejon . (October 31, 2017). Retrieved from <http://www.cerrejon.com/site/desarrollo-sostenible-%E2%80%A2-responsabilidad-social-rse/reasentamientos.aspx>

Cerrejón. (s.f.). *Morbilidad por situaciones de salud en Cerrejón en 2012*. Cerrejón.

Cerrejón. (s.f.). *Antecedentes y Características del arroyo Bruno*. Retrieved on October 30, 2017, from <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente/descripcion-de-las-obras/antecedentes-de-la-obra.aspx>

Cerrejón. (s.f.). *Desarrollo de obras en el Tajo La Puente*. Retrieved on October 30, 2017, from <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente.aspx>

Cerrejón. (s.f.). *Obras del Tajo La Puente y descripción del desvío del arroyo Bruno*. Seção Descripción de las obras. Retrieved on October 29, 2017, from: <http://www.cerrejon.com/site/operacion-integrada/desarrollo-de-obras-en-el-tajo-la-puente/descripcion-de-las-obras.aspx>

Cerrejón. (s.f.). *Descripción de las Obras*. Retrieved on October 30, 2017, from the “Descripción de las Obras” section of the company’s website: <http://www.cerrejon.com/site/operacion-inte>

Cinep. (2016). *Informe especial Minería, conflictos agrarios y ambientales en el sur de la Guajira*. Retrieved on October 19, 2017, from <http://www.cinep.org.co/Home2/component/k2/item/234-informe-especial-mineria-conflictos-agrarios-y-ambientales-en-el-sur-de-la-guajira.html>

Cinep. (2016). *Necesitamos vivo al Bruno. La historia de un arroyo que no se quiere mover*. Retrieved on October 30, 2017, from <http://www.cinep.org.co/Home2/component/k2/item/190-necesitam-vivo-al-bruno-la-historia-de-un-arroyo-que-quiere-ser-inamovible.html>

Colombia Solidarity Campaign, B. (November 2013). *La Colosa: Una Muerte Anunciada. Informe Alternativo acerca del proyecto de Minería de Oro de AngloGold Ashanti en Cajamarca, Tolima, Colombia*. Retrieved on November 21, 2017, from https://www.colombiasolidarity.org.uk/attachments/article/610/LA%20COLOSA_Una%20Muerte%20Anunciada.pdf

Committee for Mineral Reserves International Reporting Standards (July 2006). *International Reporting Template for the public Reporting of Exploration Results, Mineral Resources and Mineral Reserves*. 2006. Retrieved from http://www.criresco.com/criresco_template_v2.pdf

Consejo Nacional de Política Económica y Social. (August 20, 2013). *Lineamientos de política para el desarrollo de proyectos de interés nacional y*

estrategicos – pines [Conpes Document 3762]: DNP. Retrieved from <http://parquearvi.org/wp-content/uploads/2016/11/Documento-CONPES-3762-de-2013.pdf>

Contraloría General de la República (November 2016). *Uso y manejo de las regalías La Guajira 2012 y 2015*. Retrieved from https://www.contraloria.gov.co/documents/20181/600907/Uso+y+manejo+de+las+regal%C3%ADas+La+Guajira_13_dezembro_2016.pdf/31072221-be34-4ec6-87e0-f10874a8747f?version=1.0

Corpoguaajira. (2007). *Estudio de Calidad del Aire en la Jurisdicción de Corpoguaajira: Municipios de Maicao, Riohacha, área de influencia de carbones El Cerrejón y Termoguaajira*. Riohacha: Corpoguaajira.

Corpoguaajira. (2009). *Plan de Manejo de Reserva Forestal Protectora de los Montes de OCA (RFPMO)*. Riohacha: Corpoguaajira. Retrieved on October 30, 2017, from http://www.corpoguaajira.gov.co/web/attachments_Joom/article/946/PLAN%20DE%20MANEJO%20DE%20LA%20RFPMO.pdf

Corpoguaajira. (2010). *Informe Calidad del Aire. Corredor minero año de 2009. Guajira*. Riohacha: Corpoguaajira. Retrieved on November 1, 2017, from http://www.corpoguaajira.gov.co/web/attachments_Joom/article/126/calidad2009.pdf

Corpoguaajira. (April 14, 2016). *Corpoguaajira no aprobó desvío de arroyo bruno*. Retrieved from News Section: <http://Corpoguaajira.gov.co/wp/Corpoguaajira-no-aprobo-desvio-de-arroyo-bruno/>

Corpoica y Cortolima. (2009). *Informe final Estudio de Estado Actual (EEA) y Plan de Manejo (PM) de los páramos del departamento del Tolima*. Retrieved on December 13, 2017

Cortolima. (1). (s.f.). *Proyecto Plan Ordenación y manejo de la Cuenca hidrografía del Río Coello: Fase II diagnóstico*. Retrieved on December 13, 2017

Cortolima. (2). (s.f.). *Proyecto Plan Ordenación y manejo de la Cuenca hidrografía del Río Prado: Fase II diagnóstico*. Retrieved on December 12, 2017

Cortolima. (October 2014). *Cajamarca y La Colosa en la Agenda Nacional*. Retrieved on December 5, 2017, from <http://cortolima.gov.co/boletines-prensa/cajamarca-colosa-agenda-nacional>

Defensoría del Pueblo. (2014). *Crisis humanitaria en La Guajira 2014: Acción integral de la Defensoría del Pueblo en el departamento*. Bogota: Defensoría del Pueblo.

Dejusticia. (March 23, 2017). *Precisiones sobre el alcance de la consulta popular y su impacto sobre los proyectos mineros en curso*. Retrieved on December 17, 2017, from https://www.dejusticia.org/wp-content/uploads/2017/04/fi_name_recurso_932.pdf

Departamento Administrativo Nacional de Estadística (s.f.). *La visibilización estadística de los grupos étnicos colombianos*: DANE. Retrieved from https://www.dane.gov.co/files/censo2005/etnia/sys/visibilidad_estadistica_etnicos.pdf

EITI Colombia. (December 5, 2017). *Iniciativa mundial validará avance en transparencia de industria extractiva colombiana*. Retrieved on December 26, 2017, from <http://www.eiticolombia.gov.co/noticias/iniciativa-mundial-validara-avance-en-transparencia-de-industria-extractiva-colombiana>

Fedesarrollo (February 2016). *Contribución fiscal de la operación minera de El Cerrejón a las finanzas públicas y situación fiscal de las entidades territoriales de su área de influencia en el departamento de La Guajira 2000-2014*. Retrieved from <http://www.repository.fedesarrollo.org.co/>

bitstream/handle/11445/2970/Repor_Febrero_2016_Fuentes_y_Delgado.pdf?sequence=3&isAllowed=y

Foro Nacional por Colombia. (September 2014.). *El sector extractivo en Colombia 2013, Observatorio de las Industrias Extractivas en Colombia*., Bogotá, Colômbia: Brot Für die welt.

Gallo Óscar and Pico Carmen. (2017). *La salud laboral en el sector minero. La invisibilidad de las enfermedades laborales en el Cerrejón*. Medellín, Colômbia: Escuela Nacional Sindical.

Gobernación de La Guajira. (September 2014). *Plan de desarrollo departamento de La Guajira 2014-2015*. “Por Nuestra Guajira, Hagámoslo Juntos”. (G. d. Guajira, Ed.) Retrieved on October 20, 2017, from <http://www.laguajira.gov.co/web/la-gobernacion/planes-de-desarrollo/42-plan-de-desarrollo-2014-2015.html>

Gobernación de La Guajira. (2017). *Informe conflictividad minera*. Riohacha: Gobernación de La Guajira.

Regional Government of Cajamarca. (2010). *Plan de Desarrollo Regional Concertado, Cajamarca 2021*. Cajamarca: City Hall of Cajamarca, Tolima.

Chilean Mining Engineers Institute (2003). *Código para la certificación de prospectos de exploración, recursos y reservas mineras 2003*. Retrieved from http://www.criusco.com/chico_espanol.pdf

Instituto Geográfico Agustín Codazzi - IGAC. (2003). *Mapa Físico Político del Departamento de La Guajira. Mapa digital integrado*. (IGAC, Ed.) Retrieved on December 10, 2017, from http://geoportal.igac.gov.co/mapas_de_colombia/igac/mps_fisicos_deptales/2003/Guajira.pdf

Julio-Estrada, J. y Herrera, D. (2016). Los instrumentos de ordenamiento territorial y la minería del carbón a gran escala en Colombia: la

reglamentación del uso del suelo minero en los Planes de Ordenamiento Territorial de los municipios con mayor producción carbonífera. In J. C. Henao, *Minería y desarrollo. Tomo 5: Historia y gobierno del territorio minero*. Bogotá, Colômbia: Universidade Externado da Colômbia.

Ministry of Environment and Sustainable Development. (2011). *Términos de referencia para el sector minería para la realización de Estudio de Impacto Ambiental. Dirección de Licencias Permisos y Trámites Ambientales*. Bogota: MinAmbiente y Desarrollo Sostenible. Retrieved from https://www.anm.gov.co/sites/default/files/normativas/term_ref_explotacion-mineria_o.pdf

Ministry of Mines and Energy - UPME. (October 2016). *Boletín Estadístico Minas y Energía. 2012 - 2016* Retrieved on December 15, 2017, from http://www1.upme.gov.co/simco/Documents/Boletin_Estadistico_2012_2016.pdf

Ministerio de Minas y Energía, ANM y UPME. (2014). *Plan Nacional de Ordenamiento Minero PNOM. Documento en Extenso Anexo a Resolución UPME 0256 de 2014*. Retrieved on December 25, 2017, from UPME Resolution 0256: http://www1.upme.gov.co/simco/PlaneacionSector/Documents/PNOM_EN_EXTENSO.pdf

Ministerio del Interior. (May 19, 2014). *Protocolización en consulta con comunidad wayúu*. Bogota: Ministerio del Interior. Retrieved on December 12, 2017, from <http://www.mininterior.gov.co/sala-de-prensa/noticias/protocolizacion-en-consulta-con-comunidad-Wayúu>

Ministerio del Interior. (2013). *Consulta Previa un derecho de los grupos étnicos*. Bogota: Ministerio del Interior. Retrieved on October 30, 2017, from http://www.upme.gov.co/Memorias%20Convocatoria%20Redes%20de%20Alto%20Voltaje/MININTERIOR_CONSULTA-PREVIA.pdf

Ministerio del Interior. (May 2017). *Acta de preconsulta: cumplimiento de la sentencia T-704 de 2016*. La Guajira: Ministerio del Interior.

Morillo Arapé, A. (January-June 2011). Representaciones sociales de la vivienda urbana indígena: Una aproximación desde los Wayúu en Maracaibo, Venezuela. *Espacio Abierto Cuaderno Venezolano de Sociología*, 20(1), 159-190. Retrieved from <http://produccioncientificaluz.org/index.php/espacio/article/view/1429>

Múnera, L., Granados, M., Teherán, S. y Naranjo, J. (Jan-Jun 2014). Bárbaros Hoscós. Historia de resistencia y conflicto en la explotación del carbón en la Guajira, Colombia. *Opera*(14), 47-69.

Municipality of Barrancas. (2002). *Esquema de Ordenamiento Territorial 2002-2010* “Volvamos al Orden”. Resumen ejecutivo.

Pardo, A. (s.f.). *Minería y Desplazamiento de Comunidades: El Caso de La Colosa en Cajamarca*. Colombia Punto Medio.

Presidencia de la República de Colombia. (Nov 22, 2017). *Declaración del presidente Juan Manuel Santos al término del Gabinete de Posconflicto con empresarios y firma decreto obras por impuestos*. Retrieved on December 19, 2017, from <https://www.minminas.gov.co/detalle-galeria?id=23951172&tipo=Video>

Ramírez Díaz, R., Ustate Arregocés, R., Arregocés Pérez, S., Múnera Montes, L., Granados Castellanos, M., Teherán Sánchez, S., . . . Rodríguez Gaitán, L. F. (2015). *Bárbaros Hoscós. Historia de la (des) territorialización de los negros de la comunidad de Roche*. Bogota: Cinep - Programa por la Paz. Retrieved on September 17, 2017, from <http://biblioteca.clacso.edu.ar/Colombia/cinep/20161102010122/20150202.barbaroshoscós.pdf>

Registraduría Nacional del Estado Civil. (2013). *En consulta popular celebrada el domingo 28 de julio, los habitantes de Piedras, Tolima, dijeron “no” a la exploración minera en su municipio*. Comunicado de Prensa 528.

Retrieved on December 5, 2017, from <http://www.registraduria.gov.co/En-consulta-popular-celebrada-hoy,10769.html>

Registraduría Nacional del Estado Civil. (2017). *Habitantes de Cajamarca (Tolima) dijeron no a la ejecución de proyectos y actividades mineras en este municipio. Comunicado de Prensa* 36. Retrieved on December 13, 2017, from <http://www.registraduria.gov.co/Habitante-de-Cajamarca-Tolima,23943.html>

Registraduría Nacional del Estado Civil. (s.f.). *Calendario Electoral*. Retrieved on December 17, 2017, from <http://www.registraduria.gov.co/-Calendarios-Electorales-.html>

Registraduría Nacional del Estado Civil. (s.f.). *Consultas populares: Mecanismo de participación creado por la Ley 134 de 1994*. Retrieved on November 30, 2017, from <http://www.registraduria.gov.co/Consultas-populares-mecanismo-de.html>

Registraduría Nacional del Estado Civil. (s.f.). *Estas son las preguntas más frecuentes sobre las autoridades locales en colombia*. Retrieved on December 20, 2017, from <http://www.registraduria.gov.co/Estas-son-las-preguntas-mas,18586.html>

Registraduría Nacional del Estado Civil. (s.f.). *Histórico de Consultas Populares*. Retrieved on December 17, 2017, from <http://www.registraduria.gov.co/-Historico-Consultas-populares-.html>

Robledo Silva, P. (2016). Los principios de coordinación, concurrencia y subsidiaridad: una posible solución a la problemática de reparto de competencias en materia minera. Em J. C. Henao, *Minería y desarrollo tomo 5: historia y gobierno del territorio minero*. Bogota: Universidad Externado de Colombia.

Universidad del Sinú. (2007). *Informe técnico final proyecto: evaluación de la exposición, efectos genotóxicos y susceptibilidad genética en una población ocupacionalmente expuesta a residuos de minería de carbón*. Montería, Córdoba. Colombia. Universidad del Sinú.

UPME 2014, Plan Nacional de Ordenamiento Minero – PNOM. Retrieved from http://www1.upme.gov.co/simco/PlaneacionSector/Documents/PNOM_EN_EXTENSO.pdf

Velázquez C., FE (April, 2016.). *Minería y descentralización en Colombia: Asunto no resuelto*. Bogota: Foro Nacional por Colombia.

Wilches-Chaux, G. (2011). *La red Tabaco de desarrollo endógeno. Un proceso de crecimiento humano, unión comunitaria, construcción de alianzas y fortalecimiento territorial a partir del conflicto*. Bogota: ARFO Editores e Impresores.

National Case Law

Council of State, Administrative Litigation Room, Fourth Section. (August 21, 2014) Relief Judgment 11001-03-15-000-2013-02635-00 (AC). [CP. Carmen Teresa Ortiz de Rodríguez]

Council of State, Administrative Litigation Room, Fourth Section. (December 7, 2016) Relief Judgment 11001-03-15-000-2016-02396-00. [CP. Hugo Fernando Bastidas Bárcenas]

Council of State, Administrative Litigation Room, Fifth Section. (December 15, 2016) 11001-03-15-000-2016-03415-00. [CP. Carlos Enrique Moreno Rubio]

State Council, Administrative Litigation Room. (October 13, 2016) Relief Judgment 44001-23-33-000-2016-00079-01. [CP. Martha Teresa Briceño de Valencia]

Constitutional Court. (October 29, 2009) Judgment T-769. [MP. Nilson Pinilla Pinilla].

Constitutional Court. (March 3, 2011) Judgment T-129. [MP. Jorge Iván Palacio Palacio].

Constitutional Court. (March 5, 2014) Judgment C-123 of 2014. [MP. Alberto Rojas Ríos].

Constitutional Court. (February 8, 2016) Judgment C-035. [MP. Gloria Stella Ortiz Delgado].

Constitutional Court. (May 25, 2016) Judgment C-273. [MP. Gloria Stella Ortiz Delgado].

Constitutional Court. (August 19, 2016) Judgment T-445 of 2016. [MP. Jorge Iván Palacio Palacio].

Constitutional Court. (December 13, 2016) Judgment T-704 [MP. Luis Ernesto Vargas Silva].

Constitutional Court. (9 August 2017) Auto 419 [MP. Luis Guillermo Guerrero Pérez].

National Normative (all original articles in Spanish)

ANLA. (July 18, 2012). *Pela qual se altera um plano de manejo ambiental e são adotadas outras determinações*. [Resolution 0572 of 2012] Do. Retrieved from http://comisiones.anla.gov.co/sites/default/files/res_0572_180712.pdf

Congress of the Republic of Colombia. (March 4, 1991). *By which Agreement 169 on indigenous and tribal peoples in independent countries, adopted by the 76th meeting of the ILO General Conference, Geneva, 1989, is approved.* [Law 21 of 1991]. Published in the Official Gazette on: 39.720.

Congress of the Republic of Colombia. (August 27, 1993). *By which the transitional article 55 of the Political Constitution is extended.* [Law 70 of 1993]. Published in the Official Gazette on: 41.013.

Congress of the Republic of Colombia. (May 31, 1994). *By which rules are dictated regarding mechanisms of popular participation.* [Law 134 of 1994]. Published in the Official Gazette on: 41.373/Retrieved on December 20, 2017, from <http://www.alcaldiabogota.gov.co/sisjur/normas/Norma1.jsp?i=330>

Congress of the Republic of Colombia. (Friday, July 15, 1994). *By which the Organic Law of the Development Plan is established.* [Law 152 of 1994]. Published in the Official Gazette on: 41.450.

Congress of the Republic of Colombia. (August 15, 2001). *By which the Mines Code is issued and other provisions are dictated.* [Law 685 of 2001]. Published in the Official Gazette on: 44.545/Retrieved on November 10, 2017, from <http://www.crc.gov.co/files/Normatividad/Mineria/685.pdf>

Congress of the Republic of Colombia. (July 11, 2012). *By which the organization of the Workplace Risk System is established.* [Law 1562 of 2012] DO: 48.488/Retrieved from <https://www.minsalud.gov.co/sites/rid/Lists/BibliotecaDigital/RIDE/DE/DIJ/Ley-1562-de-2012.pdf>

Congress of the Republic of Colombia. (July 6, 2015). *By which provisions are made regarding the promotion and protection of the right to democratic participation.* [Statutory Law 1757 of 2015]. DO: 49.565/Retrieved from http://www.secretariassenado.gov.co/senado/basedoc/ley_1757_2015.html.

Political Constitution of Colombia. [Const.] (1991).

Corpogujaira. (May 19, 2014). *Authorizes the unique use of forest in the lands of La Horqueta and La Holandês, located in the Campo Herrera - Cava La Puente region, in the jurisdiction of the municipality of Albania, La Guajira.* [Resolution 0096 of 2014]. Retrieved from <http://corpogujaira.gov.co/wp/resoluciones-2015/>

Corpogujaira. (August 22, 2016). *Cerrejón imposes a preventive measure that consists of suspending activities related to the emission of particles from the operation carried out in Puerto Bolívar.* [Resolution 1749 of 2016].

Ministerio de Ambiente y Desarrollo Sostenible. (May 19, 2014). *Through which the Environmental Management Plan is presented by the companies Carbones de Colombia S.A. (Carbocol) and International Colombia Resources Corporation (Intercor).* [Resolution 670 of 1998]. DO:

Ministerio de Ambiente y Desarrollo Sostenible. (July 15, 1994). *By which Resolutions 942 of 2002 and 1243 of 2002 are revoked, Resolution 797 of 1983 is amended, some files accumulate, a comprehensive environmental management plan is established and other determinations are dictated.* [Resolution 2097 of 2005]. DO:

Ministerio de Ambiente y Desarrollo Sostenible. (May 31, 1994). *By which the single regulatory decree of the environment and sustainable development sector is issued.* [Decree 1076 of 2015] Retrieved from <http://www.alcaldiabogota.gov.co/sisjur/normas/Norma1.jsp?i=62511>

Ministerio de Ambiente y Desarrollo Sostenible. (June 9, 2017). *By which the temporary removal of an area of the Central Forest Reserve established by Law 2 of 1959 is denied.* [Resolution 1087 of 2017] Do.

Ministerio de Hacienda y Crédito Público. (July 11, 2012). *By which title 5 of part 6 of book 1 is added to Decree 1625 of 2016, Single Regulatory in Tax Matters to regulate article 238 of Law 1819 of 2016*. [Decree 1915 of 2017]. DO: 50425. Retrieved from <http://es.presidencia.gov.co/normativa/normativa/DECRETO%201915%20DEL%2022%20DE%20NOVIEMBRE%20DE%202017.pdf>.

Ministerio de Minas y Energía. (May 19, 2014). *Prevention and Safety Measures in mining activity*. [Decree 035 of 1994] DO. Recovered from http://servicios.minminas.gov.co/compilacionnormativa/docs/resolucion_minminas_181467_2011.htm#POL%C3%8DTICA_NACIONAL_DE_SEGURIDAD_MINERA

Ministerio de Minas y Energía. (May 9, 2013). *By which Article 37 of Law 685 of 2001 is regulated*. [Decree 934 of 2013]. DO: 48785. Retrieved from <http://www.alcaldiabogota.gov.co/sisjur/normas/Norma1.jsp?i=53052>

Ministerio de Minas y Energía, ANM y UPME. (2014). *Plan Nacional de Ordenamiento Minero PNOM*.

Ministerio de Salud y Protección Social. (Saturday, July 26, 2003). *Pensions for High Risk activities and change and indicate the conditions, requirements and benefits of the pension system*. [Decree 2090 of 2003]. DO: Retrieved from https://normativa.colpensiones.gov.co/colpens/docs/decreto_2090_2003.htm

Ministerio del Interior. (October 12, 1995). *By which Chapter III of Law 70 of 1993 is regulated, the procedure for the recognition of the right to collective property of the “Lands of Black Communities” is adopted and other provisions are dictated*. [Decree 1745 of 1995]. DO: 42049. <https://www.minagricultura.gov.co/Normatividad/Decretos/Decreto%201745%20de1995.pdf>

Ministerio del Interior. (July 13, 1998). *By which prior consultation with indigenous and black communities is regulated for the exploitation of natural resources within their territory*. [Decree 1320 of 1998]. DO: 43340. Retrieved from https://www.mininterior.gov.co/sites/default/files/co-decreto-1320-98-consulta-previa-indigenas-_2.pdf

Ministerio del Interior y de Justicia. (October 29, 2007). *By which the Intersectoral Commission for the Advancement of the Afro-descendant Population of Colombia, Palenquera and Raizal is created*. [Decree 4181 of 2007]. DO: 46797. Retrieved from http://www.urosario.edu.co/jurisprudencia/catedra-viva-intercultural/Documentos/Decreto_4181_de_2007.pdf

Presidencia de la República de Colombia. (August 5, 2003). *By which Article 10 of Law 388 of 1997 is regulated*. [Decree 2201 of 2003]. DO: 45270. Retrieved from <http://www.alcaldiabogota.gov.co/sisjur/normas/Norma1.jsp?i=11532>

Senado de la República. (2017). *By which provisions are made regarding citizen participation*. [Draft bill]. Retrieved from <http://leyes.senado.gov.co/proyectos/images/documentos/Textos%20Radicados/proyectos%20de%20ley/2017%20-%202018/PL%20099-17%20Participacion%20Ciudadana.pdf>

Interviews

Cerrejón. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia. Interviewer)

Tolima Environmental Committee. (November 7, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (U. E. FCSH Research Team, Interviewer)

Patilla Community. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Roche Community. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Tabaco Community. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Councilor of Cajamarca (Tolima). (November 8, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Councilor of Piedras (Tolima). (November 9, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (EI FCSH, Interviewer)

Conciencia Campesina. (November 10, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Corproopia. (November 9, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. . (E. d. Colombia, Interviewer)

Cosajuca. (November 10, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

DNP delegate of the state of La Guajira, s. B. (August 10, 2017). Minería y Derechos Humanos, casos Cerrejón en La Guajira y La Colosa Regional en el Tolima. (E. d. Colombia, Interviewer)

Employee of the Ombudsman's Office of Colombia, Guajira Regional Office. (October 19, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Official of the Directorate of Non-Renewable Resources of the Mining Office, G. d. (November 7, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

García, Juan Carlos, Cerrejón Land and Resettlement Management. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Leader of the Kumusuchiwou Community. (October 19, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Maximiliano de Tabaco. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Ojada, Pablo, Attortney for the communities. (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Representative of the Roche Community Council (October, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Legal representative of the Association of Cajamarca Bean Producers (Aprofil). (November 10, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. . (E. d. Colombia, Interviewer)

Legal representative of Vereda El Diamante, C. (. (November 10, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

Planning Secretary of the City of Cajamarca. (November 9, 2017). Popular consultations and citizen participation processes on the activity of the mining company AngloGold Ashanti. (E. d. Colombia, Interviewer)

PRESS

Contagio Radio. (Wednesday, October 18, 2017). *Registraduría pide suspender consulta popular en Granada, Meta*. Retrieved on December 14, 2017, from <http://www.contagioradio.com/por-falta-de-presupuesto-se-suspende-consulta-popular-en-granada-meta-articulo-48063/>

Contagio Radio. (Tuesday, October 31, 2017). *El 10 de dezembro habrá consulta popular en Carmen de Chucuri, Santander*. Retrieved on December 19, 2017, from <http://www.contagioradio.com/el-10-de->

dezembro-se-hara-consulta-popular-en-carmen-de-chucuri-santander-articulo-48621/

Contagio Radio. (Tuesday, November 14, 2017). *Consulta popular en El peñón le gana una batalla a ministerio de minas*. Retrieved on December 20, 2017, from <http://www.contagioradio.com/consulta-popular-penon-le-gana-una-batalla-ministerio-minas-articulo-49033/>

Contagio Radio. (Friday, November 17, 2017). *El Carmen de Chucurí seguirá en lucha para lograr consulta popular*. Retrieved on November 15, 2017, from http://www.contagioradio.com/carmen_de_chucuri_consulta_popular-articulo-49097/

El Espectador. (Wednesday, July 18, 2012). *Análisis del caso AngloGold Ashanti Cajamarca*. Retrieved on December 3, 2017, from Infografía explicativa sobre una proyección muy general sobre el complejo aurífero La Colosa en Cajamarca Tolima <https://www.elespectador.com/noticias/actualidad/vivir/analisis-del-caso-anglogold-ashanti-cajamarca-articulo-361088>

El Espectador. (Tuesday, April 29, 2014). *Consulta popular en Monterrey se aplaza, no se cancela*. Retrieved on December 20, 2017, from <https://www.elespectador.com/noticias/nacional/consulta-popular-monterrey-se-aplaza-no-se-cancela-articulo-489414>

El Espectador. (Monday, March 27, 2017). “*Consulta minera en Cajamarca no tiene la capacidad de cambiar la ley*”: Gobierno. Retrieved from <https://www.elespectador.com/noticias/nacional/consulta-minera-en-cajamarca-no-tiene-la-capacidad-de-cambiar-la-ley-gobierno-articulo-686515>

El Espectador. (Wednesday, June 7, 2017). *AbreBocas El Espectador. Consultas populares*. Retrieved on December 20, 2017, from <http://acmineria.com.co/Video-AbreBocas-ElEspectador>

El Espectador. (Friday, November 10, 2017). *Consejo de Estado suspende consulta minera en Une (Cundinamarca)*. Retrieved on December 20, 2017, from <https://www.elespectador.com/noticias/judicial/consejo-de-estado-suspende-consulta-minera-en-une-cundinamarca-articulo-722588>

El Nuevo Día. (Monday, August 26, 2013). *En Espinal también se ‘cocina’ consulta popular sobre minería*. Retrieved from <http://www.elnuevodia.com.co/nuevodia/tolima/regional/192586-en-espinal-tambien-se-cocina-consulta-popular-sobre-mineria>

El Tiempo. (Thursday, June 8, 2017). *Los municipios que evalúan el futuro de la minería en sus territorios*. Retrieved on December 20, 2017, from <http://www.eltiempo.com/colombia/otras-ciudades/exploracion-minera-y-consulta-popular-en-44-municipios-de-colombia-96876>

El Tiempo. (Monday, November 6, 2017). *Las trabas de la consulta minera en Córdoba, Quindío*. Retrieved on December 20, 2017, from <http://www.eltiempo.com/colombia/otras-ciudades/las-trabas-de-la-consulta-minera-en-cordoba-quindio-148528>

El Tiempo. (Monday, November 27, 2017). *La Macarena, Meta, no pudo hacer su consulta minera*. Retrieved on December 20, 2017, from <http://www.eltiempo.com/colombia/otras-ciudades/no-se-realizo-la-consulta-minera-en-la-macarena-meta-155638>

Noticias Caracol. (Monday, November 27, 2017). *Habitantes de Une, Cundinamarca, piden consulta popular sobre explotación minera*. Retrieved on December 13, 2017, from <https://noticias.caracoltv.com/colombia/habitants-de-une-cundinamarca-piden-consulta-popular-sobre-explotacion-minera>

Portafolio. (Thursday, April 27, 2017). *Lo que pierde Cajamarca con la paralización del proyecto La Colosa: AngloGold también interrumpe*

programas sociales en los que ha invertido 54 000 millones de pesos en 14 años. Minera no ha explotado una onza de oro". Retrieved on December 20, 2017, from <http://www.portafolio.co/economia/lo-que-deja-anglogold-ashanti-en-cajamarca-505333>

Semana Sostenible. (Wednesday, July 26, 2017). *Consejo de Estado suspende la consulta popular en Pasca*. Retrieved on December 10, 2017, from <http://sostenibilidad.semana.com/medio-ambiente/articulo/consulta-popular-en-pasca-es-suspendida-por-el-consejo-de-estado/38281>

Peru: Study of Emblematic Cases of Social Conflict Over Large-scale Mining from the Human Rights Perspective

Cristina Blanco⁴⁰

Gustavo Zambrano⁴¹

Valeria Reyes⁴²

Eduardo Hurtado⁴³

Emily Button⁴⁴

Introduction

Within the framework of the project “Policies for the Regulation of Transnational Corporations due to Human Rights Violations in Latin America”, funded by the Ford Foundation, a diagnostic study was prepared on “The mining activity in Peru and its relations with human rights”. The main goal of the research was to design recommendations to the Peruvian normative and institutional framework to avoid the risk or impacts on human rights in the field of large-scale metal mining. The research focused on five rights: the right to property, a healthy environment, prior consultation, citizen participation and access to public information.

Based on the discoveries made, this study proposes to deepen some aspects of concern around cases that can be considered “emblematic” in terms of socio-environmental conflict, especially in the mining sector. The central focus of the study is to detect flaws in the relevant normative and institutional framework in the field of mining, from a human rights perspective, evidenced from cases considered to be “emblematic”. That is why the emphasis of the analysis is to look at the performance of the Government and its regulations, rather than that of other actors.

Methodology and case selection

A methodology based case study was applied. This type of methodological approach seeks to reach broad reflections on a certain phenomenon from the selection and analysis of specific cases. This strategy was developed from several academic sources, of which, for the purposes of this research, the work carried out by Michael Barzelay and Juan Carlos Cortázar (2004) stood out. These authors propose to view case studies in an instrumental way to respond to a concern, a problem question that exceeds these expectations. In this way, it does not seek to dwell on the details of each experience to be analyzed, but to use it to approach a larger reality. The analyzed cases are, in this sense, a means to an end.

The selected cases went through a document review stage in which the basic aspects of the project approval process and the social conflict presented were described. The compilation of the information included academic research related to mining in the country, the review of the human rights legal framework, official documents and private reports related to the selected cases. It is based on this that a concrete aspect

of the case began to be analyzed, which is especially problematic from a human rights perspective.

Although the reflections derive from specific cases, we intend to approach an issue that refers to mining activity in the country in more general terms. That is why the conclusions and recommendations presented can be understood for a phenomenon and not exclusively for the analyzed projects.

I. Analysis of emblematic cases from a human rights approach

With respect to each selected case study, a general description of the project is presented, which includes its basic characteristics and background for project approval. Subsequently, the most relevant events of the social conflict surrounding the project are described. This is not an exhaustive description, it is rather a reference to the facts most relevant to the analysis. Thirdly, the specific aspect selected in each project is analyzed, an analysis that is carried out mainly from a human rights focus. A last section in each case presents the main conclusions of the analysis.

1. Minas Conga Project

Location	Sorochuco and Huasmín districts in the province of Celendín; and in the district of La Encañada, in the province of Cajamarca. Approximately 73 kilometers northeast of the city of Cajamarca and 585 kilometers from the city of Lima, between 3.700 and 4.262 meters above sea level.
Products	Copper and gold
Approximate life	19 years (mineral processing in the last 17)
Current status	Suspended (authorized operation)
Communities in zone of influence	The project's EIA identifies 11 "caseríos", settlements that are considered within the area of direct influence 45 and 21 within the area of indirect influence ⁴⁶ .
Process method	Extraction of minerals from the open pit, Perol and Chailhuagón, located in the lagoon and the "bofedal" (highland swamp) Perol, and at the head of the Chailhuagón river basin.
Mineral reserve	Gold: 8 million ounces (Moz) potential with 6.5 million ounces / Copper: 4-6 billion pounds (Blbs) potential with 1.7 Blbs.
Mineral resource	Gold: 2.5 Moz / Copper: 0.84 Blbs.
Production	Nominal capacity of 92.000 tons per day (tpd), which allows processing of the mineral content of 3.1 trillion pounds of copper and 11.6 million ounces of gold.

1.1. Project description

Until 1990, mining operations in Cajamarca had consisted of the exploration of the silver mines in Hualgayoc, whose production started at the end of the colony's time. From 1990, the mining boom in Cajamarca

⁴⁵ According to the EIA, the 11 settlements that are considered to be within the area of direct influence are: Agua Blanca, Chugurmayo, El Porvenir de la Encañada, Huasiyuc Jadibamba, Lagunas de Combayo, Namococha, Piedra Redonda Amaro, Quengorio Alto, Quengorio Bajo, San Nicolás and Santa Rosa de Huasmín. Mineradora.

⁴⁶ The 21 settlements of indirect influence identified by the EIA are: Alto N° 8, Bajo Coñicorgue, Chilac N° 8, Cruz Pampa, El Alumbre, El Lirio, El Tingo, El Valle, Faro Bajo, Huangashanga, Jadibamba Baja, Jerez – Shihuat, La Chorrera, Quinuapampa, San José de Pampa Verde, San Juan de Hierba Buena, Shanipata, Tablacucho, Uñigán Lirio, Uñigán Pululo, Yerba Buena Chica; in the Districts of Sorochuco, La Encañada and Huasmín; Provinces of Celendín and Cajamarca.

took place, with the beginning in that same year of the first feasibility studies by the company Yanacocha⁴⁷ for the eponymous mining project, which started operating in August 1993.

The Minas Conga project (hereinafter “Conga”) started in 1991, when the Compañía de Exploraciones, Desarrollo and Inversiones Mineras (CEDIMIN) discovered the gold deposits in the Chailhuagón and Perol lagoons. In 2001, after Compañía Minera Buenaventura (CMB) acquired CEDIMIN, the Conga project became part of the Yanacocha operations, managed by Minera Yanacocha S.R.L. (MYSRL).

In January 2004, Yanacocha submitted to the Ministry of Energy and Mines (MINEM) the request for approval of the “Environmental Assessment of the Conga Mines Prospecting Project”⁴⁸. During the approval process for prospecting activities, a technical review and field observations were made, which were contested by the company, which gave rise to Report N. 089-2004-MEM-AAM/EM, of March 11, 2004, in which the approval of the study was completed⁴⁹. By Resolution of Direction N. 085-2004-EM/AAM, of March 17, 2004, the General Directorate of Environmental Affairs in Mining, of the Ministry of Energy and Mines (DGAAM) approved that environmental assessment, giving the green light for prospecting activities⁵⁰.

47 In 1992 Minera Yanacocha SRL was legally constituted (MYSRL, Minera Yanacocha or Yanacocha), formed by Newmont Mining Corporation (51.35%) with headquarters in Denver, United States; Compañía de Minas Buenaventura (43.65%), a Peruvian company; and International Finance Corporation (IFC) (5%), a member of the World Bank Group. See <http://www.yanacocha.com.pe>.

48 Ministry of Energy and Mines. General Directorate of Environmental Affairs in Mining. Direction Resolution N. 085-2004-EM/AAM of March 17, 2004.

49 Ministry of Energy and Mines. General Directorate of Environmental Affairs in Mining. Board Resolution N. 085-2004-EM/AAM of March 17, 2004, recitals five to eight.

50 Ministry of Energy and Mines. General Directorate of Environmental Affairs in Mining. Direction Resolution N. 085-2004-EM/AAM of March 17, 2004, articles 1 and 2. According to the first recital of this resolution, the exploration project is within category C of the Environmental Regulation for Mining Exploration Activities, approved by Supreme Decree N. 038-98-EM. It

Based on the prospecting activities, from 2005 to 2007 the Environmental Baseline Study was carried out, and since 2008 the engineering development of the project started, while drilling activities were continued. On February 9, 2010, the Yanacocha company presented the exploration environmental impact study (EIA) to MINEM, which had been prepared by Knight Piésold Consultores S.A., a company registered in the Register of companies authorized to prepare DGAAM's EIA⁵¹.

That same month, DGAAM issued its compliance with the project's "Citizen Participation Plan"⁵². On March 31, 2010, a "public hearing" for the presentation of the EIA was held at the San Nicolás de Chailhuagón settlement⁵³. Months later, in October, MINEM's DGAAM granted approval to the EIA for the exploration project under Directorate Resolution N. 351-2010-MEM-AAM of October 27, 2010⁵⁴.

On November 21, 2011, the then Minister of the Environment, Ricardo Giesecke handed over to the former Chief of Staff, Salomón Lerner Ghitis, a report with comments on the Conga mining project, of the Ministry of the Environment (MINAM), prepared by 25 specialists from different sectors of that Ministry. The existence of this document was the first thing to be denied by the Office, which became public in January

should be noted that it is based on the Citizen Participation Regulation approved by Ministerial Resolution N. 596-202-EM/DM.

51 Ministry of Energy and Mines. General Directorate of Environmental Affairs in Mining. Direction Resolution N. 351-2010-MEM/AAM of Wednesday, October 27, 2010. Considering a third party.

52 DGAAM. Directorate Document N. 064-2010-MEM-AAM, of February 16, 2010.

53 The company describes this audience as follows: "They were able to find out about the results of the Conga Project's Environmental Impact Study, present their concerns and demonstrate - in an open and inclusive dialogue - their willingness for Conga to be a part of the sustainable future of Cajamarca. See <http://www.yanacocha.com.pe> .

54 It should be noted that the person in charge at the time, Felipe Ramírez del Pino, was Yanacocha's Foreign Affairs and Communications manager between 2006 and 2009. See IDL. Reporteros. Inútiles estudios. April, 2011 Available at: <http://idl-reporteros.pe/2011/04/16/inutiles-estudios/>..

2012⁵⁵. In that document, the EIA of that project was analyzed and a further assessment was considered necessary for its viability.

In response, on February 14, 2012, the Spanish experts Rafael Fernández Rubio and Luis López García, and the Portuguese José Martins Carvalho were requested an “international expert report on the water component” of the project’s EIA. presented on April 2012. The most outstanding point of the investigation was that it proposed not to eliminate four lagoons, since the two that would be used for dismantling could be replaced by deposits⁵⁶.

In August 2012, the project was suspended until the end of 2013. Subsequently, the National Water Authority (ANA) issued a resolution authorizing the company to build the Chailhuagón deposit⁵⁷; and in October, it was learned that they would be building reservoirs in the region. Years later, the decision was made to reconsider the execution of the project⁵⁸.

1.2. The social conflict

The company-community relationship in this case did not start with the Conga project, it has endured for approximately thirty years. In general, it has been characterized by constant tensions linked to previous environmental incidents and complaints from the local population referring to other projects in the region. This scenario determined the distrust of the residents of the project’s regions of influence⁵⁹.

The social conflict generated by the Conga project reached an indefinite stage in September 2011, when there was a serious crisis for an indef-

55 IDL Reporteros. Here is the report for January 18, 2012. Available at: <http://idl-reporteros.pe/2012/01/18/aqui-esta-el-informe/>.

59 See ECOVIDA Environmentalist Association. Yanacocha. Balance Social. Year 2002; ARANA, Marco. *Agua y minería en Cajamarca: defendiendo el derecho al agua*. Cajamarca: Grufides. 2004. p. 10; GRUFIDES. Information service. *Intoxicación en Yanacocha*. February 29, 2008; GRUFIDES. Observatory of conflicts. Report: Jun10-Oct10.

inite period on the part of the residents of eight houses that opposed the project because they considered that the water sources would be affected. A month later, residents of La Encañada staged protests in which they blocked the Cajamarca-Bambamarca road and - as reported - residents of Chanta Alta who participated in the strike burned company machines. In response, approximately 100 military personnel from the National Directorate of Special Operations (DINOES) were sent to the area⁶⁰.

On October 24 of that year, approximately two thousand people visited the lagoons that would be affected and issued an ultimatum for the company to withdraw. Subsequently, the then Regional Governor of Cajamarca, Gregorio Santos, called the population for a regional strike that began on November 9. On November 24, an indefinite strike was launched against the project. Salomón Lerner Ghitis, prime minister at the time, called on the leaders for dialogue. On November 29, Yanacocha announced the suspension of the project. On that day, several protesters were shot by police. On December 4, the Government declared a state of emergency in Cajamarca, Celendín, Hualgayoc and Contumazá.

The escalation of the violence caused the head of staff, Salomón Lerner, to resign on December 10, and Óscar Valdés Dancoart was appointed in his place, who announced that he would call on a new international expert to evaluate the project's EIA, whose results determined its viability. In the days that followed, further attempts were made to resume the dialogue, but were unsuccessful. Thus, a dialogue table was set up on December 27, 2011, which excluded the former Regional President, Gregorio Santos. Mobilizations by local actors continued to be carried out,

60 Blog Lamula.pe. *Los últimos meses: Una cronología del caso Conga*. Available at: <http://lamula.pe/2012/04/18/los-ultimos-meses-una-cronologia-del-caso-conga/jimenard>.

and on February 1, 2012, the “Water March” began in Cajamarca, which arrived in Lima eight days later.

In July 2012, new demonstrations were held, with the balance of five deceased people and dozens of injuries - including three police officers - in addition to several detainees. These facts led to the resumption of dialogue, this time facilitated by the priest Gestión Garatea and Monsignor Miguel Cabrejos. However, all of these efforts have failed. In August, the government and the company announced the suspension of the project until the end of 2013. According to subsequent statements by the President of Buenaventura, a partner in the mining company Yanacocha, the Minas Conga project is no longer “viable”. He informed that the company no longer considered the deposit reserves as assets⁶¹.

1.3. The identification of communities affected by a project and the right to prior consultation

Between 2011 and 2013, the Conga project generated the main social conflict in the country. The central issue that called this project into question was the impact on the environment and, especially, on water, because according to the terms of the project approved by MINEM, it would represent the drought of four lagoons, would be located at the headwaters of the basins, among other important impacts.

Another aspect also debated by the public - albeit at a lower level - related to prior consultation and whether or not the measure that authorized it should have been a matter for consultation. The demand for this right was part of the discourse and actions of the organizations that carried out the process of opposition to the project. Peasant communities

⁶¹ Diario Gestión. Presidente de Buenaventura ya no considera viable el proyecto Minas Conga. Apr 26, 2016.

and patrols (peasant patrols) in the region, through their organizations and leaders, claimed to have the right to prior consultation. This is in the understanding that the project could affect their collective rights to land, territory and natural resources (such as water), and therefore there was no small relationship with the main issue that was debated around the project. The then Vice-Minister of Interculturality stated that the project should not have been consulted because the EIA was approved before the Consultation Law, enacted in August 2011, came into force.

At the time the project was approved, ILO Convention 169 was in force for the Peruvian State, which recognizes the right to prior consultation. There was also constitutional jurisprudence that had clarified the enforceability of the right to consultation based on Convention 169, although there was no internal rule to implement it. In fact, the Constitutional Court (TC) had already clarified that ILO Convention 169, in force for Peru since 1995, was part of our legal system, based on Article 55 of the Constitution. This provision expressly states that: “The treaties signed by the Government and in force are part of national law”. Therefore, the TC considered that “its application by all State institutions is mandatory”, regardless of the existence of an internal rule that implements it⁶².

In terms of Convention 169, prior consultation is a recognized right to communities identified as indigenous peoples. Thus, the key question to determine whether the project should have been consulted or not was whether the affected population - or at least part of it - had the elements to enter the category “indigenous peoples”, also defined in this treaty.

However, the Conga project was presented in a complex regulatory framework, which did not allow the affected population to be given technical answers and in accordance with international standards on the matter. In this section, we seek to explain how the issue should be dealt

62 TC. *Case N. 0022-2009-PI/TC*. Judgment of June 9, 2010. 2009, page 31.

with and how it is currently addressed from the perspective of public standards and institutions provided for by the Law of Consultation.

Can the population affected by the project be considered as an indigenous people?

The settlements, communities and peasant rounds affected by the project were distributed in 210 populated centers in the districts of Huasmín, Sorochuco, in the province of Celendín; Encañada in the province of Cajamarca; and the province of Hualgayoc-Bambamarca. Among them, approximately 69 communities were close to the 12 bodies of water that would have been impacted by the Conga project in the provinces of Hualgayoc-Bambamarca and Celendín.

The information available suggests that within the region affected by the project there would be recognized peasant rounds, such as that of San Juan de Huangashanga in the Huasmín District, Celendín Province, and the Sorochuco Peasant Community, in the Sorochuco District, Celendín. The vast majority of communities in the affected area are organized into peasant rounds⁶³. These communities are located between 800 and 4,000 meters high above sea level, in the inter-Andean valleys of the northern Sierra of Peru. The economic activity they mostly develop is agriculture and livestock, which are recognized in the project's EIA as the main activities in the region.

The project's EIA identified 11 settlements in the area of direct influence and 21 in the area of indirect influence of the project. According to the same document, the "area of influence" was determined based

⁶³ We have information from the peasant rounds of Vista Aleqre, Tupac Amaru, Número Ocho, El Lirio, Huasmín, Meléndez, Tingo, Pampa Verde, Laqunas, Juan Velasco, Chuqur, Sorochuco; in Encañada, there is the peasant league of Salacat; in Hualgayoc - Bambamarca, La Lumbre, El Tambo, Yaucan, Quengo Río, Chuqur.

on the most relevant environmental component, that is, water (surface- and underground)⁶⁴. Other communities in these provinces, as well as in the province of Cajamarca, requested to be included as being within the project's area of influence⁶⁵.

Regarding these 32 identified settlements, a Social Baseline study was carried out in order to “present relevant information for the Analysis of the Socioeconomic Impact of the project”. This baseline “[...] presented the main indicators on demography, health, education, income, expenses, economic activities, poverty and perceptions in the different areas of study”⁶⁶. In the study, the affected population is classified as “casaríos”, i.e., settlements, without mentioning their own forms of organization, such as peasant rounds, relationships with the land and the environment, cultural habits, or mentioning those communities registered as peasant. Another fact that reveals the absence of a sociocultural perspective is the profile of the specialists who prepared the study - biologists and engineers of different specialties -, among whom there are no professionals with degrees in sociology, anthropology and/or history⁶⁷.

64 Minera Yanacocha S.R.L. *Proyecto Conga: Estudio de Impacto Ambiental. Resumen Ejecutivo*. February 2010 Figure 3. Available at: <http://www.yanacocha.com.pe/operaciones/proyecto-conga/>.

65 In the Resolution of the Board 351-2010-MEM-AAM that approves the exploration, it is informed that the Municipal Administration of Bambamarca, Hualgayoc, requested “the inclusion of some communities of its jurisdiction in the area of influence of the project”. On this point, it is only reported that the mining company “submitted to DGAAM the response to the request”, without informing that the said Directorate has verified the information provided by the company to exclude these communities from the area of influence.

66 Minera Yanacocha S.R.L. *Proyecto Conga: Estudio de Impacto Ambiental. Resumen Ejecutivo*. February 2010 Figure 3. Available at: <http://www.yanacocha.com.pe/operaciones/proyecto-conga/>. p. 3-504. With respect to the sources, as stated in the document, the *Censo de Hogares y Vivienda* - Census of Homes and Housing - in the specific study area (32 settlements) carried out by the Institute of Statistics and Informatics (INEI) in 2009, collected data from two types of sources: official, such as INEI, MINEDU and MINSA; and previous studies carried out by external consultants such as Apoyo Consultoría through IPSOS Apoyo Opinión y Mercado (2007), SASE Consultores (2008) and the Pontifical Catholic University of Peru (2006)”.

67 Minera Yanacocha S.R.L. *Proyecto Conga: Estudio de Impacto Ambiental*. February 2010, pages 12-1 and 12-2.

Nevertheless, in an interview with the then Vice-Minister for Interculturality in April 2012, in which he was asked about the possibility that the Conga project could be submitted for consultation, far from denying that the affected communities are entitled to this right, he suggested that it is not appropriate to apply a consultation process since the EIA was approved before the Consultation Law came into effect. He added that “[it is] evident that the authority considered that there is no direct impact on a collective right of an indigenous people”⁶⁸. However, this is by no means evident in the review of the relevant project documents. This is predictable since the regulations applied to authorize prospecting and exploration are absent from any consideration of the indigenous character of the communities that could be affected by extractive projects and the right to consultation. It is even more complex if we realize that there are usually pre-conceived ideals and/or idealized conceptions about what is and what is not an indigenous person in our country, which can strongly determine our opinions about a certain group.

Despite the fact that any socio-cultural consideration of the affected population is invisible in the approval of the project, the information on the scope suggests elements that show that in the approval process, the possibility of meeting with groups that could enter the protection of the category of “indigenous peoples” should be considered. An element to be considered had been the existence in the region of at least some collectives registered as peasant communities. The existence of recognized peasant communities makes clear the need for a technical study to determine whether or not we have a group to which this category applies.

⁶⁸ Interview with former Vice Minister of Interculturality, Iván Lanegra on April 13, 2012. *Diario Gestión*. Available at: <http://gestion.pe/2012/04/13/economia/ivan-lanegra-proyectos-aprobados-estan-libres-consulta-previa-2000262..>

Additionally, there were expressions of a certain conscience or claim to belong to a collective in the process of opposition to the project. Peasant rounds officials referred to “indigenous peoples”, both in international and domestic mechanisms⁶⁹. On the other hand, the permanence of certain traditional cultural, social and economic elements in these communities could be assessed. One of the most relevant manifestations may be the peasant rounds themselves, as a different form of organization, with their own forms of rotation in community service⁷⁰.

It is pertinent to collect Alejandro Diez’s idea of seeing peasant communities in a dynamic way, as communities that “redefine themselves, adapt themselves and, as a consequence, they transform at the same time that they remain the same”. As the author states, there are processes of rediscovering ethnic identities linked to the international legal apparatus

69 For example, the National Single Peasant Rounds Center (CUNARC) in different pronouncements referred to “native peoples” (See CUNARC. *Resultados preliminares de la misión internacional*. March 11, 2013]. Thus, for example, public information informs that a petition from the “Indigenous Peoples of Cajamarca and their Leaders” was presented before the IACHR for the approval without consulting the Conga project [This reference was obtained from the report made by Bartolomé Clavero. CLAVERO, Bartolomé. Informe sobre visita a Cajamarca a propósito del caso Conga. March 16, 2013. p. 2.]. Likewise, information was presented on the impact of the project before CEACR. As a result, CEACR, in its 2012 observations regarding Peru, requested “To the Government that in its next report include detailed information on the measures taken to ensure respect for the Agreement and, in particular, its article 15 [referring to the rights of indigenous peoples to natural resources], in the situations identified in their previous comments and in the cases presented by social interlocutors and indigenous organizations [among them the Conga project]” [CEACR. Report 2012/102nd meeting Individual observation on Convention N. 169 on Indigenous and Tribal Peoples, 2013, Peru].

70 In this sense, the Ombudsman’s Office stated that: “Both the rounds of peasant communities, partners, residents of settlements or populated centers, and peasant communities with common land ownership, manifest a community identity of the people who integrate them, effectively control a territory and act in accordance with legal rules”. [Quoted in CEACR. Report 2008/79th meeting Individual observation on Convention N. 169 on Indigenous and Tribal Peoples, 2009, Peru, paragraph 2]. He continues to state that the source of the norm “is usually the habit, and can be shown in most cases as a constant practice since a certain moment in collective history, with awareness of the obligation and support of a public force in the community”. [CEACR. Report 2008/79th meeting Individual observation on Convention N. 169 on Indigenous and Tribal Peoples, 2009, Peru, paragraph 2].

that “built a context and a series of processes that instigate and seduce rural peoples and communities to take on new identities that enable them to have access to citizens’ rights or exclusive rights”⁷¹. It is also noted that there are cases in which it is a matter of simply adopting discourses for strategic reasons and that, in reality, they do not affect identities.

It is not possible to state with certainty whether or not the objective and subjective elements were present to classify the affected population or part of it as being “indigenous people”. To accurately determine the presence of these institutions would have required a technically adequate anthropological study, which should have been carried out before the project was approved. However, in this and other cases, due to the absence of norms that required them, an EIA was approved in which social and cultural aspects of the affected groups are excluded.

The identification of indigenous peoples as part of the prior consultation process

The social conflict in Conga highlights the need that, from an early stage in the process, a series of determination of whether or not collectives considered indigenous are affected. Until 2011, the Peruvian State lacked regulations and institutions that would allow this identification. This has been overcome - at least in formal terms - with the rules on prior consultation. The Consultation Law approved in 2011 establishes as one of its stages “the identification of indigenous or original peoples to be consulted”, and provides in its article 7 criteria to be taken into

71 DIEZ, Alejandro. (2012). *Nuevos retos y nuevos recursos para las comunidades campesinas*. In: *Tensiones y transformaciones en comunidades campesinas*. Lima: Cisepa-PUCP.

consideration⁷². Article 3.k) of the Prior Consultation Regulation Act contains a definition similar to that provided in ILO Convention 169⁷³.

We say that it was overcome in formal terms, as the difficulties arose in its practical application and concretely when the “official database of indigenous or original peoples and their institutions and representative organizations” was implemented. According to the Consultation Law, this base would be the responsibility of the “technical body specialized in indigenous matters of the Executive Branch”, that is, the Vice Minister of Interculturality of the Ministry of Culture⁷⁴. In this scenario, there was resistance to include in the database people other than Amazonians. Even the former President of the Republic, Ollanta Humala, stated that the indigenous communities entitled to consultation are the “isolated peoples and indigenous communities that do not have a democratically chosen representation [sic]”⁷⁵.

After several months of preparation, the change of authorities responsible for the office and the refusal to provide information, in October 2013, the Ministry of Culture announced the publication of the “Database of Indigenous Peoples”⁷⁶. According to the statement issued by that Ministry at the time of the disclosure, the information it contains is “reference, subject to improvement and permanent updating”,

72 Prior Consultation Law, article 8.2 and article 10.

73 Supreme Decree N. 001-2012-MC of April 3, 2012.

74 To implement this task, through Ministerial Resolution N. 202-2012-MC, Normative N. 03-2012/MC “that regulates the functioning of the Official Database of Indigenous or Originating Peoples” was approved.

75 Article entitled “Perú: Ollanta y su particular visión del derecho a la consulta previa”. Jun 13, 2012. Available at: <http://servindi.org/actualidad/66223>. Article titled: “Ollanta reitera que espíritu de Ley de Consulta es darle voz solo a comunidades nativas”. April 29, 2013 Available at: <http://servindi.org/actualidad/86489>.

76 Ministry of Culture. *Comunicado: Ministerio de Cultura inicia la publicación de la Base de Datos de los Pueblos Indígenas u Originarios*. October 25, 2013. <http://www.cultura.gob.pe/comunicacion/noticia/comunicado-ministerio-de-cultura-inicia-la-publicacion-de-la-base-de-datos-de>.

and will serve as “reference instrument that will allow the Government to advance in the design of public policies aimed at narrowing down the gap between indigenous citizens and the rest of national society”⁷⁷.

The database currently contains a list of 55 peoples, 4 of them Andean (Aymara, Uro, Jaqaru and Quechua), with information on their official name and the peoples’ self-denomination; relevant cultural and ethnic information; geographical references and institutions or organizations representing the community sphere. In other words, despite the resistance, it managed to include the Andean peoples at the base, but the determination of whether a particular community can be considered indigenous occurs in each case.

In fact, this determination rests on the public agency that promotes the adoption of the measure that could be the object of consultation, according to the Law of Consultation and its Regulation. In the case of mining, it would be the MINEM, while the Vice-Ministry of Interculturality (VMI), the governing body in the matter, has the power to issue opinions, by letter or at the request of the body, on the characterization of indigenous peoples⁷⁸. In order to favor the identification of the subject of consultation, in 2015 the VMI published a “Methodological guide for the stage of identification of indigenous or original peoples”⁷⁹. Several techniques and instruments for collecting information are established,

77 Ministry of Culture. *Comunicado: Ministerio de Cultura inicia la publicación de la Base de Datos de los Pueblos Indígenas u Originarios*. October 25, 2013. <http://www.cultura.gob.pe/comunicacion/noticia/comunicado-ministerio-de-cultura-inicia-la-publicacion-de-la-base-de-datos-de>. On 8 November 2013, additional information was published on the peoples belonging to the Toucan and Cahuapana language families. Ministry of Culture. *Comunicado: Nueva información para la Base de Datos de Pueblos Indígenas*. Nov 8, 2013. Available at: <http://www.cultura.gob.pe/comunicacion/noticia/comunicado-nueva-informacion-para-la-base-de-datos-de-pueblos-indigenas>.

78 Prior Consultation Law, article 10 and article 19.d; and Prior Consultation Law Regulation, article 8 and 28.3.

79 Available at: <https://www.cultura.gob.pe/sites/default/files/noticia/tablaarchivos/guiaidentificacionppifinal.pdf>.

such as semi-structured interviews, focus groups, illustrated concept map and community binders.

In practice, this exercise poses some difficulties. As Ocampo and Urrutia warn, the MINEM DGM asked consulting companies to identify indigenous or original peoples located in the areas of influence of mining projects.

The consultants concluded that the population identified in the area of influence of 25 projects was not indigenous, therefore, prior consultations for these projects were not carried out. Two of these projects were those of Aurora and Toropunto, where teams of consultants did not identify the peasant communities of Parobamba and Santa Rosa de Quikakayan, respectively, as being members of the indigenous or Quechua people [...]⁸⁰.

This generated adverse reactions and was criticized even by the then head of MINEM, Rosa María Ortiz. In response, some measures were taken to improve the identification of the consultation subjects, beginning with a request for the technical opinion of the VMI for this task. Recognition of the importance of carrying out fieldwork to identify peasant communities and populated centers that will be consulted has also been incorporated⁸¹.

This shows that important steps have been taken to make public decisions - such as approving a mining project - more respectful of our country's ethnic-cultural diversity. Although they are not unrelated to the

80 Ocampo, Diego and Isabel Urrutia. *La implementación de la consulta en el sector minero: una mirada a los primeros procesos*. In: *La implementación del derecho a la consulta previa en el Perú. Aportes para el análisis y la garantía de los derechos colectivos de los pueblos indígenas*. Karina Vargas (compiladora) GIZ: Lima, 2016 p. 174.

81 Ocampo, Diego and Isabel Urrutia. *La implementación de la consulta en el sector minero: una mirada a los primeros procesos*. In: *La implementación del derecho a la consulta previa en el Perú. Aportes para el análisis y la garantía de los derechos colectivos de los pueblos indígenas*. Karina Vargas (compiladora) GIZ: Lima, 2016 p. 175.

criticisms, several consultation processes have already been carried out in peasant communities in the field of mining and others are ongoing, which for years seemed unlikely⁸².

1.4. Conclusions

The Conga project, like many others, was presented at a time when the regulations and institutional apparatus were not prepared to determine whether the affected population could be considered indigenous. There were opposing positions in this regard, but there was no answer to this question raised by the Government. There was no formal assessment of whether the local population (including communities and peasant rounds) could apply the reactive legal framework to the rights of indigenous peoples and, consequently, the need for prior consultation was not seriously determined. The determination of the indigenous character of the population affected by a project, was not part of the approval process, precisely due to the lack of implementation of the right to prior consultation through internal rules.

This scenario shows that, with the development of international standards in the rights of indigenous peoples and international commitments signed in the matter, determining which collectives may be within that denomination is a key issue. The difficulties are not few, in the face of a history characterized by the search for disintegration and invisibility of these peoples; their reduction to communities, at best; and the exclusion and discrimination suffered historically for being “indigenous”.

Taking that into consideration, we see that two aspects arise in tension. On the one hand, with the recognition of rights, the concept of “people” is resumed in certain contexts, claiming indigenous identity

82 See Ministry of Culture. Prior consultation. <http://consultaprevia.cultura.gob.pe/>.

and ownership of the right to consultation. On the other hand, there are noticeable difficulties and resistance to apply prior consultation, in a broad way, to collectives that could present these characteristics to be considered indigenous. Although this has been reduced with the advance of technical-legal tools for its definition, once the determination is made on a case-by-case basis, it is urgent to pay attention to the concrete form in which its identification is carried out.

2. Las Bambas Project ⁸³

Location	It is located more than 4.000 meters above sea level, between the Provinces of Cotabambas and Grau, Apurímac Region, 70 kilometers southeast of the city of Abancay.
Products	Copper (gold and silver by-products) and molybdenum concentrates
Approximate life	26 years (mineral processing in the last 18)
Current status	Exploring
Communities in zone of influence	<p>20 Peasant communities in the region of direct influence: Huiancuire, Pamputa, Cconccacca, Carmen Alto de Chalhuhahuacho, Manuel Seoane Corrales, Quehuira, Chuicuini, Chicñahui, Choquecca, Pumamarca, Huanacopampa, Ccasa, Allahua, Ccahuarpirhua, Chumille, Huayulloc, Arcospampa, Congota, Sasahuilca, Fuerabamba.</p> <p>17 Peasant communities in the region of indirect influence: Ccayao, Ccocha, Ccollana, Charamuray, Chila, Choaquere, Huaccoto, Paycama, Huarca, Huayllahuyalla, Lacaya, Sepitalla, Tacrara, Tincurca, Tuntuma, Urinsaya and Urubamba.</p>

Continue →

⁸³ PROINVERSION (2005) Las Bambas. Un modelo de desarrollo sostenible. Lima: PROINVERSION, http://www.proinversion.gob.pe/RepositorioAPS/o/o/JER/LASBAMBAS_OTROS/OLasBambas.pdf PROYECTO LAS BAMBAS (2017) Página web institucional, Consulta 12 de dezembro 2017, <http://www.lasbambas.com/> ; RIVERA Luis (2015) Las Bambas. Lecture held at PERUMIN 2015, Arequipa September. Consulted December 12, 2017, <https://www.conventionminera.com/perumin32/doc/conferencias/topmining/lrivera.pdf>

Process method	Mining takes place in three open pits: Ferrobamba, Chalcobamba and Sulfobamba.
Mineral reserve	7.2 million metric tons of copper (0.73% copper law)
Mineral resource	12.6 million metric tons of copper (0.61% copper law)
Production	It is estimated that in the first five years more than 2 million tons of copper will be produced in concentrate. The concentrating unit was designed to treat 140,000 tons of mineral daily (which is equivalent to 51.1 million tons per year) and has additional capacity in the area it occupies to increase the grinding capacity.

2.1. Project description

Between 2003 and 2004, the Peruvian Private Investment Promotion Agency (PROINVERSION) carried out the international bidding process for the Las Bambas project, in the Apurímac region. In those years, a series of public hearings was held in that region to present the project. As a result of the hearings, the bidding terms of reference were modified, adding Annex K to them, called “Social conditions for the exploitation of the Las Bambas Mining Project”. This annex contained 17 points on social, environmental, economic and cultural aspects, considered as obligations for the investor⁸⁴.

⁸⁴ These aspects are as follows: (1) Perform an Environmental Impact Study for the preservation of the environment, flora, fauna and water resources; (2) provide job opportunities for professionals, technicians and workers in the province and region of the Department of Apurímac as a priority; (3) make investment in basic social infrastructure projects; (4) reallocating affected communities under appropriate conditions, prior payment of fair price in accordance with the law; (4) carry out the replacement of affected lands and pastures; (5) implementation of animal and agrarian health programs; (6) transferring technology and technical assistance in cultivation and breeding programs; (7) support the marketing of agricultural and livestock products; (8) respect culture, customs and fundamentally human rights; (9) offering health insurance to members of affected communities; (10) preferentially determine the perks and mineral royalty for the affected communities; (11) inspect externally with the participation of specialists to assess quantitatively and qualitatively the degree of contamination of water, soil and other resources, on a periodic basis, accompanied by an environmental committee aimed at preventing negative impacts; (12) having social and environmental responsibility by compa-

On August 31, 2004, Swiss-based Xstrata Cooper obtained the rights to explore the mining project. In October of that year, the option contract was signed between the Government and the company. In it, Xstrata delivered 45.5 million dollars as down payment of the social contribution as provided for in the contract, of which 50% was destined for the region of direct influence. This amount started to be managed by a trust fund within the framework of Law N. 28401, which includes social programs within the framework of Supreme Decree N. 033-93. This trust was called “Las Bambas Project Social support”⁸⁵.

To start the company’s activities, on February 28, 2005, the EIA for the prospecting phase was approved through Board Resolution 086-2005/MEM-AAM. Accordingly, on July 22, a usufruct agreement was signed between the company and the peasant community of Fuerabamba for a period of five years. The purpose of the agreement was to make use of their land for mining activity, to which the inhabitants would have to be relocated. Thus, from 2008, consultations on land for the resettlement of the Fuerabamba community began⁸⁶.

In 2009, the feasibility study was completed, with which it was decided to move on to the exploration phase. On May 14, 2010, the company presented the EIA for this stage before the MINEM DGAAM. For

nies, establishing positive relationships with communities; (13) integrate and harmonize mineral development with agricultural activities; (14) inform the inhabitants of the province and the region about draft contracts; (15) proceed with the signature of the contract in place of the project, with full knowledge of the authorities and civil society; and (16) channel the resources generated by the project to the communities involved in the province and region, hoping that the mining project will be responsible and that it will generate sustainable development.

85 GOULEY, Clotilde (2005) Conflictos mineros, interculturalidad y políticas públicas: el caso de Las Bambas, provincias de Cotabambas y Grau, departamento de Apurímac. Final Report Cusco: Centro Bartolomé de las Casas- Consorcio de Investigación Económico Social CIES

86 CONVOCA – Periodismo de Investigación (2016) Las Bambas. El territorio en disputa del mayor proyecto minero del Perú, Consultaion - December 12, 2017, <http://convoca.pe/especiales/las-bambas/el-territorio-en-disputa-del-mayor-proyecto-minero-del-peru>

its approval, between June and July, six participatory workshops were held (June 17, Chalhuhahuacho; June 18, Haquira; July 2, Colquemarca; July 3, Velille district; July 5, Coporaque; and July 16, Fuerabamba). On July 15, the first public EIA hearing was held for the exploration phase, in Chalhuhahuacho, Cotabambas province, Apurímac. A participation of 4,500 people was estimated. On March 8, 2011, MINEM approved the exploration EIA through Board Resolution 073-2011-MEM/AAM; which resulted in the resettlement agreement being signed in August of the same year with the peasant community of Fuerabamba, initiating the construction of the Nueva Fuerabamba settlement. In this scenario, in 2012 construction began on the mine.

2.2. The social conflict

With the start of exploration activities, the first situations of tension between the company and the local population took place, linked to the trust, its administration and, mainly, who should decide on the fund.⁸⁷ As an answer to this question, on March 13, 2008, Legislative Decree N. 996 was enacted, which “approved the regime applicable to the use of resources from the processes of promoting private investment in the execution of social programs”. Through this norm, the trust funds were replaced according to the framework of Law N. 28401, among them, the Las Bambas trust, for social funds, in which the administration was the responsi-

87 Thus, in March 2005, a 48-hour strike was organized by the population, as a pressure mechanism to request that the project trust fund be distributed throughout the region and not just in some specific projects. Another example occurred in February 2006, when there was an indefinite strike in the municipality of Grau, in which accountability was claimed, as well as the hiring of labor to build projects and the removal of PROINVERSIÓN from the trust fund board. Likewise, in July 2007, in the province of Cotabambas, an indefinite strike was held, in which PROINVERSIÓN was again required to leave the Board of Directors of the trust fund. NADRAMIJA, Nathan (2017) *Lecciones aprendidas en la implementación del Fondo Social de proyectos mineros: Los casos de Michiquillay y Las Bambas*. Documentos MG En Profundidad. Lima: METISGAIA http://docs.wixstatic.com/ugd/519080_34a93195f33a4cc48b94f457069420d9.pdf

bility of multiple private actors. Under the new rule, Supreme Decree N. 082-2008-EF was published, through which the social fund “Las Bambas, FOSBAM” was created. FOSBAM executes social projects for the benefit of the populations located in the region of influence of the project in the provinces of Cotabambas and Grau, through the resources obtained from the Trust - Las Bambas Social Support and others⁸⁸.

After the approval of the exploration EIA, on May 15 and 16, 2011, a strike was organized in the Challhuahuacho district by the Peasant Federation and the Challhuahuacho Interests Defense Front. The organizations demanded, this time, the fulfillment of the commitments of Annex K “Social conditions for the exploration of the Las Bambas Mining Project”. The result of the clashes that took place during the strike, between peasants and police forces, was 11 wounded.

In order to mediate the conflict, MINEM promoted the installation of a Working Table for the Development of the Province of Cotabambas, through Ministerial Resolution N. 180-2012-PCM. Its goal was to support the implementation of projects for the development and execution of works presented by the district authorities and the provincial authority. It should be noted that only mayors, representatives of the Ministry and of central government bodies were recognized as members of that table. Therefore, community members ignored the tables.

In this context, in May 2013, Supreme Decree N. 054-2013-PCM was enacted, through which special provisions were approved for administrative procedures for authorizations and/or certifications for investment projects in the national territory. The objective was to “unlock” administrative procedures to encourage private investment in the coun-

88 NADRAMIJA, Nathan (2017) Lecciones aprendidas en la implementación del Fondo Social de proyectos mineros: Los casos de Michiquillay y Las Bambas. Documentos MG En Profundidad. Lima: METISGAIA http://docs.wixstatic.com/ugd/519080_34a93195f33a4cc48b94f457069420d9.pdf

try⁸⁹. This standard created the figure of the Technical Sustainability Report (ITS), as an exceptional tool that would replace the regular change of EIA⁹⁰. As of that date, five changes to the project were submitted through an ITS and in the following three years (see 2.3 *below*).

In this context, on April 13, 2014 Minerals and Metals Group (MMG), a Chinese consortium, acquired Las Bambas⁹¹. The purchase of the project and the series of changes made to the EIA caused the rejection of many peasant communities and organizations from the impact regions in the Apurímac region⁹². On the one hand, the entry of MMG generated a series of doubts as to whether this new company would continue with the agreements already established. On the other hand, doubts arose regarding the future realization of the project. These doubts were manifested through questioning the changes to the EIA, since there was no information for the population, without opening some mechanism of popular participation and information, since they were given through the ITS.

In view of these facts, the escalation of the conflict began. On February 6, 2015, four peasant communities (Choquecca, Allhua, Purmamarca and Quehuira) started a 72-hour strike in the Challhuahuacho district. Approximately 100 workers at the Las Bambas project contractors were

89 GRUFIDES & MUQUI (2016) Paquetes normativos 2013-2015 y su impacto en los derechos fundamentales en el Perú. Análisis, Lima – Cajamarca: GRUFIDES & MUQUI.

90 CALLE, Isabel & MORA, Carlos (2016) Evaluación de impacto ambiental: Los ITS de proyectos de inversión en sectores estratégicos. Cuaderno Legal. Lima: Sociedad Peruana de Derecho Ambiental.

91 Currently, the consortium is formed by MMG, as an operator (62.5%); a subsidiary owned by Guoxin International Investment Co. Ltd (22.5%) and CITIC Metal Co. Ltd (15%). Gobierno Corporativo MMG is the operator of Las Bambas and the administrator of the consortium. Regarding the reasons why the Las Bambas project was sold, PERÚ 21 (2013) China could be revised, forcing Glencore to sell Las Bambas project, Peru 21. Lima, April 19, 2013, <http://peru21.pe/economia/china-estaria-obligando-glencore-vender-proyecto-bambas-2127207>

92 It is also noted that in mid-2013, the transfer of the inhabitants of Fuerabamba to Nueva Fuerabamba began. Sixteen families refused to be transferred, as they did not agree with the compensation amounts.

retained. On February 28, the “Development Table” was created, promoted by the central government. This table was made up of representatives of the local government, the peasant communities and Federal Government organizations.

On June 12, 2015, a Provincial Congress of Leaders and Authorities from the provinces of Cotabambas was held in the community of Huancauire, in which it was decided to install a fighting platform. The central point of the demand was that they were not informed or consulted about the changes made to the EIA. It should be noted that the peasant communities in the provinces of Grau and Cotabambas were on the list in the Ministry of Culture Database, as they are members of the Quechua indigenous people, so it was necessary to carry out a prior consultation process.

In July, the Table’s efforts were frustrated, as three of the four working subgroups that had formed ceased to operate, as the population considered that their views on social projects to be implemented were not taken into account.

On September 5, the Central Fight Committee of the provinces of Grau and Cotabambas decided to convene an indefinite strike, denouncing that in the amendment of the EIA, no mechanisms of participation or consultation were applied, and that they had not been informed about the consequences of changes made. Protesters asked that the plants be removed and that the project be submitted to prior consultation. Additionally, the communities in the districts of Grau, Challhuahuacho, Mara and Ccapacmarca asked to be included in the project’s area of influence because they were located on the Electric Transmission Line and the Heavy Cargo Transport Route. These communities are no longer considered part of the indirect influence zone as part of the EIA modifications.

On September 25, the communities of Grau and Cotabambas started the indefinite trike. On September 28, in a confrontation between approxi-

mately 10.000 members of the communities in the provinces of Cotabambas and Grau with the police (approximately 2.000 military personnel), three protesters lost their lives, 15 were wounded by bullets and 30 were arrested. The following day, the Presidency of the Council of Ministers declared a state of emergency for a period of 30 days, through the approval of Supreme Decree N. 068-2015-PCM, in the provinces of Cotabambas, Grau, Andahuaylas and Chincheros, in Apurímac, as well as in the provinces of Chumbivilcas and Espinar, in Cusco. Likewise, on October 1, the government established three dialogue tables for the provinces of Grau, Cotabambas and the Challhuahuacho district, respectively.⁹³

After that, the conflict did not subside⁹⁴. On August 12, 2016, some 400 community members faced off against the Peruvian National Police (PNP) after blocking the road used by trucks from the mine. The protesters' demand was that work at the dialogue tables should be speeded up. On February 8, 2017, residents of the Challhuahuacho locality blocked the alternative access routes to the mine, demanding that the investment commitments be fulfilled, a measure that sought to be a pressure mechanism within the framework of the negotiations that were taking place. The conflict escalated, and two days later, on February 10, the government declared a state of emergency for 30 days in the province of Cotabambas through Supreme Decree N. 015-2017-PCM. Within the framework of the state of emergency, on February 11 a high-level commission, made up of

93 FLORES UNZAGA, César (2016) *Conviviendo con la minería en el Sur andino. Experiencias de las mesas de diálogo y desarrollo de Espinar, Cotabambas y Chamaca*. Lima: Cooperación, Ox-fam. <http://cooperacion.org.pe/wp-content/uploads/2016/09/Conviviendo%20con%20la%20mineria.pdf>

94 EL COMERCIO (2016) *Las Bambas: Los caminos del conflicto*, El Comercio. Lima, October 16, 2016, Consultation - December 12, 2017, <http://elcomercio.pe/peru/apurimac/bambas-caminos-conflicto-271118>; SEMANA ECONÓMICA (2016) *Las Bambas: Las claves detrás del conflicto*, Semana Económica. Lima October 19, 2016, Consultation December 12, 2017, <http://semanaeconomica.com/article/sectores-y-empresas/mineria/203034-las-bambas-las-claves-de-tras-del-conflicto/>

the Minister of Housing and the Minister of Health, arrived in the region. On February 13, 2017, the access path to the mine was released.

As a measure to end the conflict, on June 22, 2017, Law N. 30589 was enacted, whereby the development of the project's area of influence was declared of national interest and public need. This zone is constituted by the province of Cotabambas and the district of Progreso in the province of Grau, in Apurímac. On August 16, residents blocked the access road to the mine through the district of Mara, Apurímac, demanding compliance with agreements linked to payment for the use of access, as well as the region's asphalt. As a consequence, on August 17, the Supreme Decree N. 085-2017-PCM again declared a state of emergency for a period of 30 days in the districts of Challhuahuacho, Haquira and Mara in the province of Cotabambas.

2.3. Modifications to environmental impact studies through technical reports that supported it and the right to citizen participation

In this case, there is a concern with the population of the communities, due to the way in which changes were made to the content of an already approved EIA. These changes were made through a relatively new mechanism, established within the process of administrative flexibility promoted by the Executive Branch to facilitate the performance of extractive activities or - as it was called - to *unlock bureaucracy*.

There was a perception among the population neighboring the project that, by not being adequately informed about these changes, they would be left in the dark about them by the mechanisms of citizen participation implemented at the time. Thus, the conflict situation presented above represents how, in a context of mistrust between a mining company and

the communities located in its area of influence, this existing tension is increasing, generated by the application of a set of rules known as *environmental packages* that allowed reducing the deadlines for reviewing the content of the EIA, where the exercise of the right to citizen participation is displaced in a mining project while the population wonders what can happen. This raises the question of whether it is necessary to implement mechanisms for citizen participation as part of the changes to the EIA.

What is a non-significant negative impact on the environment?

In order to proceed with a Technical Sustainability Report (ITS), the project holder must technically prove that the proposed modification does, in fact, have a non-significant impact on the environment. But, what is a non-significant negative impact on the environment? Although there is no definition in this regard, we know what a significant negative environmental impact is. According to SENACE, it encompasses:

Those environmental impacts or changes that occur in one, several or in all the factors that make up the environment, as a result of the execution of projects or activities with characteristics, scale or location with certain particularities. The identification and valuation of these negative environmental impacts requires a deep qualitative and quantitative analysis, as well as an Environmental Management Strategy that includes preventive, corrective, reduction and compensatory measures.⁹⁵

Therefore, we are facing alterations that change the environment as a result of human activity. If we try to be more precise, a negative environmental impact on the environment would be one that generates a reduction or adverse change in the natural, aesthetic, cultural, landscape,

95 SENACE (2016) Manual para la evaluación de Estudio de Impacto Ambiental Detallado (EIA-d). Minería. Lima: SENACE

ecological productivity value or losses resulting from contamination, erosion or grounding, and other environmental risks that are different from the ecological and geographical structure, as well as the character and personality of a given area⁹⁶. These impacts are the result of human activities that, due to their size, produce these damages to the environment.

By then, we can be clear about what a negative environmental impact is, but not all have the same intensity. Following Caicedo and Vera,⁹⁷ a negative impact will be very significant or of high intensity, when it manifests itself as a modification of the environment, natural resources or the fundamental processes of its functioning, which produces or may produce observable repercussions in the future. An example might be changing a river bed, or making a mountain disappear. On the contrary, both authors understand a low or non-significant negative environmental impact to be those whose effects produce little change or minimal destruction of the environment, which are easy to recover. SENACE uses as examples, changing the access road to a camp, or optimizing production processes.⁹⁸ But, each activity has its particularities, and with it, its impacts.

The aforementioned Ministerial Resolution N. 310-2013-MEM/DM establishes more details about what can be understood by non-significant environmental impact. Thus, to request a change through an ITS, it must be considered that the change:

- (i) Be located within the polygon of the effective area, which will involve the area with mining activities such as those for mining use according to RM 209-2010-MEM/DM in mining exploration projects, mining units in operation or within

96 Caicedo Safrá, Paola e Vera Torrejón, José Antonio (2014) El Impacto Ambiental Negativo y su Evaluación Antes, Durante, y Después del Desarrollo de Actividades Productivas. In *Derecho y Sociedad* 42. Pp. 225.

97 Caicedo Safrá, Paola and Vera Torrejón, José Antonio *ibid* ob cit. Pp. 226.

98 SENACE (2017) *Conociendo al Informe Técnico Sustentatorio (ITS)*. Lima: SENACE.

their respective areas of direct environmental influence, which have an approved and current environmental management instrument.

- (ii) Be within the area that has environmental baselines to be able to identify and assess impacts and the corresponding environmental management plan.
- (iii) Not be located on, or impact on bodies of water, swamps, snowy peaks, glaciers, crop plots or water sources or any other fragile ecosystem.
- (iv) Not affect populated centers or communities not considered in the approved and current environmental management instrument.
- (v) Not affect archaeological areas not considered in the approved and current environmental management instrument.
- (vi) Not be located or affect protected natural areas or its buffer areas not considered in the approved and current environmental management instrument.

In addition to what is established in the regulatory framework, which is technical, it is worth noting how the ITS were applied in practice. On about a universe of 214 ITS reviewed by the Peruvian Society of Environmental Law (SPDA) in September 2016, some observations were found on the way in which they were assessed and approved by the competent authority. A first point to be considered is that the reports were assessed by the MINEM DGAAM. Although ITS are currently assessed by SENACE, those that have been reviewed by MINEM have some problems. In this sense, the SPDA identifies that the EIA modification ITS (detailed or semi-detailed) incorporated a summary of the modification or expansion activities that the administered report will carry out, but not an analysis or justification of them. Then, the instrument presented is analyzed to

verify that it complies with the provisions of Article 4 of Supreme Decree N. 054-2013-PCM. However, they emphasize that:

(...) there is no uniformity in the form of analysis or in the form of preparation of the evaluation report, which, from our point of view, is not justified in the main study category from which the ITS is derived. In addition to this, in most reports, there is no evidence of an in-depth analysis at the legal and/or technical level in the assessment of ITS, highlighting only that, based on the methodology for assessing the potential environmental impacts applied by the company, it is obtained as a result negative environmental impacts, classified as not significant. However, the referred “non-significance” is neither analyzed nor clearly justified.⁹⁹

This puts us facing a complicated scenario, since, when it comes to the legal good of the environment, and the right of people to live in a healthy environment, the authority - in this case MINEM - must justify its technical and legal decision. If the bases are present without an in-depth analysis, which is understood to be the due motivation of the administrative act, we could fall into a case of invalidity referred to that act. Not to mention that the right to a healthy environment could be affected due to an administrative act without adequate and sufficient grounds.

While these changes to EIAs can be quickly revised and approved (fulfilling the purpose of the standard), this does not guarantee that there is the necessary rigor that time requires to establish whether we are facing significant or non-significant changes, and whether they can, in fact, ensure that environmental conditions are not severely affected, deteriorated or contaminated. It is assumed that there is a good faith of the administrator and the governing body that this is done within the

99 Calle, Isabel y Mora, Carol (2016) Evaluación de impacto ambiental: los ITS de proyectos de inversión en sectores estratégicos. Lima: SPDA.

required quality standards; but it raises concern that the time limit has been reduced from 120 to 15 days, which leads us to question whether, in fact, the guarantee of a healthy environment will be fulfilled.

Modifications to the EIA of the Las Bambas project through ITS and citizen participation

In the case in question, there were five modifications to the EIA, the last four supported by ITS:

Modification number	Date of the presentation	Approval date	Management Resolution
1	Apr 2013	August 2013	Board Resolution N. 305-2013-MEM/AAM
2	Jul 2013	August 2013	Board Resolution N. 319-2013-MEM/AAM
3	December 2013	February 2014	Board Resolution N. 078-2014-MEM/DGAAM
4	March 2014	November 2014	Board Resolution N. 559-2014-EM/DGAAM
5	Jan 2015	February 2015	Board Resolution N. 113-2015-MEM-DGAAM/DGAAM

Source: Prepared by the authors

Among the changes approved through ITS, the following stand out¹⁰⁰:

- (i) Suspension of the construction of the pipeline; the transport of the ore would be carried out by means of a fleet of 125 trucks, over 750 km from Las Bambas to the port of Matarani;

¹⁰⁰ COOPERACIÓN (2015) Caso “Las Bambas” Informe Especial del Observatorio de Conflictos Mineros en el Perú, Lima: Cooperación; Consultation: December 12, 2017, <http://cooperacion.org.pe/publicaciones/2114/>

- (ii) Construction of a molybdenum plant in Fuerabamba (which could affect the Challhuahuacho River) and
- (iii) Construction of another filter plant in place.

Regardless of whether or not they are considered to be significant negative impacts, an important point of question has to do with the fact that the population was not aware that the EIA would be modified. Modifications through ITS did not go through popular participation mechanisms, because they are not required by the regulations. This generated the idea of opposing transparency in the local population and ended up encouraging an environment of mistrust. The situation of tension that already exists between company and peasant communities worsened after the changes to the EIA.

Faced with this situation, we ask: was it necessary to inform the population about changes in an EIA when they are related to non-significant environmental impacts? Is it necessary to implement mechanisms for citizen participation when changing an EIA when referring to non-significant negative impacts? We could say that it is not, when, in fact, these are non-significant impacts. But, in a context such as that lived in the region, and the fact that the EIA - at the time of being elaborated and approved - went through mechanisms of popular participation (which allows to give social legitimacy or social license), reflects that it is better inform than not.

It is worth remembering that the Peruvian State has a regulatory framework that regulates popular participation in the mining sector. This milestone is mainly supported by Supreme Decree N. 028-2008-EM, through which the Popular Participation Regulation in the mining subsector is approved; and Ministerial Resolution N. 304-2008-MEM-

DM, through which the mechanisms provided for in the Regulation were developed for each stage of the mining production chain.

Both rules establish that participation is the right of everyone to be responsible in decision-making processes on matters related to mining activities, insofar as their interests may be affected. It should be noted that the general intention of the standard is to inform the population living in the area of influence of the project, whether indigenous or not, about the activity that will be developed. To this end, it establishes a wide variety of mechanisms through which the population can be properly informed, in such a way that they can have access to information about the project. Participation spaces should not only happen at the beginning of the project, but throughout the activity's development cycle. Thus, there are obligations regarding popular participation that must be fulfilled at each stage of the project.

The right to popular participation, exercised through certain mechanisms, allows views that complement what has been identified as something that will happen in a given context of environmental impact. This also leads to evidence of situations that may translate into social concerns due to the dimension of a negative impact on a life context. We are facing not only environmental, but also social impacts. It is necessary for the Government (and the company) to be aware of these concerns (perceptions, expectations etc.) regarding possible risks that may arise as a result of negative environmental impacts, whether these are significant or not. This knowledge is only possible through these participation mechanisms.

Even from a logic of community relations, it is better to maintain timely and permanent communication with the social groups with which a company relates in order not to intensify the conflict. Also, the preparation, presentation and approval of EIA is the area in which the implementation of participation spaces is most required. However, difficulties

were noted regarding these mechanisms. Law N. 27446 - Law of the National Environmental Impact Assessment System, establishes popular participation in the EIA assessment process. The standard seeks to ensure the establishment of formal instances of diffusion and community participation in the process of processing EIA requests, and non-formal instances that the activity holder must promote in order to incorporate in the EIA the perception and opinion of the population potentially benefited or affected with the proposed action. These non-formal mechanisms could be part of a company's social responsibility policies so as to obtain the social license, or act under the logic of due diligence.

The need to have mechanisms for participating in EIA modifications through ITS is evident in the Las Bambas project. We must also not forget that the communities in the area of influence have repeatedly sought to be informed in changes to the EIA approved between 2013 and 2015. Under the logic of speeding up procedures for administrative flexibility, not establishing spaces for participation or using existing legal mechanisms, the population is not aware of information that may be relevant to its dynamics of living with the mining project.

The EIA approval processes rely on popular participation mechanisms through which the components of the project to be implemented are presented and explained. Through these mechanisms, not only is information collected that serves to improve the EIA, but also relevant information is shared about what will happen. When the EIA is modified with an ITS within established deadlines, and the population is not adequately and timely informed about the consequences of this, through non-formal participation mechanisms (or even by letter) this can have negative interpretations regarding the content of what was approved. An approved EIA necessarily goes through popular participation mechanisms, and an ITS, without participation, changes what had been

approved - participatively - this can have negative repercussions on the relationship between the company and the population. If the argument behind this speed is that, by eliminating participation and reducing deadlines, it would allow us to start activities more quickly, they forget that this can mean weakening a relationship that has already been weakened.

2.4. Conclusions

A first point to be considered is that the ITS instrument should be considered as an exception and not as a rule. It is understood that the conditions of the projects require revision of the EIA because the activity requires it. This considering that it is one thing to think about what could happen and another thing to see if, in fact, it happens; when to change the measure to be adopted or the activity to be carried out to reduce the impact. But, changing the EIA cannot become a rule. Especially, when EIAs are the result - also - of popular participation processes that allow the social conditions to be generated for the activity.

Another aspect to be considered is that it is necessary to review whether the 15-day period is adequate for ITS. In practice, we see that it is not. But it focuses more on office work, leaving the field work aside. The current deadline may result in the severity of being weakened by complying with the requirements of the applicants, especially when we are facing large investment projects that await responses from the governing body to continue operating. Technical work should not be involved or reduced.

Finally, review the pertinence of considering the implementation of mechanisms for popular participation that allow informing the population about the content of the ITS to ensure that, in fact, we are facing non-significant negative environmental impacts.

3. Río Blanco Project¹⁰¹

Location	Hill Henry's Hill, between 2.200 and 2.800 meters above sea level, in the district of El Carmen de la Frontera, province of Huancabamba, Piura region.
Products	Copper and molybdenum
Approximate life	From 20 to 32
Current status	Suspended (exploration stage)
Communities in zone of influence	Peasant communities Segunda and Cajas, and Yanta, Huancabamba and Ayabaca provinces, respectively, Piura region.
Process method	Crushing, grinding and flotation steps
Mineral reserve	The copper law average is 0.63%. It is estimated that for the first 5 years of exploitation the law exceeds 1%.
Mineral resource	The project's cut-off law is 0.4%. The estimated resources are 7.16 thousand tons of copper metal and 280 thousand tons of molybdenum metal
Production	It is expected to achieve an annual production of 200 thousand tons of fine copper and 3 thousand tons of molybdenum in concentrates.

3.1. Project description

The Río Blanco project (initially known as the Majaz project) is the second major mining initiative to be carried out in Piura; a region that, although it has little tradition in mining, became the focus of attention for this activity in the 2000s, due to the search for new markets and extraction zones in the country. The conflict over the Río Blanco project started shortly after the outbreak of another social conflict of similar proportions and characteristics between the Manhattan company and the

¹⁰¹ See <https://www.rioblanco.com.pe/inicio/>.

population of the Tambogrande District¹⁰². However, the project's origins emerge in previous years.

The deposit was discovered in 1994 by the company *Newcrest Mining*, but its first owner was Coripancha S.A., which in 1997 obtained authorization from the peasant community Segunda y Cajas for surface use, to “develop different stages of its mining activities (prospecting, construction and exploration)”¹⁰³. However, it was not until the beginning of the year 2000 that the prospecting activities started formally, with the change of the holder.

After a series of economic operations that took place between 1996 and 2002, the British company *Monterrico Metals* acquired 100% of the project's shares in 2003, through its subsidiary Minera Majaz S.A. (hereinafter, Majaz). However, exploration activities began in the second half of 2002, when the company was already a shareholder in the project. That same year, Majaz requested MINEM to approve the EIA for exploration¹⁰⁴.

This body, through DGAAM, observed the request made by the company and requested that it provide information on the negotiation strategies envisaged to avoid conflicts with local communities. Majaz responded to that observation by presenting two agreements made with members of the peasant communities Segunda y Cajas and Yanta. The first was granted by the Segunda y Cajas Management, whereby the company was authorized to carry out seismic surveys in different sectors of the community¹⁰⁵; while the second was granted by the Yanta Manage-

¹⁰² The conflict in Tambogrande took place between 1999 and 2003, in the district of the same name, in the region of Piura, where the local population refused to implement an open pit project through consultation with neighbors. For more information, see De Echave, José and others. *Minería y conflicto social*. Lima: IEP, CIPCA, CBC, CIES, 2009.

¹⁰³ Document of October 5, 1997, General Assembly of the peasant community Segunda y Cajas.

¹⁰⁴ File N. 1397265, January 22, 2003.

¹⁰⁵ Minutes of 9 July 2002, Peasant Community of Segunda y Cajas

ment, by which the company was allowed to enter the territory, to carry out prospecting and drilling studies for diamond extraction.¹⁰⁶

The DGAA approved the project's EIA a year later,¹⁰⁷ enabling prospecting in communities and evaluating their study until November 2006. As a complement, since the project was located on the border with Ecuador and prevented the development of activities by international companies in the area, the Peruvian government declared the project to be of public need and national interest, through Supreme Decree N. 023-2003-EM, to enable its execution.¹⁰⁸

3.2. The social conflict

The first tensions between the company Majaz and the population of the Segundas y Cajas communities, and Yanta, arose in 2003, when prospecting activities began to intensify.¹⁰⁹ There were different factors that influenced the increase in tensions, such as, for example, the antecedent of the conflict in Tambogrande, which generated a feeling of distrust towards mining in the local populations; the work of environmental activists in the region; and the nature of the agreements that the company had presented as evidence of prior agreement with the owners¹¹⁰. As these agreements were made and delivered by members of the Directorates, without consulting the other members of the communities, the first act of

106 Document of 17 August 2002, Peasant Community of Yanta.

107 Board Resolution N. 478-2003-EM/DGAA, November 28, 2003.

108 This Supreme Decree was necessary because the Peruvian Constitution prohibits foreign investors from carrying out operations within 50 km of the national border (Bebbington et al 2007).

109 Bebbington, Anthony and others. *Minería y desarrollo en el Perú, con especial referencia al Proyecto Río Blanco, Piura*. Lima: Instituto de Estudios Peruanos, Oxfam Internacional, Centro de Investigación y Promoción del Campesinado, Peru Support Group, 2007.

110 Diez, Alejandro. "Ronderos y alcaldes en el conflicto minero de Río Blanco en Piura, Perú". In: BENGOA, José (ed.) *Movimientos sociales y desarrollo territorial rural en América Latina*. Santiago de Chile: Editorial Catalonia, 2006.

the populations - when they saw the company enter their territory - was to request the company to leave and revoke the authorizations.

Segunda y Cajas took the initiative to give that answer. At the General Meeting, the community unanimously decided not to allow mining activity in the territory and to cancel the authorizations granted for superficial use¹¹¹. In Yanta, also in a Meeting, they decided to say “no to mining” and deny authorization for the company to operate in the community.¹¹²

At the same time that entry to the territory was denied, the provincial authorities organized, along with peasant rounds and communities, a march to the mining company’s camp. The mobilization brought with it a confrontation between protesters and police forces, which led to the death of Remberto Herrera, due to the impact of a tear gas bomb to the head.

In response, in July 2004, the Negotiating Table was set up, promoted by the Regional Government of Piura with the support of the Center for Analysis and Conflict Resolution of the Pontifical Catholic University of Peru (CARC-PUCP), to provide information and allow greater participation in the preparation of the EIA. However, at the end of the month, the leaders withdrew from the Bureau.

A year after the Negotiating Bureau was set up and failed, a second demonstration was held at the mine camp, which also had as its antecedent another failed negotiation process¹¹³. This event was attended by members of the communities of Segunda y Cajas and Yanta, but also residents of the districts of Namballe and San Ignacio (Cajamarca). The result was

111 Community Resolution N. 001-2004-CSC, of January 26, 2004.

112 Bebbington, Anthony and others. *Minería y desarrollo en el Perú, con especial referencia al Proyecto Río Blanco, Piura*. Lima: Instituto de Estudios Peruanos, Oxfam Internacional, Centro de Investigación y Promoción del Campesinado, Peru Support Group, 2007.

113 Representatives of the Diocese of Chulucanas, Oxfam América and CONACAMI would participate in this negotiating body.

the death of farmer Melanio García, serious injuries to a police officer and the reported detention and torture of 28 peasants.¹¹⁴

The intervention of municipal governments in the region would be stronger with the formation, in 2005, of the Front for Sustainable Development of the Northern Frontier of Peru (FDSFNP). The FDSFNP served as a platform to bring together not only the municipalities of San Ignacio, Jaén (Cajamarca), Ayabaca and Huancabamba (Piura), but also district mayors, rounds and local defense commissions; besides serving as the only and valid interlocutor in instances of dialogue or negotiation before the Government.

In 2006, the Ombudsman's Office began to take a more active role in mediating the conflict and clarifying the reasons behind this conflict. In November of that year, it issued report N. 001-2006/ASPMA-MA, in which it highlighted that the presence of the mining company in the communities was illegal, since the agreements made with the owners of the surface did not comply with the requirements established by law¹¹⁵. Thus, the company gave up on expanding its EIA, which was winning that same year.

A new strategy was adopted in 2007, when the district governments of Pacaipampa, El Carmen de la Frontera and Ayabaca created a consultation mechanism for residents to gather the opinion, in each district, on the development of mining activity¹¹⁶. The consultation was held in September of that year and resulted in a majority of opposition to mining¹¹⁷. Days

114 In 2008, the National Human Rights Coordination and FEDEPAZ denounced DINOES and the Majar company for the torture of 28 peasants and the murder of another during the march.

115 Defensoría del Pueblo. Report N. 001-2006/ASPMA-MA, of November 14, 2006

116 Municipal Order N. 0002-MDP-A, of March 30, 2007. Append references

117 In Pacaipampa, the percentage of the population that said "no" to the mining company was 97.09%; in Ayabaca, 93.47% and in El Carmen de la Frontera, 92.53%. (De Echave, José et al. *Minería y conflicto social*. Lima: Instituto de Estudios Peruanos, Centro de Investigación y Promoción del Campesinado, Centro de Estudios Regionales Andinos Bartolomé de las Casas, Consorcio de Investigación Económica y Social, 2009.

earlier, at a meeting in Piura, convened by former Prime Minister Jorge del Castillo, it was announced that the government would not consider the results of the consultation. Amid the process of implementing this mechanism, the Chinese consortium *Zijin* acquired 79.9% of the shares of *Monterrico Metals*, causing Majaz to change its name to Río Blanco Copper.

The new company presented a new EIA for prospecting in late 2008, without elaborating a rehabilitation plan for previous damages. On the other hand, the Government, through the Ministry of Defense, again declared the project to be of public need, so that Zinjin could acquire rights on the northern border¹¹⁸. In August 2011, Río Blanco issued a statement saying (i) its intention to develop the mine, (ii) that there are no *páramos*, populated centers, agricultural production areas in the project region, and (iii) that it was committed to sustainable and responsible development in the region¹¹⁹. Thus, the project continued to be carried forward, in one way or another.

Between 2011 and 2015, there were acts of violence in different communities and peoples whose protagonists were local patrons and community members accused of belonging to or being favorable to the company. In that period, mobilizations were carried out, one at the camp, as part of a continuous surveillance strategy, and the other towards the capital of the region, to demonstrate to the authorities the opposition of local communities to the mining activity.

In 2016, MINEM approved the update of the project's rehabilitation plan¹²⁰ in response to the Ecumenical Federation for Development and Peace (FEDEPAZ) reported that the resolution had been passed without a

118 Supreme Decree N. 024-2008, of December 27, 2008.

119 CooperAcción, Grufides y Fedepaz. *Noveno informe. Reporte segundo semestre 2011*. Lima, 2011. Available at <https://www.servindi.org/actualidad/51257>

120 Board Resolution N. 274-2016-MEM-DGAAM

prior consultation process. That same year, the APEC forum, MINEM and Zinjin signed an agreement to promote the project, which highlighted that the exploration of the mine would be positive for the region. At the end of the year, the recently elected president Pedro Pablo Kuczynski declared that Río Blanco would be one of the four mining projects that his management would seek to carry out¹²¹.

Even though violence has declined considerably in recent years, compared to the early years of the conflict, the change of the project holder has not resolved the main reason for demonstrations in local communities, nor has it responded to questions from civil society organizations and Government institutions, such as the Ombudsman's Office, in relation to the project. The tensions and acts of violence that have occurred in recent years (2011-2016) and the efforts made by the Government to insist on the realization of the project, are the continuity of the events that occurred in the first moment, as well as of the strategies carried out by the communities and local authorities.

3.3. Prior agreement, mining and ownership

The main questioning point regarding the project, as well as the most frequent complaint from the peasant communities involved, is about the legality of the company's presence in local territories. This situation not only constitutes the point that triggers the conflict between the company and the population, but also highlights a series of inconsistencies in the mining procedures and, mainly, in the performance of the Government, in its supervisory role in the mining activity. Although there are serious questions about the mechanisms of popular participation in the

¹²¹ Radio Cutivalú. PPK reitera que sacará adelante proyecto Río Blanco. Tuesday, December 27, 2016. Available at: <http://www.radiocutivalu.org/ppk-reitera-que-sacara-adelante-proyecto-rio-blanco/>

process of environmental certification and the way in which access to information was understood, for local actors, the problem that represents the greatest tensions is the constant attempt to enter their territories irregularly and without respecting its decisions.

The analysis of the conflict highlights the management of the prior agreement with the owners of surface land and how the non-compliance with this process represents not only a generator of conflicts, but also a risk to the security of the territories of peasant communities and the right to property. This leads to the need to deepen the normative framework on the property rights of peasant communities and the institutional framework responsible for supervising and serving as a link between companies and communities.

At first, as noted in the description of the conflict, the problem arises when MINEM approves the project's EIA and authorizes Majaz - at the time the mine's owner - to develop exploration activities in the community's territories. The company presented as proof of prior agreement with the landowners, the authorization of Segunda y Cajas to the mining company Coripancha (former owner) for surface use, and the minutes of authorization from community management and from Yanta to Majaz to carry out activities of seismic prospecting and diamond drilling, respectively. Through these documents, Majaz intended to comply with the prior agreement of the landowners to carry out their exploration activities to depth.

MINEM's DGAAM recognized the validity of these documents and approved the project's EIA, green lighting it for the development of the exploration activity. It is when the company begins to have a greater presence on community lands that its inhabitants begin to show reticence in the face of Majaz's presence and to question the authorizations that the company claimed to have, as they had not participated in the

process under the current regulatory framework. These rules require that the development of extractive activity must go through an authorization process between the company and the owners, without which, it is not possible to carry out the exploitation of underground resources.

Property is recognized as a fundamental right by the Constitution (Article 2.16). It is an inviolable right and must be exercised in harmony with the common good, limited exclusively by national security or public need, according to Article 925 of the Civil Code. Likewise, in international human rights law, indigenous peoples' right to collective property over their traditional lands and territories is recognized. In particular, it is recognized in Article 14 of ILO Convention 169, of which Peru is a State party. The right to property is also recognized by Article 21 of the American Convention on Human Rights and Article XXIII of the American Declaration of the Rights and Duties of Man. The IACHR and the Inter-American Court of Human Rights (Inter-American Court) jointly developed the content of this right and stated that it protects the collective property of indigenous peoples. This implies concrete obligations for the Government, such as the recognition, delimitation, demarcation and effective protection of lands and territories against third parties¹²².

In the internal normative scope, Law N. 26505, on private investment in the development of economic activities in the lands of the national territory and of the peasant and native communities (Land Law), determines that the use of the land for extractive activities (mining and hydrocarbons) requires having the prior agreement of the owner or ending the easement procedure (article 7). This law also requires that, to

122 See *inter alia* Corte IDH. Caso da Comunidade Mayagna (Sumo) Awas Tingni Vs. Nicaragua. Merits, Reparations and Costs. Judgment of August 31, 2001. C Series N. 79. *Yakye Axa Indigenous Community Vs. Paraguay*. Merits, Reparations and Costs. Judgment of June 17, 2005. C Series N. 125. *Case of Sawhoyamaxa Indigenous Community Vs. Paraguay*. Merits, Reparations and Costs. Judgment of March 29, 2006. C Series N. 146. *Case of the Xákmok Kásek Indigenous Community. Vs. Paraguay*. Merits, Reparations and Costs. Judgment of August 24, 2010. C Series N. 214.

dispose, record, lease or exercise any other act on community lands in the mountains or the forest, it is necessary to reach an agreement at the General Assembly that gathers the vote of not less than two thirds of all members of the community (article 11).

Supreme Decree N. 017-96-AG that regulates article 7 of that law also reaffirms the obligation to adopt this procedure. The standard explains that the use of land for mining activities and for the transportation of minerals requires prior agreement by the landowners (article 1). Also, it establishes that the agreement must appear in a document issued by a Public Notary or a Justice of the Peace, which, in turn, will be made known to the competent MINEM body (article 2).

On the other hand, the sectoral regulations also establish guidelines in these regard. Supreme Decree N. 018-92-EM, Regulation of mining procedures, is explicit in pointing out that the title of the concession does not, by itself, authorize prospecting or exploration activities. It is a prerequisite prior to the beginning of these activities, obtaining or authorizing the landowners to use the land or ending the easement (Article 23). In 2003, Supreme Decree N. 042-2003-EM established that the obligation for the petitioner to submit a public statement must be added to the Regulation on mining procedures in which it undertakes, among other aspects, to act with respect towards institutions, local authorities, culture and customs and to maintain an ongoing dialogue with local authorities and the population in the area of influence through their representative bodies (Article 1).

In other words, several regulations coincide with the obligation of the holders to obtain the prior consent of the owners of the surface. However, Majaz presented authorizations that did not fit the regulatory framework, since they were granted only by members of the communities' Management. Although they represented the community before

external parties, such as the Government, they had no decision-making power over collective lands. Peasant communities themselves, through all their members, own the land. And they can only dispose of the land through the General Assembly, with the approval of at least two thirds of the registered members. As the Political Constitution determines: “Peasant and Native Communities have a legal existence and are legal entities. They are autonomous in their organization, in community work and in the use and free disposal of their land, as well as in economic and administrative aspects, within the framework established by the law [...]” (Article 89). In this sense, having authorization from the owner of superficial land for the development of the project means that the community, through its decision-making bodies, grants this authorization, not just its leaders.

The other license for the use of surface land that Majaz used as a basis for the EIA, despite having been the result of a decision taken at the General Assembly of Segunda y Cajas in 1997, was not granted in favor of Majaz, but of the Coripancha company, which was the previous owner of the mine. It was a license granted between the community and this company, which contemplated a series of obligations, responsibilities and rights between both parties. As the Ombudsman’s Office (a.k.a. *Defensoría del Pueblo*) states in its Proximity Report N. 001-2006-ASPMA-MA, the company Majaz, in becoming the new holder, “must prove that the Peasant Community had authorized the assignment of a contractual position in the authorization granted in favor of Minera Coripancha S.A. However, there is no evidence of this in the process, it only proves that the company Monterrico Metals acquired the ownership of the shares of the company Minera Coripancha S.A.”¹²³

123 Defensoría del Pueblo. Report N. 001-2006/ASPMA-MA, of November 14, 2006 p. 10

Thus, the normative framework was not complied with, since: i) authorizations were obtained only with some members of the Management of Communities, instead of obtaining them with the agreement of at least two thirds of the members of these communities; ii) there was no guarantee that the decision was taken in an assembly, which constitutes the space for making community decisions; and iii) it was intended to attempt making a document processed by a different company pass as an agreement.

In this context, the performance of the competent body (MINEM) was also questioned. As the body responsible for approving the EIA for the project, MINEM was responsible for proving the nature and legality of the previous agreements that the company presented before issuing its authorization. By not doing so, it allowed the company to enter community lands and develop exploration activities, with an impact on the security of the territories.

This observation was registered in Official Letter N. 0178-2006-DP/ASPMA that the Ombudsman sent to MINEM¹²⁴. In response, the Ministry stated that, although the regulation makes reference to the need for an agreement between the concession holder and the owner of the superficial land, this is not a condition for the development of mining activities, not explicitly for the EIA, as per the MINEM Single Text of Administrative Procedures (TUPA). In other words, that the agreement with the owner of the superficial land constitutes one more authorization that the company must obtain from the Government for its operations, but it is not a central aspect in the EIA, which is an instrument eminently focused in environmental or ecological analysis.

¹²⁴ Bebbington, Anthony and others. *Minería y desarrollo en el Perú, con especial referència ao Projeto Río Blanco, Piura*. Lima: Instituto de Estudios Peruanos, Oxfam Internacional, Centro de Investigación y Promoción del Campesinado, Peru Support Group, 2007. pp. 32.

This type of conflict between the revised regulatory framework and MINEM administrative procedures has placed peasant communities at a disadvantage. It was not just that an administrative standard allowed the company to obtain EIA approval - indispensable for the start of a mining project and to enter community land - but, in addition to that, there was no timely inspection of the procedures by the competent agency, i.e. MINEM. In its response to the Ombudsman's Office, MINEM prioritized the EIA approval argument, rather than recognizing that the company had not complied with legal requirements. This is even more problematic when we consider that the responsibility for approving mining activities rested with the agency promoting the activity in the country. In this case, there was total partiality by MINEM when prioritizing the realization of the project instead of respecting the right to property of the peasant communities.

As the Ombudsman's Office warns, in its approximation report, this situation caused the communities to be subject to the company's discretion whether or not to obtain authorizations in accordance with the regulations before carrying out their prospecting activities. Seen in this way, it is understandable that the members of the communities, at first, adopted a hostile attitude upon the untimely entry into their territories and that, afterwards, they tried to show the irregularities of the company's presence.

In the midst of the conflict, other regulations were enacted that did nothing more than reaffirm the requirement to obtain prior agreement with the communities. In 2012, Supreme Decree N. 020-2012-EM was issued, which amended the regulation of mining procedures, in order to standardize criteria for the assessment and granting of authorization to start mining activities, among other phases. The standard establishes that, in order to obtain authorization to start or restart mining pros-

pecting, development, preparation and exploration activities, the holder must present the following documents to the General Mining Directorate or to the Regional Government, as the case may be: i) the resolution approving the corresponding environmental instrument; ii) the work schedule; iii) the document that proves the authorization of the landowners to make use of the superficial land; and iv) updated environmental monitoring (article 8). In other words, it reaffirms that the prior agreement with landowners is a requirement for exploration activities, but not as a condition for the approval of the EIA.

This authorization became a responsibility of the National Environmental Certification Service for Sustainable Investments - SENACE. This public, technical and specialized agency, under the Ministry of the Environment (MINAM), has the function of reviewing and approving the detailed EIAs of major investment projects, including mining. The creation of this organ, of a technical nature and external to MINEM, implies an attempt to make the approval of the EIA a more independent process and without the intermediation of economic groups of power. However, the revision of authorizations to start prospecting activity continues to fall on MINEM, without this representing that the Government acts as a link between companies and local populations.

Thus, before facing an exceptional conflict, the management of the prior agreement reveals a structural problem in mining procedures: a permissive regulatory framework, unclear about the steps to be taken to obtain the prior agreement, a weak institutional framework, which leaves it up to the company to build relationships with communities, and a permanent incentive, by governments, to continue with policies to promote mining activity in detriment of strict procedures that guarantee respect for citizen rights.

3.4. Conclusions

Regarding the regulatory framework, it is observed that, although there is a legal framework that recognizes the peasant and native communities as legal entities and with the capacity to decide on their territories, the sectoral regulation does not necessarily impose on companies the obligation to obtain prior community agreement as a requirement for environmental certification. The fact that MINEM justified the approval of the EIA by means of an administrative standard - such as TUPA - denotes that the prior agreement is seen as a minor issue for environmental certification. It is seen as a simply technical process that prioritizes ecological analysis, leaving the social and cultural variable in second place.

What is evident in the Río Blanco conflict is that the opinion of the local communities has no weight for the Government in its decision to carry out, or not, a project. On the contrary, since the prior agreement was seen as something that can be dispensed with, the company pressed for further development of its activities, creating a conflict situation and putting the property rights of peasant communities at risk.

The normative framework also did not establish clear steps or procedures to be followed in order to obtain the agreement with the land holders, especially when they are peasant communities. In other words, there are no clear guidelines to help companies build a close relationship with communities.

With regard to the institutional framework, the Río Blanco conflict highlights the incongruity of depositing in the same institution, powers of both inspection and promotion of the same economic activity. MINEM's passivity in verifying that the licenses obtained by the company complied with the normative standards, isolated peasant communities to its own devices, having to depend on the will of the company for the

prior agreement to comply with the two thirds of the members communities. For companies, it is also not simple to approach local communities in a disruptive way and without the presence of an entity that regulates this relationship.

Instead of serving as a link between local populations and the company, MINEM is limited to taking a position in favor of mining development, without considering the costs that it must assume and the way these costs are distributed. As a result, it is the Government itself that ceases to guarantee the rights of the members of the peasant communities to hold the incentive to an economic activity that weakens the legal security of local territories as a maximum desirable asset.

Both elements, a normative and institutional framework, must also be understood in the political and economic context in which they operate. The current legal framework was the result of a government that embraced a series of measures of a neoliberal character and that had as its starting point the weakening of the regime for the protection of peasant lands, by granting them only a character of Imprescriptibility. The weight that the government of Alberto Fujimori, as well as the subsequent transitional governments, gave to extractive activity, and mining in particular, meant that formal requirements or procedures were seen as obstacles or as part of the so-called “bureaucracy” that prevented the development of the activity and, therefore, of the country. Seen in this way, Government organs are designed to promote mining in one way or another, not to debate it.

II. Recommendations

The cases studied in terms of socio-environmental conflict associated with the mining sector, allow us to state that these conflicts have causes that can be associated with regulatory deficiencies and institutional failures, seen from a human rights perspective. In general terms, we found rules that facilitate and promote private extractive activity without sufficiently ensuring that the rights potentially impacted are not affected. This finding goes hand in hand with the institutions that, in application of this rule, promote actions that tend to favor private activity to the detriment of rights.

This allows, or in some cases, generates scenarios of violence that are accompanied by more reactive than preventive public measures. The use of the measure of states of emergency (exceptional measures by definition), the excessive use of security forces or the involvement of the armed forces in security tasks of the population, are clear examples of these measures repeatedly observed when making an analysis of the facts that happened during social conflicts. This cost the lives of people, both civilians and people who were fulfilling their public duties.

In this scenario, we consider it necessary and non-extendable, as has been seen in other spaces, that mining in the country should be thought not only in environmentally sustainable terms, but also in a manner consistent with human rights (recognized in treaties to which Peru is a party) and fundamental rights (as these are recognized in the Constitution). In more concrete terms, based on the aspects analyzed in each case, we present some recommendations that we consider to be key.

Right to prior consultation and identification of communities

1. The implementation of the right to prior consultation requires, as an indispensable step, the identification of the subjects affected by the measure. Aware of this, the task of determining the presence of the elements to be considered indigenous people in a given collective is critical. According to the Law, this determination must be made by the entity that promotes the consultation, this task should be performed with greater diligence because it is an issue that puts rights at stake and it is not suggested that it be ordered from private entities without further supervision, requirements and rigor.
2. In the identification of subjects possibly affected, it is necessary to follow the criteria established in the framework of International Law (especially Convention 169) and interpret them so as to favor citizens, in case of doubts. They should not follow the name they receive, it is essential to perceive the presence of objective elements and, mainly, the subjective element of self-identification.
3. It is recommended that the promoting entity request and take seriously the technical opinion of the Vice-Ministry of Interculturality, the governing body in the matter; as well as carrying out fieldwork to identify the peasant communities and populated centers that will be the subject of the consultation.

Citizen participation in EIA modification via ITS

1. The simplification of procedures must not suppose the renunciation of the Government's inalienable duty to guarantee respect for the fundamental rights of the persons or groups affected by the measures.
2. The ITS instrument should be considered as an exception and not as a rule, considering that EIAs are the result of citizen participation processes aimed at generating favorable social conditions for carrying out the activity.
3. The legal requirement of not accepting as successive the modification or expansion of the same mining component by means of ITS, which should bring about the generation of moderate or significant negative impacts regarding the assessed, approved and current environmental study.
4. In assessing the ITS, the competent authority must carry out an analysis that guarantees respect for the rights at stake in the changes to the EIA and must justify its technical and legal decision.
5. It is necessary to revise the shortened legal term, as it puts the rigor of the assessment at risk and makes it impossible for the competent authority to take diligent measures to analyze the request for respect for rights.
6. We suggest reviewing the non-application of mechanisms for citizen participation in changes through ITS, considering that we may be facing not only environmental but also social impacts, with possible impact on rights.

Right to a healthy environment and accumulated environmental impacts

1. To ensure that the analysis of cumulative impacts is carried out in a meaningful way, the Government should update the definition of cumulative impacts in the legislation, to include the concept of reasonably predictable past, present and future impacts, and should include detailed requirements for the consideration of cumulative impacts on EIAs.

Companies' Responsibility Towards Social Demonstrations as an Exercise of Fundamental Human Rights in Argentina¹²⁵

*Gustavo Federico Palmieri*¹²⁶

*Florencia Beltrame*¹²⁷

Introduction

Although popular demonstrations and acts of protest in their different forms and dimensions are fundamental phenomena in the development of political, social and economic life in the countries of the region, their problematization as a specific human rights issue is relatively recent and remains under development.

Something similar happens in relation to companies and human rights, whose conceptual development is very recent.

It is clear that even when both thematic fields are new, there is the possibility of confrontations between them. A great deal because an important part of the social protests that take place in Argentina and in the region occur against extractive ventures (minerals, agricultural, hy-

drocarbons etc.) of transnational or local companies, which violate the rights of peasants, small producers and residents in general.

This article aims at exploring what issues may arise from the clash of these two fields, on the one hand, social and human rights protests and, on the other, companies and human rights, focusing on the case of Argentina.

First of all, let's see how it evolved and what are some of the issues raised between human rights policies and social protests today.

Then, we will briefly analyze what are some of the aspects of the business and human rights debate that can go through the debate on social protests.

The last section of the article will analyze what the challenges that human rights impose for regulating the activity of companies in relation to social demands and protests for violations or conflicts over rights generated by companies. The goal is to analyze whether it is possible to generate ways of democratically channeling the serious and predictable conflicts generated by the company's activity and to think of responses to an asymmetric and exclusive scenario.

1. Social protest in Argentina and its construction as a legitimate exercise of human rights

Public demonstrations and other direct forms of collective action are presented as the form of expression and channeling of conflicts in democratic states and also, in many opportunities, arise from the processes of recognition and strengthening of rights.

National legislation lacks norms to regulate intervention in social conflicts and the responses, by the Executive and the Judiciary, have

varied, depending on the circumstances, ranging from negotiation and the opening of channels of dialogue to repression and criminalization of demonstrations.

We can mention forms of social protest in Argentina at least since the consolidation of the national state and linked, fundamentally, to the old tenant strikes, of the working class and unions and the radical uprisings by the universal vote. Since the middle of the 19th century, there have been massive mobilizations of workers and Peronists, to which the demonstrations led by human rights movements would later be added, in the transition to democracy.

However, it is in the 1990s, when neoliberal policies and reforms were implemented and deepened, that the phenomenon of social protests gained visibility and specificity and the first conceptualizations began. Neoliberalism implied, both in Argentina and in Latin America, a process of transformation with profound social consequences: polarization, increased unemployment, poverty, marginalization, among others. The opening of the economy in search of foreign capital was carried out by means of disciplining the workforce appropriate to the conditions imposed by these capitals. Thus, the privatization of public companies was a central axis in the political and economic project of this stage, which contributed to the deepening of an accumulation pattern with a tendency to economic concentration and social exclusion (Aspiazú, Shorr, 2001: 5).

In Argentina, this series of reforms - which represented a regression of rights - brought with it the emergence of new forms of social organization and collective action that were installed on the social scenario as a way of showing dissatisfaction of these rights through new ways of demonstration, such as street and road pickets, marches, demonstrations, etc. Thus, over the course of this decade, an increase in popular mobilizations has been noticed and a new social phenomenon appears,

represented by the “*piqueteros*” and contextualized in a broader process at the Latin American level, characterized as “new social movements” (Pereyra, 2008). Thus, the configuration of the piquetero movement was a way of responding to the economic and social crisis of those years, when many social sectors that had become unemployed began to organize and demonstrate on the streets, inaugurating a form of social protest through roads. The modality responded to the urgency in the face of lack of respect for rights and, considering that these sectors have little economic capacity to protest by other means - the way of demonstrating with pickets of roads or streets tried to channel this lack as a more immediate expression to make their demands heard. This movement was strongly linked to some Federal Government sectors most affected by the crisis. The power acquired by this new phenomenon, but mainly the Government’s response to the repression of the pickets, contributed to the issue of social protest being installed on the public agenda and being configured as a question of human rights, beginning its first conceptualizations in social and legal sciences. At this stage, we find that the first judicial responses begin to frame social protests, especially pickets, as conflicts that must be addressed by criminal law. Thus, the legal framework for classifying these conducts as crimes was given through a “broad” reading of art. 194 of the Penal Code, which expresses (in free translation) “Whoever, without creating a situation of common risk, prevents, hinders or disturbs the normal functioning of land, water or air transport or public communication services, water supply, electricity or energetic substances, will be repressed with imprisonment, from three months to two years”. But also added to this and to give more basis to the criminalization of these protests, they started to use other articles linked not only to the blockade of public roads, but also to other types of

crimes as resistance to the authority. At the same time, the murders of demonstrators in these contexts went unpunished.

The year 2001 was a turning point in the country's history, the institutional, economic, political and social crisis reached its peak with the resignation of President Fernando de La Rúa, in a context of massive looting and protests across the country. The brutal repression employed by the Government against protests included the murder of more than thirty people (some of them killed by civilians who protected their businesses, but the vast majority of these murders were committed by agents of the federal and provincial law enforcement forces), hundreds of injured people and some 4.500 people detained. Months later, on June 26, 2002, during a massive demonstration, militants Darío Kosteki and Maximiliano Santillán, of the MTD Aníbal Verón Unoccupied Workers Movement, and dozens of other protesters were killed by lead bullets and arbitrarily detained at police barriers.

During this period, another modality that the social manifestations used, along with the pickets of roads and streets, were the so-called “*cacerolazos*” with the message “out with them all”, which was a demonstration against the crisis of legitimacy and institutionality of the country and, later, the appearance of spontaneous assemblies of neighbors who met on the corners of their streets.

With the presidential elections of 2003, a new period started that would extend for at least ten years, accompanied by economic growth and regularity in institutional stability. As stated below, the government of Néstor Kirchner radically changed the position of the national government regarding social manifestations. In this stage, the forms of demonstration described above are still active and new actors are warned that they are the protagonists of major acts of protest. Examples of this are the pickets and demonstrations led by the agricultural sector against res-

olution 125, which established a mobile system for the fiscal withholdings of soybeans, wheat and corn in 2008 and/or the pickets in the province of Entre Ríos, on the National Road 136, by the Citizen Assembly of Gualeguaychú, against the installation of the Botnia pulp mill in 2006, among others. Thus, there is an increase in social demands that begin to include other issues, such as habitat, health, institutional violence, education, gender, etc. An example that in recent years has acquired high social visibility within the women's movement is the collective "Not one less", driven by the multiplication of cases of gender violence and murder of women in 2015. This collective continued to organize and carried out various actions, such as women's strikes, assemblies and a number of mobilizations.

Likewise, we can highlight protest actions against extractive enterprises in different parts of the country. To mention some examples, in the year 2003, in Esquel, a series of protests took place against the installation of a gold and silver mine that led to the mobilization of local residents, who held popular consultations and provided support resources, among other actions. Several protests were suppressed by the provincial police. Another case was the series of protests against Mina La Alumbrera, in 2012, in the province of Catamarca, led by social organizations linked to human and environmental rights against the environmental damage affecting the region. In that case, there were violent operations by the security forces to suppress the demonstrations. In 2017, after several complaints, the Federal Chamber of Tucumán ordered, through a provisional remedy, the immediate suspension of the activity of the mining companies Bajo De La Alumbrera; however, subsequently, the measure was rendered void by a sentence that ordered the suspension of the provisional remedy and allowed the continuation of operations. Another example is the case that occurred in the region of Patagonia, in Comodoro Rivadavia, in which one of the largest oil fields in the country is located. Since 2011, a conflict has developed

between the unions and the company Pan American Energy, due to layoffs and indebtedness of wages, a situation that ended with the occupation of the company Cerro Dragón, in 2012, and with violent incidents and repression in the retaking of control by the military force. To this day, the conflict remains open and protests against the company continue.

As stated, the response of the national government between 2003 and 2015 was mainly characterized by the non-repression of protests and the search for channels of dialogue. Between 2003 and 2009, for example, during the demonstrations that took place, there was no record of deaths by the federal military forces (CELS, 2017: 21). In this context, the “Minimum criteria for the development of protocols for Police and Federal Security Forces in public demonstrations” were developed, among other regulations,¹²⁸ in order to offer a normative framework that respects the rights of those who protest and limits violent interventions. However, this policy was not exempt from tensions in relation to criminal justice actions and, on the other hand, it had a different scope in the provincial jurisdictions.

Since the year 2016, with a change in the political scenario, represented by the change of national authorities, a return to the previous stage regarding the responses of the political power to social manifestations has been perceived, which consists of an increase in the repression and criminalization of social movements.

At this stage, there is an increase in the violent practices of federal security forces in relation to protests and judicial decisions that tend to criminalize the right to demonstrate. It was clear the use of a strategy that is both political and judicial, which consists of accusing people detained during protests under serious criminal figures, such as public intima-

¹²⁸ Resolution 210/2011 of the Ministry of National Security. Also approved by the Internal Security Council and signed by most provinces.

tion and federal jurisdiction. There are also warnings of repressive actions and repeated criminalization, including the arrest of the indigenous social leader Milagro Sala, detained in January 2016, during a camp in the province of Jujuy; the death of Santiago Maldonado, in 2017, during the repression of a demonstration, followed by the illegal invasion of a Mapuche community by the National Police, in the Province of Chubut, and the murder of Rafael Nahuel by members of the Argentine Navy, that dispersed a demonstration for lands, in the Province of Río Negro.

2. Companies and human rights

The participation of companies in serious violations of human rights is not a recent event, neither in the region nor at the global level. The collaboration of businessmen and landowners in deaths in the region has been widely documented. In the case of Argentina, in addition to the support of national and transnational economic groups to State terrorism that occurred during the last military dictatorship (1976-1983), some corporate leaders are being tried in criminal cases in which the functional responsibility of managers of large companies is analyzed in concrete actions related to Ford, Ledesma and Mercedes Benz. In these cases, there are elements that show participation in the kidnapping of workers; facilitating information for the forces of repression for the kidnapping and/or disappearance of workers; espionage activities, the results of which served to repress the Government; and contributions in economic resources to the repressive forces in that period. These pro-

cesses were carried out despite the resistance of the business leaders, with different results¹²⁹.

In the same sense, in 2015, Congress approved the “Commission for Truth, Memory and Justice, the repair and strengthening of democratic institutions”¹³⁰ to investigate the complicity of entrepreneurs in the last military dictatorship. This Commission should prepare a report with a “detailed description of the most relevant aspects of the economic, monetary, industrial, commercial and financial policies adopted by the dictatorship” and “the identification of the economic and technical parties that contributed to and/or benefited from this dictatorship, providing economic, technical, political, logistical or other support”¹³¹. The Com-

129 In the case of the Mercedes Benz company, at least twenty workers were kidnapped during state terrorism actions, and of these, 14 remain missing. The lawsuit began in 2002, by the initiative of relatives of missing workers and with the focus of investigating the disappearance of workers and the responsibility of the company's leaders in these actions. After more than ten years, in 2017, the Second Panel of the Federal Chamber of Criminal Cassation ordered the Oral Court in the Federal Criminal N. 1 of San Martín to set the date for the oral and public debate in the case in which two former company directors were indicted - the production manager and the head of legal affairs - for delivering data and location for the kidnapping of workers. The process has not yet been completed. In the case of Ford, the case also started in 2002, against former company directors (the chief in zone four, from the Province of Buenos Aires, the manufacturing manager and the head of security) for their performance and delivery of information in the pursuit, illegal detention and torture against 24 company employees; after several delays, the case was processed in the year 2017 before the Federal Criminal Court N. 1, San Martín and is in the debate stage. The case of the Ingeniero Ledesma Group, refers to 60 kidnapped people, among which 30 remain missing, the majority linked to Federal Government activities. In 2009, three cases were filed against the leaders (the owner of Ingeniero Ledesma in Jujuy and the administrative manager) for their participation in the supply of people and vehicles for the transfer of prisoners in the so-called “Blackout of Ledesma”, when intentional electricity cuts were made to facilitate the kidnapping of people. On these cases, one is under investigation and two are awaiting the Supreme Court's pronouncement, since the Federal Chamber of Criminal Cassation ruled against the accused. See more information at: <http://www.cels.org.ar/especiales/empresas-y-dictadura>

130 Law N. 27,217 BO 12/3/2015

131 Article 3 Law 27217

mission has not yet been constituted, before which human rights groups have filed an appeal for protection in the event of a failure to function.¹³²

It is evident that the performance of transnational companies in strategic sectors, mainly in territories with a willingness to extract natural resources and their ability to influence national economies is a phenomenon that is expanding in several countries and has brought with it a series of issues related to serious violations of human rights. Extractive projects installed in areas for the exploitation of resources directly affect the communities that live in these areas, exposing them to various risks. In this context, forced displacement, environmental pollution, violence over the referents of the communities involved and the repression and criminalization of demonstrations against these projects are some of the issues that have arisen in different countries in the region.

Clearly, the forms of articulation between companies, state and population have varied over time and have, since the end of the 20th century and the beginning of the 21st century, specific forms related to neoliberalism and the Washington consensus and the expansion of financial capitalism.

But the inclusion of these issues on the human rights agenda is recent, both at the international and regional levels.

It turns out that, without removing States from the duty allocation center, in recent years proposals have been put forward to be able to establish regulations that will allow progress to be made in preventing and remedying human rights violations caused by corporate action. This implies articulating state obligations and corporate obligations or establishing the ways in which States should regulate this articulation to prevent and repair human rights violations, in addition to reviewing the

¹³² <http://www.hijos-capital.org.ar/2017/12/27/presentamos-un-amparo-por-la-falta-de-funcionamiento-de-la-comision-bicameral-para-investigar-a-civiles-del-terrorismo-de-estado/>

ways of assigning the different responsibilities arising from the violation of human rights.

Thus, a series of international instruments was created that recognize the actions of companies as responsible for human rights violations and that refer mainly to the 1990s, with the expansion and transnationalization of companies and the impact of their activities on human rights.

Treaties between States and transnational companies for the development of investments continue to privilege the guarantee of a profit limit, of conflict resolution systems in spaces outside the communities in which these investments have an impact and the secrecy of attached clauses or agreements, in which the opacity of investment chains also operates¹³³.

On the other hand, the installation of an extractive company or the expansion of the frontiers of cultivation are activities that are developed in spaces already “appropriated” by communities, peoples and residents - in the broadest sense of the concept, which is to reproduce life itself, not only to appropriate economically or in material terms, if not daily, of bonds established with neighboring relatives, with the territory in which they live, with the places where they work. It is a territory with history, its politics and a pre-existing functioning and the way in which this new proposal is articulated with these tensions, is what can give a key answer to the question of origin and the reason why conflicts take on the forms they have¹³⁴. This leads us to reject simplistic views of the proper processing by companies and, in this context, to make the responsibili-

133 Concerning the secrecy of the clauses in the case Giustiniani, Rubén Héctor and YPF, S.A. appeal, in which the Supreme Court of Justice of the Nation decides that, in accordance with international human rights principles regarding access to information and decree 1172/03, contracts signed between YPF and Chevron must be made public. See Giustiniani, Rubén Héctor w/ YPF S.A. w/o appeal 10 November 2015. Supreme Court of Justice of the Nation. FA15000237.

134 See Hernan Schandizo's intervention “Mesa de Trabajo Empresas, Protesta Social y Derechos Humanos”, Instituto de Justicia y Derechos Humanos de la Universidad Nacional de Lanús, November 8, 2017. Mimeo.

ties of the Government more complex, in processes that otherwise only produce traumatic conflicts and affectations of rights in entire communities. Because these extractive ventures or new agrarian frontiers have an impact on labor aspects, the real estate market, the criminal logic and the basic services that must be installed etc.

And here two issues arise to be resolved in specific cases. On the one hand, the extent to which the Government and human rights institutions are in a position to guarantee these rights, that is, the effectiveness of the guarantee to which we refer at the beginning of this section. Second, the extent to which these important obligations that arise from the large and predictable impacts caused by major extractive enterprises must be considered within the duties of due diligence in business. In view of this, the role of human rights organizations and movements arises to question capital as the only organizing element of rights and institutional dynamics for its guarantee and protection.¹³⁵

3. Cases of companies, protest and human rights

The participation of companies in events that violate the rights involved in the exercise of social protest is the subject of this last section of the article. Precisely, there is an attempt to develop some of the intersections in the advancement that occur in both fields.

On the one hand, demonstrations often occur in contexts that demand a response from the company or public action on the activity of the companies. They occupy land that private entrepreneurs consider

¹³⁵ See Diego Montón's intervention in "Mesa de Trabajo Empresas, Protesta Social y Derechos Humanos", Instituto de Justicia y Derechos Humanos de la Universidad Nacional de Lanús, November 8, 2017. Mimeo.

to be their exclusive property, prevent the passage of trucks, the fumigation of private territories etc. In many cases, the lack of protection for social protests, as well as the repression and criminalization of these actions, or the persecution of their leaders and human rights defenders, are determined by public officials (either by action or omission), whereby the company's responsibility is covered up.

In Argentina, this cover-up happened, especially, regarding the conflicts of the 1990s, related to the closing of public companies that extracted resources such as iron and oil. Thus in Argentina, as in the region, the phenomenon of social protest also coincides with the advancement of the neoliberal model, while in other countries this phenomenon develops very strongly linked to the boom of extractive companies or the expansion of agricultural frontiers. In the 1990s, the Washington Consensus had an impact in Argentina with the closure of important enterprises developed by the Government. Since then, conflicts related to private enterprises have grown in severity and relevance.

In many cases, the reaction to repressive actions or criminalization is carried out by State agents and it is in relation to them that accountability for human rights violations is focused. They will then be its agents, either for actions or omissions, that do not comply and generate responsibility, either for the actions of repression, for the actions of criminalization or for the lack of protection of demonstration participants.

Thus, the application of abusive criminal types, such as terrorism, extortion or public intimidation does not always coincide with demonstrations related to companies, but they appear as a response from criminal justice in different cases. As with the application of emergency laws that restrict rights or allow the armed forces to intervene in other countries in the region, it is not a violation reserved for the protection of business

interests¹³⁶. Although it is a human rights issue to determine whether the strategic interests protected by these decisions go beyond the protection of the revenues of the companies involved to some extent. Likewise, it is necessary to assess how the generation of special criminal types - which under the argument of protecting essential services or goods - seeks, mainly, to discourage, criminalize or repress labor, community or social protests against companies, rather than simply provide a service.

However, what matters in this section is to analyze some modes of corporate responsibility in the face of violations committed in social demonstrations. Therefore, it is important to analyze how these private actors intervene in the processes of repression, criminalization or lack of protection for individual and collective actors who participate in the social manifestation. Analyzing how companies participate in this scheme of violations, making, for example, complaints for facts that clearly constitute the object of this protection, or the articulations between companies and the Government that “overprotects” the company’s interests and “over-criminalizes” protest against their activities. Considering these forms of concrete organization is what will allow us to intervene in the modes of production, extraction and appropriation of wealth that conflict with human rights norms and present themselves as a fundamental challenge when these practices affect the lives and rights of millions of people.

On the one hand, there is pressure from companies and the business community to increase penal types against those who protest, defend the judicialization of roadblocks and improve their links with civil ser-

¹³⁶ And it will still be necessary to analyze, in each case, the ways of articulation between companies and military sectors in the violation of human rights.

vants and justice agents through events, trips etc.¹³⁷ In some cases, these actions are clearly discriminatory; they also attack cases that are considered as freedom of expression. Anyway, it is interesting to see how United Nations working groups call attention not only to the pressure exerted by companies to criminalize movements, but also to the inertia of the public power in the face of serious cases of violence to which human rights advocates and social leaders who participate in protest actions on different aspects of business activity fall victim.¹³⁸

In many cases, the relationship between companies and states in actions related to not guaranteeing the right to demonstrate or attempting to criminalize and repress is more complex. This is because there are several forms of articulation in which companies promote, request and provide support for illegal actions of criminalization and repression of demonstrations and/or those who participate directly in them.

Advancing business commitment from a human rights perspective implies advancing concrete forms of articulation between business institutions and public organizations that appear in violation of or lack

¹³⁷ For instance, pressure from entrepreneurs of the Rural Society of the Province of Neuquén against complaints from the Mapuche (the main institutions of the Province of Neuquén ask the government to intercede in favor of production, the fulfillment of laws and social peace September 18, 2017 at <http://ruraldeneuquen.com.ar/?p=1605>) and at the same time their relationship with delinquents SRA: Impunity for criminal and violent groups has to end August 30, 2017 at <http://ruraldeneuquen.com.ar/?P=1602>

¹³⁸ See, for example, paragraphs 84 and 85 of the Report of the Working Group on the issue of human rights and transnational companies and other companies on their mission to Mexico. Thursday, April 27, 2017. A/HRC/35/32/Add.2. 84. In a context characterized by widespread cases of intimidation and harassment suffered by community leaders who speak out against certain projects and business operations, the Working Group considered that the voice of companies stood out for their absence. This is especially worrying because, it seems, some of these cases of intimidation and violence are perpetrated by employees of those same companies or by people who maintain commercial ties with them". 85. Companies should have strong incentives to distance themselves clearly and publicly from the actors that promote violence and intimidation, and to act with due diligence in matters of human rights. The disrespect for human rights also has a high financial cost when projects are delayed due to lack of due diligence in human rights, and the company sees its reputation tarnished when associated with the violation of these rights".

of protection for human rights. Thus, the issue of social manifestations and the company appears as an important element when assessing the capacity and effectiveness of the Government and its human rights institutions to guarantee these rights and, in the process, social protest emerges as a fundamental instrument for the exercise and protection of rights that should not be assessed as an accessory or undesirable element. The specificity of the real actions that imply the exercise of protest and in relation to this the *de facto* and *de force* actions that companies carry out over a territory and its population and how they are articulated with both Government enforcement actions, allows us to analyze the place of legitimate or illegitimate force and social organization in the context of tensions and disputes specific to forms of production, appropriation of the environment etc.¹³⁹

In conclusion, the relationship between large extractive enterprises and social manifestation implies understanding that the function and logic of the company appears closely linked to the conflict from which it tries to get rid of. Therefore, these are businesses that produce extraordinary profitability, where opportunities often present themselves in a short time and for a short period, in societies or in peripheral territories that were linked to other logics of life and production. Likewise, that social protest appears as a way of organizing identities in a political context in which participation and the rights to assembly and expression have abandoned other forms of representation and political participation. Today, forms of active resistance to these modes of land appropri-

¹³⁹ See in this sense the intervention of Mario Santucho and Marcela Perelman, Diego Monton in “Mesa de Trabajo Empresas, Protesta Social y Derechos Humanos”, Institute of Justice and Human Rights of the National University of Lanús, November 8, 2017. Mimeo. One of the most common examples is, on the one hand, inertia in the face of complaints filed by companies for illegal occupation of territories and, on the other hand, the excessive number of actions on peasant demonstrations that resist these occupations.

ation and generation of violence are also related to both asymmetry and lack of transparency¹⁴⁰ by the “corporate class”, as with the construction of corporate figures, whose origin is not so clear - and this is part of the financial structure; that is, having the capacity to become less transparent and cannot be identified as being responsible for the generation of violence. This constitutes a vital element when thinking about strategies to respond to these forms of violence as a result of the change in the relationship between the company and the Government.

Bibliography

ASPIAZU, Daniel; SHORR Martín (2010), *Las traumáticas privatizaciones en la Argentina. Rentas de privilegio en detrimento de la competitividad de la economía y la equidad distributiva*, FLACSO, Buenos Aires. In <http://publicacioneseconomia.flacso.org.ar/images/pdf/184.pdf>

BERTONI; Eduardo comp. (2010), *¿Es legítima la criminalización de la protesta? Derecho Penal y libertad de expresión en América Latina*, Universidad de Palermo, Facultad de Derecho / Centro de Estudios en Libertad de Expresión y Acceso a la Información, Buenos Aires

CELS (2003), *El Estado frente a la protesta social*, Siglo XXI-CELS, Buenos Aires

CELS (2017), *El derecho a la protesta social en Argentina*, Centro de Estudios Legales y Sociales 1a ed., Ciudad Autónoma de Buenos Aires.

¹⁴⁰ Lack of transparency that is linked to the construction of new corporate figures from which it is almost impossible to define where they come from, and having this ability to become less transparent forms part of the financial structure and profitability, and ended up defining a new relationship between the company, Government and society.

GARGARELLA, Roberto (2006), Carta Abierta sobre la intolerancia. Apuntes sobre el derecho y protesta, Siglo XXI, Buenos Aires

_____ (2007), El derecho a la protesta. El primer Derecho. Ed. Ad-Hoc, Buenos Aires;

PERELMAN, Marcela (2011), “Umbrales perforados Muertos y heridos por la represión de conflictos sociales” en CELS, Derechos Humanos en Argentina. Relatorio 2011. Siglo XXI Editores, Buenos Aires, pp 142-146

PEREYRA, Sebastián (2008), ¿La lucha es una sola? Movilización entre la democratización y el neoliberalismo, Biblioteca Nacional y Universidad Nacional General Sarmiento, Buenos Aires

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Canadian Mining Projects in the Colla Indigenous Territory, Iii Atacama Region, Chile

Felipe Andrés Guerra-Schleef^{a1}

Introduction

This report corresponds to an exploratory study whose objective is to carry out a preparatory identification on the impacts that the mining projects developed by Canadian companies in the territory and ancestral habitat of the Colla People, in the Province of Copiapó, in the III Region of Atacama, north of Chile, are exercising on the human rights of this people, with emphasis on the territory of the Colla de Pai-Ote Community.

This report is divided into five chapters. In the First Chapter, the methodology applied in collecting the information used and in the preparation of this report is briefly explained, as well as the scope of this preparatory study. In the Second Chapter, the demographic, historical, territorial and cultural background of the Colla People is shown, with emphasis on the Colla de Pai-Ote Community. In the Third Chapter, six mega mining projects are analyzed, in the prospecting and exploration phase, which are developed today in the territory of ancestral occupation and use of the Colla de Pai-Ote Community and which belong to Canadian companies

through their Chilean subsidiaries. The Fourth Chapter analyzes the legal framework that applies to the rights of indigenous peoples in the context of extractive projects and the exploitation of natural resources in Chile. Finally, in the Fifth Chapter, the main rights violated as a result of the mining projects included in this report are identified and analyzed, all of which are located in the territory of the Colla de Pai-Ote Community.

1. Methodology

This study is based on a research process focused, mainly, on the participation of the affected communities, through interviews with two key actors from the Colla de Pai-Ote Community which allowed the identification of the main Canadian capital mining projects in the territory traditionally used and occupied by the Colla People, as well as the main real and potential impacts of these initiatives. This report does not address the view that other actors - such as the Government (in this case, Chile and Canada) and the companies involved - may have about these projects and their impacts on human rights.

The fieldwork was carried out between September 15, 16 and 17, 2017, when two semi-structured interviews were conducted with full members of the Colla de Pai-Ote Community. The interviews, as required by the EIDH methodology, focused on identifying the main Canadian capital mining projects in the territory of the Colla de Pai-Ote Community, the real and potential impacts of these projects on the community and their forms of occupation and use of the territory, closely linked to their system of life and customs. Also, this fieldwork coincided with the transhumance activities carried out since remote times by the Colla de Pai-Ote Community, which, due to the time of year (end of winter) and the

occurrence of the natural phenomenon known as flowering desert, they were herding their animals across the desert, near the Castilla Farm.

A visit was also made to the Quebrada de Paipote, traditionally occupied territory of the Colla de Pai-Ote Community, to later discover some of the Canadian mining projects accessible during this time of the year, located in the pre-mountain range, also within the territory of use and ancestral occupation of that community. This allowed us to meet and talk with other members of the community holding the Colla de Pai-Ote Community and observe *in situ* the development of one of the most important ancestral practices that this community maintains, as well as some of the impacts that mining projects have had on natural goods, of common and traditional use by the community, such as in floodplains and marshes in the Andean highlands.

2. The Colla people

2.1. Demographic background of Indigenous Peoples in Chile

It is a fact that, regarding the information recorded in the census on indigenous peoples, this only exists in Chile since the 1992 census, when a question was first included to identify indigenous population. However, as stated by the Observatorio Ciudadano (2016), this question - based on a criterion of self-identification - only included the Mapuche, Aymara and Rapa Nui peoples, introducing the option “none of the above” for those indigenous people who did not belong to these peoples, which left a large number of people “in a state of cultural omission” (Gundermann et. al., 2005).¹⁴²

In the 2002 Census, the question was rephrased, focusing on a criterion of belonging to an indigenous people and extending to 8 origi-

nal peoples with legal recognition by Indigenous Law N. 19.253 of 1993 (Aymara, Rapa Nui, Atacameño, Quechua, Colla, Mapuche, Kawashkar and Yámana or Yagán)¹⁴³. According to the National Institute of Statistics (INE) (2005), on that occasion, 4.6% of the population that answered the census in the country declared to belong to one of the peoples listed in the question.

In turn, the National Socioeconomic Characterization Survey 2013 (Ministry of Social Development, 2013) determined that out of a total of 1.565.915 indigenous people identified in Chile, 12.579 belonged to the Colla People, representing the latter figure, of the total. On the other hand, the 2015 Casen Survey reports that out of a total of 1.585.680 people who identify themselves as indigenous in Chile, 1% corresponds to the Colla People (16.088 people) (Ministry of Social Development, 2017).

In close relationship with the rural/urban location of indigenous peoples in Chile, and especially with respect to the Colla People, the 2002 Census indicated that this People was the second in the highest migration rates (9.6%), preceded only by the Rapa Nui People (11.6%) (INE, 2005).

Regarding the poverty situation of the indigenous population in the country, the 2015 Casen Survey shows that 18.3% of the indigenous population lives in poverty due to lack of income, compared to 11.0% of the non-indigenous population (Ministry of Social Development, 2017).

2.2. Historical, territorial, cultural and economic background of the Colla people

¹⁴³ The question then asked was: “Do you belong to any of the following native or indigenous peoples? Alacalufe (kawaskar), Atacameño, Aymara, Colla, Mapuche, Quechua, Rpanui, Yámana (Yagán), none of the above” (INE, 2005: 7-8).

The Colla are an original people who have inhabited the Atacama Desert since remote times, located in what is now called the III Region of Atacama. However, its territory of ancestral use and occupation ranges from the ravines and the southern tip of southern Bolivia, northwestern Argentina and the puna, in the Chilean north of the Atacama Mountains, in the III Region. Thus, the ancestral territory and the dynamics of displacement of these people suffered a strong impact during the delimitation of national states in the region, in the early 19th century and the conflicts that followed, in defense of the country's borders.¹⁴⁴

It is worth mentioning that the use of this name “Colla” to identify the indigenous people who used to and still live in the ravines and the southern end of the Puno area in northern Chile, northwest Argentina and southern Bolivia, corresponds to a generalization used to name the indigenous people from the altiplano, whose origin would be Lake Titicaca, a place that inhabited the Colla kingdom in the pre-Hispanic and colonial periods (Molina, 2013; Commission for Historical Truth and New Treaty, 2008). However, as highlighted by Molina (2013), the current Collas do not have this ethnic origin and, in their case, the generalization of the denomination “Colla” would have worked to hide the plurality of local ethnic identities, while synthesizing several processes of historical mobility and ethnic and cultural diversity in the same territory.

In fact, under Hispanic rule, the indigenous and native groups and the mitmakuna colonies established in that area by the Incas, were sub-

¹⁴⁴ In fact, as recorded by the Report of the Commission on Historical Truth and New Treatment, during the period prior to the start of the War of the Pacific in 1879, the Antofagasta de la Sierra, Susques and Rosario areas were punished territories under the administration of the Republic of Bolivia. On the other hand, the Jujuy, Salta and Catamarca valleys were under the administration of the Argentine Republic, while the northern border of Chile reached Cerro Chaco in the Andes and near Paposo, on the coast (Commission on Historical Truth and New Treatment, 2008: 208). After the War of the Pacific, the Puno territory was disputed between Bolivia, Chile and Argentina, an issue that was resolved in 1900, when Bolivia ceded that territory to Argentina.

jected to the system of “*encomienda, mitas e yaconazgo*” (land concessions, forced recruitment and servitude) which meant expropriation of their lands, the imposition of forced labor and the transfer of diverse indigenous groups from their territories of origin (Commission on Historical Truth and New Treatment, 2008). During the 19th century and until the mid-20th century of the republican period, the indigenous submission in the Argentine northwest remained, generating new migratory flows (Commission of Historical Truth and New Treatment, 2008). For this reason, the “Colla” category emerges as an ethnicity resulting from the synthesis and syncretism of different indigenous peoples and others who migrated during the Inca occupation and in the colonial period; and also in the republican period, especially since Bolivia (Commission on Historical Truth and New Treatment, 2008).

In the case of the current Collas of the Cordillera de Chañaral and Copiapó, most families and lineages arrived in the late 19th century, coming from the villages of Valle de Fiambala and Puna de Atacama, in search of better pastures for cattle and trying to insert themselves in mining and supply activities for desert peoples and settlements (Molina, 2013; Commission for Historical Truth and New Treatment, 2008)¹⁴⁵. In this way, the ethnic origin of the Collas de Atacama corresponds to mobile groups that settled in the mountain range resulting from migratory flows, and that include families and people of Atacameño origin, former diaguitas, aymaras, members of the San Fernando de Copiapó Indige-

¹⁴⁵ As Molina (2013) documents, from the other side of the mountain range (Argentina and Bolivia), Ramos, Quispe, Marcial, Reinoso, Morales, Villanueva, Cruz, Bayón, Jerónimos, Quirogas, Araya, Cardoso and Bordonos arrived. “These Colla - and sometimes Atacameña - migrations gathered in the Copiapó and Chañaral Mountains to the families of the ancient San Fernando de Copiapó Indians, such as the Alcota and Tacquía, and some came from the valleys of Norte Chico; all of them established family, work, friendship and coexistence bonds, sharing the lives of the creators of the Collas mountain range” (Molina, 2013:101).

nous People and some mixed-race individuals (Commission on Historical Truth and New Treatment, 2008).

This also determined that until today, the community organization of the Collas is based on the institution of the family, who governs all productive, social, political and ritual activities, and the context in which socialization takes place and reproduces the lifestyle of the mountain range and transhumance, including for those who live in the city (Gahona, 2000).

From the second half of the twentieth century, the Colla economy underwent major changes due to several factors, such as the occurrence of drought cycles, pollution of grazing areas by smoke from the Potrerillos Foundation and the growing conflict associated with land tenure; all of which led to the loss of important grazing areas, the reduction of the amount of cattle and the movement of the Collas to increasingly isolated regions (Molina, 2013).

These and other social, economic and environmental changes caused migration processes to mining and urban centers among the Collas, and even encouraged the return of this population to Trans-Andean villages; all this led to a gradual reduction in the population dedicated to the activities of the countryside, at the same time as a diversification and complexification of survival strategies, which expanded the scenario of intercultural relations.

However, the biggest impact on the Collas' economies came after the 1973 coup. Several decrees and military groups ended small Colla mining, mainly by controlling the use of explosives¹⁴⁶. Also, for conservation purposes, the extraction of firewood and the production of charcoal in

¹⁴⁶ Of these restrictions and regulations Don Segundo Araya Bordones, a member of the Colla de Pai-Ote Community, spoke in an interview conducted by the author of this report. In particular, Don Segundo Araya commented that he was a gold miner and that the control and limitations on the use of explosives forced him to abandon this activity (Segundo Araya Bordones, interview, September 16, 2017).

the ravines of the mountain range were prohibited, including, for some time, the possession of goats.¹⁴⁷

Also, in the 1990s, the Government of Chile began to create protected wild reserves in territories of traditional use and occupation by Colla, such as Llanos de Challe National Park (1994) and Nevados de Tres Cruces National Park (1994), which represented important limitations for the development of the traditional activities of these people linked to transhumance (Guerra-Schleef, 2017b).

After the enactment of Law N. 19.253, in 1993, which established norms for the protection, incentive and development of indigenous people and created the National Corporation for Indigenous Development (CONADI), the Colla were recognized as “ethnicity” and their first communities were organized¹⁴⁸. Currently, the occupation and use of the territory by the Colla people continues to be based mainly on agriculture, small-scale crops and small mining (Molina, 2013; Commission for Historical Truth and New Treatment, 2008).

Although the Colla de Pai-Ote Community is based in Quebrada de Paipote, it moves constantly according to the seasons and rains, making extensive and alternate use of the territory. Thus, during the summer, the territories from the Quebrada de Bravos, in the northwest, to the Quebrada del Medio, in the south, are mainly used, using the grazing areas of the marshes and lagoons on the altiplano. However, during

¹⁴⁷ These kinds of limitations imposed during the dictatorship, which prevented the traditional activities of the Colla’s livelihood, were associated as a reason that led the three Quispe sisters to slaughter their cattle and dogs and then commit suicide, in June 1974 (Molina, 2013).

¹⁴⁸ In fact, with the enactment of Law N. 19.253, the Collas formed legal communities in Río Jorquera and its affluents, Quebrada de Paipote and Diego de Almagro (Potrerillos). Subsequently, other legal communities were formed, such as Pastos Largos, Sinchi Waira and Pai Ote, with whom they share or shared the same traditional transhumance territories. All of these communities have rural-urban residency standards, as do all indigenous peoples in the north of the country.

the winter, and depending on water availability, the community takes its ‘piños’¹⁴⁹ from the Andes to lower lands, reaching in some years the coastal region of Carrizal Bajo, close to the Llanos del Challe National Park, in a journey of approximately 200 km (Colla de Pai-Ote Community, 2016). This dynamic is directly associated with the natural phenomenon called flowering desert, which has been known in Colla culture since ancient times as “crossing”, because they cross the valley towards the coast. In the words of Don Segundo Araya Bordones, from the Colla de Pai-Ote Community:

“Transhumance is beautiful because you have a lot of fun while traveling. The journey from here, from **San Miguel** to **Paipote**, took us 3 days. We stopped for a few days, and then we went there, to Desierto Florido, now they call it that, before we used to call it *Travessía*”(original emphasis) (Comunidade Colla de Pai-Ote, 2016).

Behind the transhumance activities there is a profound respect for nature and the environment, which motivates the ordering of the territory through the alternation of the places where settlements are built (sporadic permanence of transhumance) and grazing areas are established.

Also, Don Segundo Araya Bordones refers to the importance of the territory and the relationship of his community with it: “For us, this land is very important, extremely important. And I tell you why: because we live on the land, we work, we suffer a lot, but we live free, nobody tells us what to do and we work as a community. As a community, we work “for everyone”, for the community, and that’s what we like ... Because

149 A ‘piño’ is a herd. It should be noted that in the Colla de Pai-Ote Community herds are shared, that is, in each herd there are animals owned by several people in the community. Also, when an animal is sold, the money is shared among community members.

we don't work for the family and no one else, but we do it for the entire community, and that's beautiful, because it's shared".

As we can see, land recognition is of great importance for the Collas, as it gives legal certainty to their traditional herding activities, the basis of the economy and culture of these people¹⁵⁰. It is true that after the enactment of Law N. 19.253 an important process of demarcation and titling of land for traditional use and occupation by several Colla communities was initiated, following the Framework Agreement between CONADI and the Ministry of National Goods, signed in 1994, the first demarcations of Collas communities were carried out later, between 1996 and 1997. Finally, it is worth noting that, to date, not all Collas communities have managed to obtain recognition by the Government of their territories of ancestral use and occupation. This is the case of the Colla de Pai-Ote Community, which, despite having permanent settlements in the Quebrada de Paipote and making use of several floodplains and marshes of the Andean altitude in its transhumance activities, has not yet managed to have the Government demarcate and deliver the title of their ancestral territories.

3. Canadian mining projects in Colla territory

The territory of occupation and ancestral use of the Colla People - which includes the so-called "Cinturón de Oro de Maricunga" or "Franja de Maricunga"¹⁵¹ - is under strong pressure due to the installation of

¹⁵¹ Names used in the mining world to refer to the "metalogenic belt of Maricunga, a north-north-east linear trend that contains at least 14 important occurrences of gold, silver and/or copper mineralizations between 26° and 28° south side latitudes of Chilean mountain range in the Andes [in the III Region of Atacama]" (Minería Chilena, 2011).

mining megaprojects. These projects affect summer and winter areas used by the community, which include important sectors for the development of transhumance and the Colla worldview, such as marshes and lagoons in the Andean highlands.

From the testimony provided by the members of the Colla de Pai-Ote Community and the information available on the mining projects, it was possible to detect six mega mining projects that are located today in their territory of ancestral use and occupation, developed by Canadian companies through their Chilean branches. Three of them are in the prospecting phase, and three are in the exploration phase.

3.1. La coipa and project la coipa phase 7 (Kinross Gold Corporation)

The La Coipa mine, owned by the company Kinross Gold Corporation, through its Chilean subsidiary Compañía Minera Mantos de Oro¹⁵² is located 140 kilometers northwest of Copiapó, and is currently in the exploration phase through its open pit operation. The global operation of La Coipa consists of six deposits: Ladera-Farellón, Norte Coipa, Norte Brecha, Can Can, Chimberos and Purén. Without prejudice to the previous one, the La Coipa mine currently operates four open pit mines (Ladera-Farellón, Norte Coipa, Brecha Norte and Purén).

Although the La Coipa mining operation went through a temporary shutdown process in 2013, due to the exhaustion of its economically exploitable reserves, in 2015 prospecting campaigns were closed in a new

¹⁵² According to information available on the company's website, Kinross Gold Corporation is a gold mining company based in the city of Toronto, Canada, and which currently operates mines and projects in the United States, Brazil, Chile, Russia, Ghana, Mauritania and Canada. Kinross acquired an equity interest in La Coipa after finalizing the agreement with TVX on January 31, 2003. On December 21, 2007, Kinross acquired the remaining 50% of Goldcorp Inc. and became its operator (Kinross Gold Corporation, s/f).

deposit called Phase 7, which would allow to continue the operations in the La Coipa area, based on plans to take advantage of existing infrastructure. This prospecting and drilling campaign was assessed from an environmental point of view under the form of an Environmental Impact Statement (DIA), called “Mantos de Oro Geological Prospecting”, and was authorized through Environmental Classification Resolution (RCA) N. 57/2012¹⁵³ of the Environmental Assessment Commission of the Atacama Region (COEVA de Atacama), with an investment of US\$ 25,000,000 (COEVA de Atacama, 2012).

During the environmental assessment of DIA “Mantos de Oro Geological Prospecting”, the holder stated that there were no human groups belonging to indigenous peoples in the area of influence of the project and that indigenous territories would not be affected, which was denied by CONADI. Without prejudice to the aforementioned, the Environmental Authority ruled out the presence of indigenous communities in the area of influence of the project and proposed its approval (SEA of the Atacama Region, 2012).

Given that the project “Mantos de Oro Geological Prospecting” made it possible to identify a new deposit, with favorable and economically profitable legislation due to the quantity and quality of its reserves, in July 2015, Kinross submitted the “La Coipa Mineral Exploration Phase7” project to environmental assessment again through a DIA, which was rated favorably by RCA N. 173/2016, COEVA de Atacama (COEVA de Atacama, 2016a). As had happened during the DIA environmental assessment “Mantos de Oro Geological Prospecting”, the holder stated

¹⁵³ RCA N. 57/2012 was favorable to the DIA of the project “Mantos de Oro Geological Prospecting”, which consists of “drilling a maximum of 350 drillings considering diamond teams with recovery of samples and reverse air equipment, with the aim of obtaining stratigraphic information for the area. The drilling will be 150-500 m deep” (COEVA de Atacama, 2012).

that there were no human groups belonging to indigenous peoples in the project's area of influence and that indigenous territories would not be affected, which was denied by CONADI, who noted the need for the project to be assessed through an EIA, so as to implement an indigenous consultation process¹⁵⁴. Without prejudice to the information above, the Environmental Authority ruled out the presence of indigenous communities in the area of influence of the project and proposed its approval.

3.2. Refugio Mining Project (Kinross Gold Corporation)

The open pit mine in Maricunga, currently 100% owned by Kinross Gold Corporation through its Chilean subsidiary Compañía Minera Maricunga, S.A.¹⁵⁵ is in the mining district of the same name in the high mountain range of Atacama (between 4,200 meters and 4,500 meters above sea level) approximately 120 kilometers east of the city of Copiapó.

It should be noted that this project was environmentally assessed through an EIA and that it had an original investment of US\$ 127,000,000, being approved by RCA N. 02/1994 of the then Regional Commission for the Environment of the Atacama Region (COREMA de Atacama) (COREMA de Atacama, 1994), beginning its commercial exploitation in 1996. Since ILO Convention 169 was not yet ratified, an indigenous consultation process was not carried out during the environ-

¹⁵⁴ As contained in Ordinary Letters N. 983, of December 11, 2015 (CONADI Northern Subdirection of Atacama, 2015), and N. 144, of February 19, 2016 (CONADI Northern Sub-Direction of Atacama, 2016).

¹⁵⁵ As a result of the merger with Kinam, Kinross acquired an initial 50% stake in Companhia Minera Maricunga S.A., becoming the operator of the Refugio Mining Project on June 1, 1998. The other 50% was owned by Bema Gold Corp. In February 2007, Kinross acquired the remaining 50% through the purchase of Bema (Kinross, s/f). It should be noted that in 2014, Compañía Minera Maricunga, S.A. merged with the Kinross subsidiary Minera Lobo Marte. Since then, Compañía Minera Maricunga S.A. has become the operator of the Lobo Marte project, a non-operational asset still in the feasibility stage, but with proven and probable reserves of 164.230 mt, with production forecast for 2019 and which is located 16 km east of the city of Copiapó.

mental assessment of the project. In 2010, Companhia Minera Maricunga presented a DIA for the modification of the mining process, a project called “Modification of the Refúgio Mining Project - Rationalization of the Mine Operation”, with an investment of US\$ 285.000.000, which was rated favorably through RCA N. 48/2011 of COVEA de Atacama (COVEA de Atacama, 2011a). This project aimed at “expediting the rate of extraction and increasing the processing capacity for ore, in order to reduce vulnerability of [...] [the Company] in relation to plummeting metal prices” (COVEA, 2011a).

As for the evaluation of possible variables of impacts of the project on Colla communities, it should be noted that, given the environmental assessment modality (DIA), an indigenous consultation process was not carried out during the environmental study of the project, as required by ILO Convention 169. This, even when CONADI realized a series of impacts that the project was already generating on Colla communities’ territories, as well as on their life systems and customs, especially the transhumant herding activities (CONADI Northern Subdirection of Atacama, 2010a).

However, later, CONADI spoke on that regard, with the environmental assessment of the mining project through a DIA, considering that the project’s area of influence was limited to the area where the Refugio Mining Project was located, which led the institution to conclude that there were no direct consequences for the Colla communities that used the swamps of the high Andes, waters below the mine location and the increase in motor vehicle traffic on the traditional Colla paths (CONADI Northern Subdirection of Atacama, 2010b).

It should be noted that, as in the case of other mining projects installed in the arid Atacama region, the water factor played a fundamental role in the conflicts associated with this project, which led the Nation-

al Institute of Human Rights (INDH) to include this project within the “Map of socio-environmental conflicts in Chile” maintained by this organization (INDH, 2015).

3.3. Cerro Casale (Barrick Gold and Goldcorp)

Cerro Casale is a mining project, currently owned by Barrick Gold (50%) and Goldcorp (50%) through Compañía Minera Cerro Casale (Chilean company) (Goldcorp, 2017a), which consists of operating an open air mine to produce and commercialize copper concentrate and ‘metal doré’ (gold and silver) (Barrick Gold Corporation, s/f). Cerro Casale is one of the largest undeveloped gold and copper deposits in the world, with proven and probable mineral gold and copper reserves totaling 23 million ounces of gold and 5.8 million pounds of copper (Barrick Gold Corporation, s/f).

The Cerro Casale mining project, as in the case previously analyzed, generated a high level of conflicts with several local actors that make use of common natural resources and the territory where this project is installed (Colla communities, farmers, local community, among others), which meant its inclusion in INDH’s “Map of socio-environmental conflicts in Chile” (National Human Rights Institute, 2015).

Due to the modality of study of the project, during the procedure, a process of popular participation was considered, in which the Colla communities, farmers and community organizations made observations related to the global operation of this project. Thus, during the environmental study of this project, the main relevant issues raised by the local community were related to the impact that the works would have on the wild areas protected by the Government, existing in the place where the project was installed (Parque Nacional Nevado Tres Cruces and the Ramsar Lagoon Complex, Laguna del Negro Francisco and Laguna Santa

Rosa), as well as the 69 archaeological sites, 31 of which are close to the linear paths that will correspond to the project's facilities - 7 of them located within the areas where the tailings deposits will be made and sterile; in addition to 5 sites within the Port facilities, in the Caldera community (INDH, 2015).

In fact, the current project includes the removal of 3.800 million tons of rock, which, after being processed, will generate 2.800 million tons of waste and 1.026 million tons of tailings, all of which will be stored in place and will be exclusive responsibility of the communities that inhabit or that make use of the natural assets present in the area, since the abandonment plans only include guaranteeing the physical-chemical stability in the case of the sterile ones, and, for the tailings, to restrict the access to the area with signs and barriers (INDH, 2015).

Finally, during the environmental study of this project, the impact on the Colla communities, their traditional use and occupation territory, as well as on their cultural and archaeological heritage was also the object of observations and concern. In fact, as was observed during the popular participation process, the EIA emphasized that the displacement area of the project "features a scarce population", omitting important background information on the Colla communities and their ways of life based on transhumance, nomadic herding, in which communities move constantly according to the seasons in search of food (COREMA de Atacama, 2001).

It is worth mentioning that, in relation to the impact studies of this project on the Colla communities, CONADI has issued their opinion in several official letters. Thus, at first, this body was of the opinion that in the referred project, an indigenous consultation process should be carried out due to the impacts it generates, fundamentally, on the Colla de Río Jorquera and Pai-Ote communities (neighbor to the pipeline), due

to impacts on their lands and territories, as well as water resources of ancestral use (CONADI North Subdirection of Atacama, 2011b). During the environmental study, the holder tried to deny the impact of the project on Colla communities, claiming that in the area of influence of the project there are no “lands with current occupation and use” (Compañía Minera Casale, 2012a), which was contested by CONADI, due to the illegality of this concept, the lack of compliance with international standards and the concept of “lands” present in Law N. 19.253 and ILO Convention 169 (CONADI North Subdirection of Atacama, 2012b).

An important irregularity that occurred during the environmental study of this project had to do with the validation, by the authorities, of a process of direct dialogue between the Colla de Río Jorquera Community and the project owner as if it were a process of indigenous consultation.

As appreciated, the holder expressly acknowledged that the process was carried out directly by the company, and CONADI only limited itself to acting as an observer, validating the process in the understanding that it complied with all the standards provided for in ILO Convention 169.¹⁵⁶

Once the Barrick company has decided to stop its activities worldwide, the project is on hold. However, they continued with the administrative and legal procedures required to rely on Chile’s environmental permits. In March 2015, the company stated that in a study completed in November 2014 to search for project optimization strategies, it found no alternative, which will result in a significant reduction in the 2015 budget for project continuity.

3.4. Quebrada Seca exploration project (Kinross Gold Corporation)

¹⁵⁶ See Compañía Minera Casale (2012b) and CONADI National Directorate (2012).

The Quebrada Seca exploration project, up until now 100% owned by Kinross Gold Corporation through its Chilean subsidiary Minera Bema Gold Chile Ltda.¹⁵⁷, is installed at the south end of the District of Maricunga, in the high mountain range (4,500 masl), in the community of Tierra Amarilla, approximately 175 km southeast of the city of Copiapó. This project was rated favorably by the RCA N. 9/1999 of COREMA de Atacama (COREMA de Atacama, 1999). It is worth mentioning that in the DIA environmental study on this project, the impacts of the prospecting campaigns on the Colla communities and their territory were not considered and, due to the time when the study was carried out, the possibility of implementing a process of indigenous consultation was not even considered for debate, which becomes evident when the study file and the RCA of the project are reviewed.

3.5. Cerro Maricunga Project (Atacama Pacific Gold Corporation)

The Cerro Maricunga exploration project, still in the exploration stage, is 100% owned by Atacama Pacific¹⁵⁸ and is installed 140 km, by road, northeast of Copiapó, at the north end of the Maricunga Mineral

¹⁵⁷ In 2007 Kinross Gold Corporation acquired Minera Bema Gold Chile Ltda. Notwithstanding this, after the agreement signed in March 2017 between Golcorp and Barrick, which aims to form a 50/50 *joint venture*, Golcorp committed to finance the acquisition of 100% of the Kinross Quebrada Seca exploration project, to add it to the Company. Notwithstanding this, according to the information available on the official websites of the Canadian mining companies involved (Golcorp, Barrick and Kinross) to date, the transfer has not yet taken place.

¹⁵⁸ Atacama Pacific Gold Corp. is a precious metals company focusing on Chile that is dedicated to exploring and developing its gold property in Cerro Maricunga oxides, installed in the Maricunga gold belt, in the 3rd Region in northern Chile. The company is also dedicated to the acquisition, exploration and development of other properties of precious mineral resources in Chile. Atacama has five other mining properties located close to the Cerro Maricunga project, and a sixth property in the I Region. Its gold projects include Anocarire, Piedra Parada, Roca and Pircas Gold. Atacama Pacific Gold was incorporated in 2008 and is headquartered in Toronto, Canada, (Atacama Pacific Gold Corporation, s/f).

Belt (*Cinturón Mineral Maricunga*), 20 km south of Kinross Gold's La Copeia gold and silver mine.

Regarding the evaluation of the impacts of the project “Cerro Maricunga Mining Prospects” on the Colla communities, although the company recognized the presence of members of the Colla de Pai-Ote Community in the vicinity of the area of influence, it did not deliver such background information to the environmental authority to allow it to assess potential impacts. CONADI observed this situation, and requested the company to collect information to measure the impact of the drilling campaigns on the transhumance activities of the Colla community and, if applicable, to open an indigenous consultation process as required by ILO Convention 169 (CONADI Northern Subdirection of Atacama, 2011a). This observation was reiterated by the Regional Ministerial Secretariat for Social Development (2011a). However, this authority finally decided to talk according to the information presented by the holder in its ADDENDUMS, discarding the significance of the impact of the mining project on Colla communities, without implementing an indigenous consultation process (Regional Ministerial Secretariat for Social Development, 2011b).

3.6. Caspiche (Goldcorp)

Caspiche is a project 100% owned by Exeter Resource Corporation, through its Chilean subsidiary, Sociedad Contractual Minera Eton Chile, a company that is currently in the process of being acquired by Goldcorp¹⁵⁹. The project is located in the Maricunga Golden Belt, approximately 10 kilometers north of Cerro Casale, at 4,300 meters above sea level, in the town of Tierra Amarilla. The project consists of the explo-

¹⁵⁹ After the agreement signed between Golcop and Barrick Gold, with the objective of forming a 50/50 *joint venture*, Goldcorp undertook to acquire Exeter Resource Corporation and 100% of the Caspiche project, to be incorporated into the *joint venture*.

ration of sulfate and oxide minerals in the deposit for the production of gold, silver and copper, in a mine that covers 1.262 ha.

Regarding the assessment of the project's possible impacts on the Colla communities, it is worth noting that in its DIA the holder omitted any reference to this variable. In addition to that, during the environmental study of this project, impacts on Colla communities were not considered and the administrative body that should reveal this variable (Regional Ministerial Secretariat SECPLAC) evaded the procedure, considering that it should not grant sectorial environmental authorizations regarding of this project (SECPLAC Regional Ministerial Secretariat of Atacama, 2007). Nonetheless, the only impact that had any degree of consideration, although marginal, was the use of an access path that passes through the lands of the Colla Río Jorquer Community and its Affluents, about which the environmental authority requested the holder to “inform how it does NOT cause [...] [significant impact on the life and customs systems of Colla communities as a result of a change in the geographic or anthropological dimension], the latter within the scope of Law 19.253”(COREMA de Atacama, 2007a). In view of this, the holder replied “that the access path presented in the DIA is public and existing, that is, the path is not indigenous”, and [the] stretch in which this path passes through indigenous land is very small, when compared to its entire length”, therefore the impact is not significant (Sociedad Contractual Minera Eton Chile, 2007b).

In the case of the “Expansion of Caspiche Central” project, again the administrative body that was supposed to survey the possible impacts of the project on indigenous communities (Regional Ministerial Secretariat for Social Development) avoided carrying out the procedure, and the study on the impacts of this survey campaign on Colla communities was undervalued, both by the holder and by the Environmental Authority.

Thus it appears in the various consolidated reports of requests for clarifications, rectifications and/or extensions of DIA and in the ADDENDUMS that respond to these reports.

4. Legal framework applicable to indigenous peoples and their rights in relation to investment projects

Next, we analyze the legal framework applicable to the rights of indigenous peoples in the context of extractive projects and the exploitation of natural resources in Chile, including both domestic law and international standards developed under the umbrella of international human rights law. This is essential to identify and analyze the impacts of the mining projects included in the previous chapter on the rights of the Colla communities, especially regarding the Colla de Pai-Ote Community.

4.1. Standards applicable to indigenous peoples in the context of extractive projects or exploitation of natural resources

a) The rights of indigenous peoples in international human rights law

During the last three decades, and due to the articulation and survey of national, regional and international indigenous peoples movements, the rights of these peoples have been seen as an important component of international human rights law, populating the agendas of different

rights protection mechanisms and bodies, which, under the umbrella of their mandates or instruments, developed human rights standards applicable to indigenous peoples.

Nonetheless, to date, the only international treaty on human rights that specifically and completely addresses the rights of indigenous peoples is ILO Convention 169 on Indigenous and Tribal Peoples in Independent Countries, which has been considered as “the most comprehensive binding international legal instrument that, in terms of protection of indigenous and tribal peoples, has been adopted to date, and its adoption constitutes a transcendental landmark in the relevant international legislation” (ILO Regional Office for Latin America and the Caribbean, 2007: 7).

When ILO Convention 169 was adopted by the International Labor Conference in 1989, the international community pursued the explicit objective of rectifying the way in which it had historically faced the issue of indigenous peoples, seeking to “correct the assimilation orientation of previous norms” (Preamble, ILO Convention 169). For that, Convention 169 is based on the idea that cultural diversity is a value that must be protected and promoted, establishing a series of rights that are attributed to indigenous peoples in their specific condition as collective subjects¹⁶⁰, which represents a shift and a change in relation to the tra-

¹⁶⁰ In specifying its scope, in its Article 1.1, the Convention defines tribal and indigenous peoples in independent countries. According to this provision, tribal peoples are those groups “whose social, cultural and economic conditions distinguish them from other sections of the national community, and whose status is regulated wholly or partially by their own customs or traditions or by special laws or regulations”. Indigenous peoples are those collectives that descend: “from the populations which inhabited the country, or a geographical region to which the country belongs, at the time of conquest or colonization or the establishment of present state boundaries and who, irrespective of their legal status, retain some or all of their own social, economic, cultural and political institutions”. Without prejudice to this, Article 1.2 states that “[a] self-identification as indigenous or tribal shall be regarded as a fundamental criterion for determining the groups to which the provisions of this Convention apply”. Likewise, the emphasis on de-

ditional modern liberal paradigm that assigns ownership of rights over the individual¹⁶¹.

As Meza-Lopehandía (2016) points out, this paradigm shift is expressed in the centrality that Convention 169 gives to three closely related issues: 1) the protection and recognition of the territorial rights of indigenous peoples, insofar as these peoples maintain a close relationship with their habitat, on which their cultural and material survival depends, which implies a reconfiguration of the traditional model of civil right ownership that implies an “arbitrary” relationship with the “thing”; 2) the recognition both of certain areas of autonomy and of the legal systems and institutions of indigenous peoples; and 3) the establishment of procedural rights of a participatory, mandatory and incident nature, which are materialized through indigenous consultation and participation, which were considered by the ILO itself as the “cornerstone of the Convention” (CEACR, 2009a)¹⁶².

termining the ownership of rights enshrined in Convention 169 and the status of indigenous or tribal people depends on collective or individual self-definition, the only valid criterion that derives from the autonomy that international human rights law has recognized these collectives. This was expressly recognized by the Inter-American Court of Human Rights (Inter-American Court), among other important antecedents, in its sentence of August 24, 2010, in the case of the Xákmok Kásek Indigenous Community with Paraguay (Corte IDH, 2010).

161 In the same vein, Article 1 of the UN Declaration on the Rights of Indigenous Peoples states that: “Indigenous peoples have the right to the full enjoyment, as a collective or as individuals, of all human rights and fundamental freedoms as recognized in the Charter of the United Nations, the Universal Declaration of Human Rights and international human rights law.” At the regional level, the Inter-American Court of Human Rights has highlighted that: “[...] the international norms regarding indigenous and tribal peoples and communities recognize rights to peoples as collective subjects of international law and not exclusively to their members. Since indigenous and tribal peoples and communities, united by their particular forms of life and identity, exercise certain rights recognized by the Convention from a collective dimension, the Court emphasizes that the considerations of law expressed or rendered in this Judgment must be understood at from this collective perspective” (Corte IDH, 2012, par. 231).

162 In the same vein, the Inter-American Court highlighted that “[the] recognition of the right to consultation of indigenous and tribal communities and peoples is grounded on, among others, respect for their rights to their own culture and cultural identity [...], which must be guaranteed, particularly, in a pluralistic, multicultural and democratic society” (Corte IDH, 2012, par. 159).

b) Territorial rights of indigenous peoples

As has been said, among the most relevant collective rights guaranteed by Convention 169 to indigenous peoples are territorial rights, which have key implications in the context of the development of extractive projects. Indeed, Convention 169 enshrines the duty of States to: “[...] respect the special importance for the cultures and spiritual values of the peoples concerned, their relationship with the lands or territories, or both, as the case may be, which they occupy or use for other purposes and, particularly, the collective aspects of this relationship” (art 13.1). Along with the foregoing, Convention 169 defines the concept of territory, which incorporates the term “lands”, “[...] encompasses the entire environment of the areas that these peoples occupy or use for other purposes” (article 13.2).

Based on that last definition, this international instrument recognizes a series of specific rights of indigenous peoples over their territories, differentiating between the right to property and ancestral possession (whose foundation is ancestral occupation and not the existence of any title recognized by the Government), and the right to use land or habitats that are not exclusively occupied by them, but to those who have had access to their traditional and subsistence activities, and must “pay particular attention to the situation of nomadic peoples and itinerant farmers” (article 14).

As guarantees of the right of property and ancestral possession of indigenous and tribal peoples, the Convention emphasizes the duty of States to adopt all “[...] the necessary measures to identify lands traditionally occupied by the peoples concerned and guarantee the effective protection of their property and possession rights.” (art. 142). On the other hand, Article 15.1 of Convention 169 enshrines, as part of the territorial rights of

indigenous and tribal peoples, specific rights over the natural resources existing in their territories, which includes their right “[...] to participate in the use, management and conservation of these resources”.

Finally, the property and ancestral right of indigenous peoples is guaranteed by their right not to be removed from the lands they occupy without their consent, given freely and with full acknowledgement (art. 16 of the Convention).

In 2007, the rights recognized in Convention 169 were reaffirmed with the approval of the United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP), an instrument approved with the favorable vote of Chile. On the other hand, in terms similar to article 14 of Convention 169, UNDRIP enshrines the rights of indigenous peoples to the lands, territories and resources that they traditionally own and occupy or have otherwise used or acquired (article 26.1) and the right to possess, use, develop and control the lands, territories and resources that they possess due to traditional property acquisition or other traditional form of occupation or use, as well as those that they have otherwise acquired. (Article 26.2).

At the regional level, both the Inter-American Commission on Human Rights (IACHR) and the Inter-American Court of Human Rights (Inter-American Court), referring in particular to the right to property guaranteed in the American Convention on Human Rights (Article 21) in the context of indigenous and tribal peoples, produced key jurisprudence on indigenous peoples’ rights to their community lands¹⁶³.

¹⁶³ As stated by the Inter-American Court in this case: “Under an evolutionary interpretation of international instruments for the protection of human rights, considering the applicable standards of interpretation and, in accordance with article 29.b of the Convention - which prohibits a restrictive interpretation of rights -, this Court considers that the Article 21 of the Convention protects the right to property in a sense that includes, among others, the rights of members of indigenous communities within the framework of community property, which is also recog-

The Inter-American Court was blunt in emphasizing that the culture of indigenous peoples corresponds to a special way of being, seeing and acting in the world, constituted from its close relationship with their territories and natural resources present in them, not only because they are the their main means of subsistence, if not, moreover, because they constitute an integral element of their worldview, religiosity and, consequently, of their cultural identity¹⁶⁴.

c) **The right of indigenous peoples to self-determination and to strengthen their own institutions.**

International human rights law has taken important steps in recognizing indigenous peoples' rights to autonomy and free determination, which include their right to decide, according to their own customary law and institutions, how to use the land and natural resources they own, and on which their lives and cultures depend. In ILO Convention 169, this right is guaranteed in Article 7.1, which enshrines the right of indigenous and tribal peoples to:

“[...] decide their own priorities for the process of development as it affects their lives, beliefs, institutions and spiritual well-being and the lands they occupy or otherwise use, and to exercise control, to the extent possible, over their own economic, social and cultural development.”

nized in the Political Constitution of Nicaragua”. Inter-American Court Human Rights, Case of the Mayagna (Sumo) Community Awas Tingni vs. Nicaragua, Judgment of August 31, 2001. C Series N. 79, paragraph 148):

¹⁶⁴ See Inter-American Court, Yakye Axa Indigenous Community Vs. Paraguay (2005, par. 135); Inter-American Court, Sawhoyamaxe Indigenous Community Vs. Paraguay (2006, par. 118); and, more recently, Inter-American Court, Garífuna Triunfo de La Cruz Community and its members vs. Honduras (2015a).

The right of indigenous peoples to choose their development priorities is linked to their territorial rights and those over their traditionally used resources, as well as their participatory rights and procedural content, such as the right to participate in decision-making and to be consulted on the measures likely to affect them. These last procedural rights will be analyzed in the following point.

One of the most relevant provisions, which establishes the governance rights of indigenous and tribal peoples over their traditionally used natural resources, is the aforementioned Article 15.1 of Convention 169. This provision enshrines specific rights of indigenous peoples over natural resources of traditional use, which includes their right “[...] to participate in the use, management and conservation of these resources”, configuring the sustenance of indigenous governance over biodiversity and other common natural assets found within the ancestral territories of indigenous peoples.

Thus, Article 2 of the Convention establishes the governments’ responsibility for “developing, with the participation of the peoples concerned, coordinated and systematic action to protect the rights of these peoples and to guarantee respect for their integrity.”.

With regard to the conservation and maintenance of their traditional health systems, indigenous peoples are entitled to “[...] their own traditional medicine practices and to maintain their health practices, including the conservation of their medicinal plants, animals and minerals vital interest”(art. 24.1).

- d) Procedural rights of an environmental nature, right to fair compensation and profit sharing in the context of extractive projects.

As already mentioned, the right of indigenous peoples to decide their development priorities is reflected, among other relevant principles, in the rights to consultation and participation in Convention 169, which are guaranteed in general terms in Articles 6 and 7. In fact, Convention 169, in its Article 6, establishes that when applying the provisions of the Convention, governments should consult interested indigenous and tribal peoples, through appropriate procedures and, in particular, through their representative institutions, whenever any legislative or administrative measures are likely to affect them directly¹⁶⁵. Adding that consultations must be carried out in good faith and in a manner appropriate to the circumstances, in order to obtain consent on the proposed measures. In the case of activities involving the exploitation of natural resources in territories of indigenous and tribal peoples, the right to consultation is specifically enshrined in Article 15.2 of the Convention, which states that:

“In cases in which the State retains the ownership of mineral or sub-surface resources or rights to other resources pertaining to lands, governments shall establish or maintain procedures through which they shall consult these peoples, with a view to ascertaining whether and to what degree their interests would be prejudiced, before undertaking or permitting any programmes for the exploration or exploitation of such resources pertaining to their lands”.

In International Human Rights Law, the minimum guarantees of the right to consultation of indigenous peoples have been developed, establishing that:

¹⁶⁵ In the same vein, Article 19 of the UNDRIP establishes that States shall consult and cooperate in good faith with interested indigenous peoples through their representative institutions before adopting and applying legislative or administrative measures that affect them, in order to obtain their free, prior and informed consent.

- **The obligation to consult is the responsibility of the Government and, consequently, cannot be delegated to companies.** Thus, Article 6 of ILO Convention 169 clearly establishes, which was also expressly recognized by the Committee of Experts on the Application of ILO Conventions and Recommendations (CEACR, 2010). In the same sense, at the regional level, both the IACHR and the Inter-American Court were emphatic in pointing out that the obligation to consult is the responsibility of the Government, whereby the planning and carrying out of consultation processes cannot be delegated to private companies or third parties, much less to the company itself interested in the exploitation of resources in the territories of the community subject to the consultation (Corte IDH, 2012).
- **The consultation must be prior.** As the Inter-American Court has pointed out, in the case of consultations carried out in the context of projects for the exploitation of natural resources, its prior nature means that they must be carried out “from the first stages of the preparation or planning of the proposed measure, so that indigenous peoples can really participate and influence the decision-making process” (Corte IDH, 2012, par. 167 and 180-182; 2007, par. 133). That is because “[the] early warning provides time for internal debate within communities and to offer an adequate response to the Government” (Corte HD, par. 133).
- **The consultation must be free.** That means that it must be free from manipulation, intimidation or coercion. According to the Inter-American Court, consultation in good faith is incompatible with practices such as attempts to disintegrate the social cohesion of the affected communities, either by attracting the will of community leaders or by establishing references or paral-

lel leaders, or through negotiations with individual members of the communities, which are contrary to international standards (Corte IDH, 2012, par. 186).

- **The consultation must be informed.** This means that indigenous peoples must have at their disposal all the information about the measure to be consulted, as the possible risks and damages that the proposed development or investment plan would imply. In this sense, the consultation requires the Government to accept and offer information and implies constant communication between the parties (Corte HD, 2012, par. 208).
- **The consultation must be in good faith.** That consultations must be held in good faith means for the Inter-American Court that they should not be limited to a simple formal procedure, but that they should be conceived as a true instrument of participation, “which must respond to the ultimate objective of establishing a dialogue between the parties based on principles of mutual trust and respect, and aiming at reaching consensus between them” (Corte IDH, 2012, par. 186).
- **Consultation must be adequate and through representative indigenous institutions.** Several bodies and mechanisms of international experts have commented on the requirement that consultations be appropriate and that they be carried out through institutions representing indigenous peoples, emphasizing that this standard must be interpreted flexibly, since “there is a single model of appropriate procedure and this should consider the national and indigenous peoples’ circumstances, as well as the nature of the measures consulted” (ILO Governing Body, 2009, par. 42). For its part, the Inter-American Court affirmed that the Government has a duty to consult

indigenous peoples according to their customs and traditions, considering “the traditional methods of the people [...] for decision-making” (Corte IDH, 2007, par. 133).

- **Consultation should be carried out with the aim of reaching an agreement or obtaining consent, as long as consent is not an essential requirement.** Consultations are not simply formal procedures and have a main goal: to reach an agreement or to obtain consent regarding the measures proposed in a context of intercultural dialogue. As stated by the ILO Committee of Experts on the Application of Conventions and Recommendations, the purpose of reaching an agreement or obtaining consent is only an initial purpose that does not invalidate the consultation process if this is not achieved, since the “Consultations do not imply a right of veto nor will the result necessarily result in reaching an agreement or obtaining consent” (CEACR, 2010).

Now, another procedural right, but one that is oriented to the protection of the substantive rights of indigenous and tribal peoples in the context of extractive projects, is the right of these peoples to which States: “ensure that, whenever appropriate, studies are carried out, in cooperation with the peoples concerned, to assess the social, spiritual, cultural and environmental impact on them of planned development activities”. (art. 7.3). As highlighted by the IACHR (2015) in relation to this requirement, for the correct assessment of the impacts of extractive or development projects on indigenous peoples, it is not enough with the traditional environmental approach:

“[...] but the impacts of a given project must also be assessed from the perspective of human rights that can be affected, injured or in some way, restricted. In other words, the IACHR’s central concern is the inclusion of criteria and pro-

cedures to ensure an analysis of the impact on human rights involved within the decision-making process. In cases where such activities may affect indigenous, tribal and Afro-descendant peoples or communities, there is a special duty, already developed by the organs of the inter-American system, to carry out studies prior to the social and environmental impact, with the participation of these peoples or communities” (par. 89).

For its part, the Inter-American Court emphasized that these studies must “be carried out in accordance with international standards and good practices in this regard” ¹⁶⁶and by “entities that have the supervision of the Government” (Corte IDH, 2007, par. 129; 2012, par. 205). Also, “one of the factors that the study of social and environmental impact should address is the accumulated impact generated by existing projects and those that will be generated by the projects that have been proposed” (Corte IDH, 2008, para. 41. Finally, the Inter-American Court emphasized that the ultimate purpose of socio-environmental impact assessments must be to “preserve, protect and guarantee the special relationship” of indigenous and tribal peoples with their territories and to guarantee their subsistence as peoples (Corte IDH, 2008, par. 40). Thus, in the event that indigenous and tribal peoples or Afro-descendant communities are affected, States must adopt the necessary measures to ensure the fulfillment of these special duties.

As we can appreciate, the effective protection of natural resources present in indigenous territories requires that States guarantee their

¹⁶⁶ In this sense, the process of implementing the Convention on Biological Diversity (1992) is, likewise, relevant to the protection of the environment of indigenous peoples, since in this context, good practices for the execution of impact studies have been developed and analyzed. In fact, in 2004, the Conference of the Parties to the Convention adopted the Akwé Kon Voluntary Guidelines for carrying out cultural, environmental and social impact studies in relation to projects carried out in indigenous territories, including sacred places (CDB Secretariat, 2005).

members the exercise of certain human rights of a procedural nature, especially access to information, participation in decision-making and access to justice (IACHR, 2015). In the case of indigenous peoples, participation in decisions about development activities that could affect their territories not only implies adopting prior consultation procedures in order to determine whether the interests of these peoples will be harmed and to what extent, but also the right to participate in the profits arising from these activities, and to receive equitable compensation for any damage they may suffer as a result of them.

e) State responsibility for third-party acts: Companies and Human Rights

The general obligations of Governments regarding human rights are related to their respect and guarantee. That is what is expressed in Article 1.1 of the American Convention, which establishes the obligations of States Parties to respect and guarantee the human rights of all persons within their jurisdiction, without discrimination of any kind. As the Inter-American Court has emphasized since its first sentences, this article is essential to determine whether a violation of human rights recognized by the Convention can be attributed to a State Party and, therefore, to establish their international responsibility for such violations. In this sense, the obligation to respect translates into the “duty of the Government not to interfere, hinder or prevent access to the goods that constitute the object of the law” (IACHR, 2015, par. 39). In turn, the obligation:

“[...] implies the duty of Governments to organize the governmental apparatus and, in general, all the structures through which public power is exercised, so that they are capable of juridically ensuring the free and full enjoyment of human rights” (Corte IDH, 1988, par. 166).

Now, the organs of the inter-American human rights system “have repeatedly recognized that, in certain circumstances, international responsibility may be generated by the Government for attributing acts of human rights violations committed by private persons, which clearly includes private companies” (IACHR, 2015, par. 46). Likewise, in the United Nations system for the protection of human rights, the Human Rights Committee, the body that oversees the International Covenant on Civil and Political Rights, stressed that:

“The positive obligations of States Parties to protect the rights of the Covenant will only be fully fulfilled if individuals are protected by the Government, not only against violations of the rights of the Covenant by its agents, but also against acts committed by private persons or entities that would prevent the enjoyment of the rights of the Covenant insofar as they are subject to application between individuals or private entities” (Human Rights Committee, 2004, par. 80).

In this context, both the United Nations system and the Inter-American Human Rights system began several years ago to address the issue of companies and human rights. In 2005, the former United Nations Human Rights Commission established a mandate for a “Special Representative of the Secretary General for the issue of human rights and transnational companies and other companies” and asked the Secretary General to appoint the mandate holder, when John Ruggie was appointed. In 2010, Special Representative Ruggie presented his report on the Guiding Principles (GP) on business and human rights to the Human Rights Council of that entity (Human Rights Council, 2011). The Human Rights Council took on these GPs through its Resolution 17/4 of 16 June 2011.

The United Nations GPs in this regard are based on three fundamental pillars: 1) The State’s obligation to protect against human rights abus-

es by third parties, including companies, through appropriate measures, regulatory activities and submission to justice (Pillar 1); 2) the obligation and responsibility of companies to respect human rights, which implies the duty to avoid violating people's rights and to repair the negative consequences of their activities, which was classified as "due diligence" (Pillar 2); and 3) the need to establish effective mechanisms that both States and companies must ensure that victims of human rights abuses by companies have access to effective mechanisms - both judicial and extrajudicial - for repairing those damages (Pillar 3).

In compliance with the Governments' duty to protect (Pillar 1), they have, among other obligations, to: a) Enforce laws that have as their object or effect to make companies respect human rights, periodically assess whether such laws work and remedy any shortages; b) To ensure that other laws and regulations that govern the creation and activities of companies, such as commercial law, do not limit but promote the respect of human rights by companies; c) To effectively advise companies on how to respect human rights in their activities; d) Encourage and, if necessary, require companies to explain how they take into account the impact of their activities on human rights (Human Rights Council, 2011).

In turn, in compliance with their obligation to respect human rights (Pillar 2), companies must "refrain from violating the human rights of third parties and face the negative consequences on human rights in which they have some participation" (Human Rights Council, 2011, Principle 11) - exercise due diligence - to ensure that their activities and relationships do not violate human rights. The Guiding Principles clearly state that this responsibility extends to all business operations and relationships and that it is independent of what the Government does or fails to do.

According to the same GP, the responsibility of companies, moreover, obliges them to “prevent or mitigate adverse human rights impacts that are directly linked to their operations, products or services by their business relationships, even if they have not contributed to those impacts” (Human Rights Council, 2011, Principle 13). In addition, the same GP states that if companies caused or contributed to cause negative consequences, they “must repair them or contribute to their repair by legitimate means” (Human Rights Council, 2011, Principle 22).

Finally, with regard to remedy mechanisms (Pillar 3), the RP provides that, as part of their duty to protect against human rights violations related to business activities,

“States must take appropriate steps to ensure, through judicial, administrative, legislative or other appropriate means, that when such abuses occur within their territory and/or jurisdiction those affected have access to effective remedy” (Human Rights Council, 2011, Principle 25).

Given the serious impacts that many business activities have had on indigenous peoples, the United Nations Working Group on Business and Human Rights (gT), established in 2011 as a special procedure to promote the GPs, produced one of its first thematic reports in relation to implications of these GPs for indigenous peoples (gT, 2013). Among the most relevant aspects of this report, the gT provides that, in accordance with internationally recognized human rights, States have an obligation to consult in advance, before approving or authorizing the execution of projects for the exploitation of natural resources that affect the rights of indigenous peoples over lands, territories and resources.

Given the large number of extractive projects in the region and the increasing pressure on natural resources at the level of the Inter-Amer-

ican Human Rights System, the concern on this matter recently led the IACHR (2015) to present a thematic report on the rights of indigenous peoples and Afro-descendant communities affected by extractive activities. According to the IACHR, an organization that during the past few decades has been required to process a large number of complaints due to situations that concern violations of the human rights of indigenous and tribal peoples as a result of the development or exploration project, States - in addition to their obligations general human rights matters (respect and guarantee them) - have specific obligations when it comes to the execution of extraction, exploration and development activities by public, private or mixed companies, whether national or foreign. These obligations include: the duty to design, implement and effectively apply an appropriate regulatory framework; the duty to adopt a legal framework that adequately addresses foreign companies; the duty to prevent, reduce and suspend negative impacts on human rights; the obligation to supervise and socialize in terms of extractive activities, exploration and development; the duty to guarantee mechanisms for effective participation and access to information; the duty to prevent illegal activities and forms of violence against the population in areas affected by extractive, exploration or development activities; the duty to guarantee access to justice; research, sanction and remedy human rights violations; the duty to ensure that restrictions on the use and enjoyment of indigenous peoples' lands, territories and natural resources do not imply a loss of their physical and cultural survival; the duty to guarantee effective participation, studies on socio-environmental impact and shared benefits; among others (IACHR, 2015).

- f) States' extraterritorial obligations regarding human rights and their implications for the operation of companies.

International law has recognized that States must comply with their international human rights obligations (respect, protect and comply) outside their own territory, giving rise to what has been called extraterritorial human rights obligations (ETO, for its acronym in English) (Observatorio Ciudadano, 2016). The ETO arise from the international cooperation obligations considered in international rights since the United Nations was formed, and have been strengthened over time through the different human rights treaties that today are part of the international human rights law developed by that entity (Observatorio Ciudadano, 2016).

Consistent with this, the UN treaty control bodies developed an important jurisprudence referring to the ETO of States in the area of human rights in different reports, declarations and general observations, contributing to a conceptual definition of these obligations, which define their scope and application to both actions and omissions by States¹⁶⁷. One of the areas in which the extraterritorial obligations of States in the area of human rights were developed by the treaty bodies is that related to the implications of companies' actions. Thus, for example, the United Nations Committee on Economic, Social and Cultural Rights (CESCR Committee) expressed its concern to States for the lack of control of companies that are domiciled in them, operate abroad, and that negatively impact human rights. In this regard, the CESCR Committee urged States to adopt measures and regulations, to investigate and provide legal remedies and remedies for violations (CESCR Committee 2013a, par. 12; 2013b, par. 6).

¹⁶⁷ According to ESCR-Net, in the 7 years leading up to the year 2014 the United Nations treaty control bodies had addressed the extraterritorial obligations of States regarding human rights on 23 occasions in their observations, including in them references to rights such as social security, the right to food, the right not to be tortured, the right to housing and water, the right to an effective remedy and reparations (ESCR-Net, 2014).

More recently, at the regional level, States' ETOs on human rights issues have also been a matter of concern for the organs of the inter-American human rights system. Thus, in its recent thematic report on human rights standards in the context of the development of extractive industries in territories of indigenous and tribal peoples, the IACHR examines for the first time the issue of ETAs in States, as it finds that many development projects are implemented by foreign companies whose headquarters are in another country with the approval and express support of the Government of origin (IACHR, 2015). As highlighted by the IACHR (2015):

“In hearings on this issue before the IACHR, the current Rapporteur on Indigenous Peoples - also the Rapporteur on People of African Descent and against Racial Discrimination - said that international human rights law, conceived as a dynamic tool, must take these new realities of extraterritorial jurisdiction into account. The Rapporteur indicated that the principle of extraterritorial jurisdiction was applied by states in the region, more particularly by the United States and Canada, in other spheres, such as tax law and in categories of criminal law. Also, the IACHR, considering the evolving principles of international law and the work of other human rights monitoring bodies, has established other fundamental principles with regard to extraterritorial jurisdiction. Therefore, it is jurisprudentially reasonable to understand that a State can be held responsible under international human rights law for conduct that it practices in another country when its omissions and initial actions cause human rights violations and the local Government where the conduct took place is unable to protect or implement the rights in question. It is notable, for example, that foreign investment in OAS Member States in these spheres occurs frequently in the investing state. The Commission was informed in hearings, for example, that Canadian Embassies are directly involved in pursuing these investments, which is called economic diplomacy, deepening the state connections necessary for a framework of accountability in foreign

countries. Likewise, large-scale investment has significant public legal dimensions, and is often a basis for obtaining state jurisdiction as quasi-public entities” (par. 79).

Based on that, the IACHR (2015) realized the need for a legal framework that adequately addresses the performance of foreign companies in the jurisdiction of States, given the prevalence that they have acquired in recent years in the region and the impact that are having on human rights. Finally, the IACHR (2015) identified as one of the main obstacles to the existence of an adequate legal framework that addresses the performance of foreign companies in the jurisdiction of the States, the fear that such regulations will promote an investment flight from the countries.

4.2. Legal framework applicable to indigenous peoples in Chile

a) Political Constitution

In fact, article 5 of the CPR recognizes respect for the essential rights that emanate from human nature as a limit to the exercise of sovereignty. Based on this, it imposes the duty of the Government to respect and promote such rights, guaranteed in the constitutional text, “[...] as well as by the international treaties ratified by Chile and which are in force”. Thus, article 5, item 2 of the CPR provides that the conventional international human rights law, validly incorporated into domestic law, through its ratification, as provided for in article 54 of the CPR, constitutes a binding legal body with preferential application in domestic law, which stands as a material limit that spreads to the entire legal system.

Thus, the human rights recognized in the international treaties ratified by Chile and which are in force in the domestic legal system, analyzed in the previous texts, complement the catalog of fundamental

rights of the CPR, integrating the constitutional statute as powers and public subjective rights of the people.

b. Law N. 19.253 of 1993 on Incentive, Protection and Development of Indigenous People

The main specific legislation on indigenous peoples in Chile is Law N. 19.253 on “Incentive, protection and development of indigenous people” of 1993, by virtue of which the Chilean State recognized indigenous peoples as “ethnicities”, pointing out “that Chilean indigenous people are the descendants of human groups that have existed in the national territory since pre-Columbian times, who retain their own ethnic and cultural manifestations, and the land is the main foundation of their existence and culture” (art. 1). Also, through this law, the Government of Chile is obliged to respect, protect and promote the development of indigenous people, their cultures, lands, families and communities.

Law N. 19.253 contains a series of complementary provisions that attempt to give protection and recognition to the rights of land and water of those peoples that had not been the object of recognition or legal regulation in the past. Thus, this legal body contains a special chapter for the case of indigenous peoples in the north of the country (Aymaras, Atacameños, Quechuas, Collas and Diaguitas), contained in Title VIII, Paragraph 2 (Articles 62 to 65).

c) Legal regime for mining concessions in Chile.

The mining concession regime in Chile follows the same privatist pattern as other laws regarding natural resources, such as water, but exacerbates the rights of the mine utility company to ensure the benefit of

mineral substances (Aylwin, et. Al., 2013)¹⁶⁸. In fact, the mining concession grants a preferential right to its owner, the nature and legal effects of which are established in Article 2 of the Mining Code, which is classified as a “real and immovable right different and independent from the domain of the superficial building”, “opposable to the Government and to any person”, “transferable and transmissible” and subject to any legal business.

In addition, the holder of a mining concession has the right to control it and is supported by the constitutional guarantee of the right to property (Article 19 N. 24 of the Political Constitution). While protected by the constitutional guarantee of property, the deprivation of any of the faculties that grants the mining concession, such as that of initiating or continuing the exploration, extraction and appropriation of the substances granted, constitutes a deprivation of the essential attributes or powers of its domain.

As for the phases of the exploration concession procedure, these include: request, decision request and decision. In turn, in the phases of the exploration concession procedure, it is necessary to identify: manifestation, measurement and decision.

As noted, the legal regime for mining concessions in Chile violates the right to equality and non-discrimination, by establishing a mechanism for granting mining concessions that guarantees a preferential property right, even when the lands are owned by indigenous commu-

¹⁶⁸ Complementing the mining legislation is the tax regime to which it is affected and which, according to experts in the matter, is characterized by being the one with the lowest tax burden in Latin America, at least until the approval of law 20,026 of 2005, which sets the mining royalty which is designed only for copper (Yáñez & Molina, 2008). In Chile, mining companies are subject to the tax regime established in Law 18,293 of 1984, which eliminated the income tax of companies, which pay their taxes through the complementary global that the partners or shareholders pay. In fact, the law says that the first-rate tax that the company pays corresponds to 17%, is returned to the owners as a credit to their personal taxes, which ultimately translates into the companies not being subject to income tax (Yáñez & Molina, 2008).

nities, ignoring their ancestral property rights over their territories and natural resources (Aylwin, et. al., 2013; Observatorio Ciudadano, 2016).

d) The implementation of indigenous rights in the context of the environmental impact assessment system

In addition to being regulated in the CPR, the right to live in a healthy environment, as well as the protection of the environment, the preservation of nature and the maintenance of the environmental heritage, are regulated and guaranteed through Law 19.300 of 1994, on General Bases of the Environment (LBGMA) and its subsequent amendments. Thus, it is intended to give this constitutional guarantee a concrete content and an adequate legal development, assuming the Government's duty to ensure that this guarantee is fulfilled, to create an administrative institutionality that allows the solution of existing environmental problems and prevent them and finally, to have a general legal body to which all sectoral environmental legislation can refer (BCN, 1994: 13-14). This legal body laid the foundations for the development of an environmental institutionality in Chile, establishing a series of environmental management instruments, among them the SEIA, environmental quality standards, resource management plans, decontamination plans, among others.

The LBMA was modified in 2010 by Law 20.417, which introduced profound changes in the environmental institutions in Chile, giving rise to the Ministry of the Environment (MMA), which is responsible for the design and implementation of public policy in environmental matters; the Environmental Assessment Service (SEA), which manages SEIA; and the Environment Superintendence (SMA), responsible for the inspection of environmental management instruments. In addition to that, the major environmental reform of 2010 encouraged the creation of Envi-

ronmental Courts, through Law 20.600 (LTA), and boosted the need for the Executive Branch to dictate a new Regulation for the functioning of SEIA, which materialized through the Supreme Decree N. 40, of October 30, 2012 of the MMA, which approved the SEIA Regulation.

SEIA consists of an environmental management instrument under the responsibility of SEA, which manages the environmental impact assessment procedure. Such procedure, based on an EIA or DIA, determines in advance if the environmental impact of an activity or project fits the current rules (art. 2J), LBGMA)¹⁶⁹. Thus, during the environmental assessment procedure, all the negative environmental effects that a given project or activity may undergo have to be analyzed, described and assessed in a comprehensive and prior manner (Bermúdez, 2014: 266).

The preventive nature and mandatory nature of SEIA is expressed in the punitive power of SMA to suppress the “execution of projects and the development of activities for which the law requires Resolution of Environmental Classification, without counting on it” (article 35 b) LOSMA). Also, SEIA establishes a “single window” system, by virtue of which all projects liable to cause an environmental impact must undergo an environmental assessment, with the participation of all sectoral bodies with environmental competences and where all authorizations or pronouncements of an environmental nature are granted, which according to the current legislation, must be issued by State agencies regarding projects or activities submitted to this system. Thus, the environmental impact assessment is a special, deliberative and complex administrative procedure, which begins at the request of the owner of the project or activity, and is mainly fed by the information presented

¹⁶⁹ Art. 2 of the LBGMA defines, among other things, what is meant by “Environmental Impact”, “Environment”, “Contamination-Free Environment” etc.

by them and the opinions of the technical bodies of the Administration government with environmental competencies.

Since the ratification of ILO Convention 169, the implementation of the rights of indigenous peoples in SEIA has been practically restricted to the right to prior consultation, leaving aside other rights and standards that States must implement during the environmental assessment of investment projects. In this context, the focus of debate has been on the interpretation of the right to consultation and the scope of its implementation, whether through its regulation by the Executive Branch or its judicial application, a debate that has gone through different stages.

Once ILO Convention 169 was ratified and before its entry into force, the Executive Branch dictated D.S. N. 124 of 2009, from the Ministry of Planning (DS N. 124/2009 MIDEPLAN), which implemented Article 34 of Law N. 19.253, establishing a general framework for the participation of indigenous communities that aimed at materializing in a restrictive way the rights of consultation and participation enshrined in Articles 6 and 7 of this Convention. Thus, by means of these Regulations, the Executive Branch interpreted fundamental concepts of the rights of consultation and participation enshrined in ILO Convention 169, as they “Administrative measures” (art. 14 inc. 3rd) and “susceptibility to direct affect” (art. 7). Also, this Regulation contained a definition of “Investment projects” (art. 5). Through these definitions, the government’s strategy was to exclude the obligation to implement indigenous consultation processes in the context of SEIA (Cordero Vega, 2013).

Nonetheless, this strategy was largely rejected, being even classified as an absurd and last-minute attempt to circumvent the rights of consultation and participation of indigenous peoples (Montt and Mat-

ta, 2011)¹⁷⁰. Also, the application by the Courts of ILO Convention 169 when hearing cases through the means of reparation, demonstrated the failure of the Executive Branch's strategy to try to evade the application of the SEIA's right of consultation. This, since the Courts quickly began to question the restrictive definitions of D.S. N. 124/2009 MIDEPLAN, as well as the approval of the popular participation process in general of SEIA to the standards of the right of consultation.

In fact, during that time, through the judicial interpretation of the consultation standards, the idea was consolidated that the *possibility of direct impact* on SEIA was identified with the cases of *significant impacts* provided for in Article 11 of the LBMA. In other words, with those effects, characteristics or circumstances that, if generated, make it mandatory that a given project be subjected to environmental assessment under the EIA modality and, consequently, all those projects assessed by means of a simple DIA (Donoso, 2014) are left out. Thus, through the judicial interpretation of the consultation standards, the country's Courts added a new requirement for the consultation to proceed in the context of investment projects in indigenous peoples' territories,

¹⁷⁰ Supreme Decree N. 124 of 2009 was challenged by national and international human rights bodies, as well as by academics, and was contested by indigenous organizations for failing to comply with international human rights standards. Thus, the National Institute of Human Rights (INDH - Instituto Nacional de Derechos Humanos), a public, autonomous, independent body, created by Law 20.405 with the objective of promoting and protecting the human rights of all people who inhabit Chile, in its Annual Report to the year 2010, highlighted, in relation to Supreme Decree 124 of the Ministry of Planning, that "[...] it has been questioned that, from a formal point of view, there was no prior and informed consultation process and that, basically, it does not respect the principles applicable to consultation and participation". The INDH Report also says that "[the] Supreme Decree 124 severely limits the measures and matters to be consulted, and the deadlines established are hardly sufficient in relation to the nature and scope of the matters put into consideration by the indigenous communities. The express exclusion of investment projects constitutes a serious omission, especially since the main tensions with indigenous communities are produced by the expansion of energy, mining, aquaculture and forestry megaprojects. These are subject to the popular consultation established in the sectorial regulation and it is optional for the sectoral organ that issues the measure to adopt the procedure contemplated in the Supreme Decree". (INDH, 2010).

regarding the dimension of the effect (Meza-Lopehandía, 2016; Guerra-Schleef, 2017a).

Thus, article 85 of Supreme Decree N. 40 of 2013 of the Ministry of the Environment, which approves the current SEIA Regulation, standardized this interpretation, adding, also, new assumptions for the Government's duty to carry out an indigenous process consultation during the environmental assessment procedure¹⁷¹. According to this provision, for the Environmental Authority's duty to develop a consultation process to arise, first, the project or activity must generate or present any of the effects, characteristics or circumstances indicated by article 11 of the LBGMA (developed in the articles 5 to 10 of the SEIA Regulation), also requiring that such a project "directly affects one or more human groups belonging to indigenous peoples".

However, article 85 of the RSEIA establishes that groups of indigenous peoples will be able to participate in the consultation process, emphasizing that only "only indigenous peoples affected shall participate", which supposes a wide margin of administrative power, subjecting the possibility of exercising a human right at the discretion of the

171 The current SEIA Regulation was articulated with Supreme Decree N. 66 of the Ministry of Social Development which approved "the Regulation that rules on the procedure for indigenous consultation under Article 6 N. 1 Letter a) and N. 2 of Agreement N. 169 of the International Labor Organization" and revoked the aforementioned Supreme Decree N. 124, enacted on November 15, 2013. Supreme Decree N. 66 was published in March 2014 and the Government has applied it since then in a series of consultation processes aimed at indigenous peoples and communities. This, despite having been contested by indigenous organizations, civil society organizations and international organizations, given that it would also not comply with international standards on the matter. The challenges to this second Regulation are both the process through which it was adopted and its content. The main challenges to the content are due, among others, to the scope that the Government grants to the concept of "direct impact"; the limitation of the administrative measures to be consulted; the ways to determine the subject of the consultation; limiting the judicialization of the right to consultation; and the exclusion of investment projects, which would not be previously consulted, only once they enter the Environmental Impact Assessment Service, by means of a different regulation, which would not have been properly consulted among indigenous peoples (Observatorio Ciudadano, 2014).

environmental authority. Finally, article 85 of the RSEIA specifies the purpose of the indigenous consultation process, stating that “it must be carried out with the object of reaching an agreement or obtaining consent”, without prejudice that “not reaching such an objective does not imply an impact on the right to consultation”, in such a way that the standards and interpretations that have developed in international human rights law are put aside¹⁷².

5. The impacts of mining projects on Human Rights and the responsibility of players involved

3.1. Main impacts of mining projects on the human rights of the Colla de Pai-Ote Community

a) Territorial rights and those applied to natural ancestral resources

¹⁷² What is inadequate in the regulation of indigenous consultation in the current SEIA Regulation was recently observed by the IACHR in its report on the protection of human rights in the context of extraction, exploitation and development activities, warning that: “One of the central concerns regarding Supreme Decree 40, applicable to activities that require an environmental impact assessment, is that it seriously limits the origin of the indigenous consultation through the incorporation of an exhaustive list of exceptional cases in which this right may be required. The Commission notes that, according to article 85 of the aforementioned Decree, the consultation proceeds exclusively with respect to projects or activities that generate some of the characteristics set out in articles 7, 8 and 10 and “as far as one or more groups belonging to indigenous peoples are directly affected”. These provisions refer to the resettlement of human communities (article 7), significant changes in the life systems and customs of human groups (article 7), location in/or close to indigenous territories and the environmental value of the territory (article 8), and changes to cultural heritage (article 10). Such requirements differ from what is established in Article 6 of ILO Convention 169, which establishes the obligation to consult “whenever legislative or administrative measures are likely to affect them [indigenous peoples] directly”, regardless of the scope or impact from the project”. (IACHR, 2015, par. 173).

As highlighted by Observatorio Ciudadano (2016) in a recent study evaluating and analyzing the impact of two Canadian mining projects Pascua Lama and El Morro (currently Nueva Unión) in the territory of the Agricultural Community of Diaguitas Huasco Altinos, the legal regime for mining concessions in Chile violates the right to equality and non-discrimination, by establishing a mechanism for granting mining concessions that guarantees a preferential property right, even when the lands are owned by indigenous communities, ignoring their rights to ancestral property over their territories and natural resources.

In fact, as previously stated, the territory of ancestral occupation and use of the Colla de Pai-Ote Community - which includes the so-called “Maricunga Golden Belt” or “Maricunga Belt” - is under strong pressure due to the installation mega mining projects. These projects affect summer and winter areas used by the community, which include important sectors for the development of transhumance and the Colla worldview, such as marshes and lagoons in the Andean highlands.

In this scenario, mining projects compete for water resources available in the area, which, after all, are of ancestral use to the community. As stated by Ercilia Araya, leader of the Colla de Pai-Ote Community:

“In the summer, we go to the high mountain range where we find floodplains, swamps and the firmer forage that goats eat, as well as straw, sticks and other herbs, but it is very difficult for us because we have to climb to 4,500 or 5,000 meters, and this is where the mining projects that affect the zone in the summer are and Kinross affects the zone of the winter; but they don’t realize that we are transhumants; for example, 6-7 months, a year or two have gone by the we haven’t been to that sector because the pasture is not good, and then we go to another sector and that’s what bothers them” (Ercilia Araya, interview, September 15, 2017).

The threats to the Colla de Pai-Ote Community in relation to water are not only due to the fact that mining companies and people have rights to access water for the community's ancestral use, but also that projects have led to droughts where water used to be abundant, affecting natural water sources. In this sense, Segundo Araya Bordonos:

“In the places where the large mines extracted [water] there were very good floodplains, large ponds, a lot of water, small swamps ... and now, recently, large companies have dried up the floodplains, there is nothing left ... Just dirt, everything dry ... Some small floodplains, that's all. There were floodplains like that, very large ... For grazing ... the animals gained weight. I walked my whole life in the mountain range ... I know what I'm talking about ... I know everything, I walked everywhere. So, tell me: How can we be happy with large companies? And we barely have any help. Up there, the water, the fountains are being taken from us” (Segundo Araya Bordonos, interview, September 16, 2017).

Don Segundo's statements were verified on the spot, during the field-work developed during the research. As we can see in the next image.

Várzea de San Andrés, partially dry as a result of mining activity. In the background, it is possible to see some of the many high voltage towers that cross this ravine, towards the La Coipa mine.



Also, the energy requirements of mining projects make it necessary to build electrical networks that, due to the lowland conditions of the high Andean floodplains, in general, end up crossing it. This represents a significant impact on these ancestral ecosystems of the Colla de Pai-Ote Community, which are used in their transhumance activities. Also, as it was possible to observe at the site, these facilities in several cases pass over the settlements of the Colla de Pai-Ote community, without damage reducing measures being adopted or their location being considered in other areas that do not directly affect the community.

One of the high voltage towers located on a rancho (temporary settlement) of a member of the Colla de Pai-Ote Community.



The negative impact of mining projects on the ancestral habitat of the Colla de Pai-Ote community is added to the fact that until this date, the Government of Chile has not demarcated or documented in titles the ancestral and occupied land of that community; a situation that deprives their rights to land use and possession, as well as the development of their traditional activities.

The analyzed mining projects generated serious impacts on the territory and the environment, placing the Colla de Pai-Ote Community's life and customs system and its members at serious risk. The Colla livestock economy, which is the how the Colla de Pai-Ote community makes a living, is at risk due to the potential contamination of the waters, the loss of territory and the difficulties of access to the summer regions due to road closures, making it unviable to access natural pastures to feed livestock.

From what has been exposed so far, it can be concluded that, in this case, the property rights that indigenous peoples have over their territories, lands and natural resources have been violated. The Government and the companies involved have closed their eyes to the fact that the Colla de Pai-Ote Community, as well as the other Colla communities that occupy or make use of this territory, as all indigenous people have the right to an irreplaceable relationship with their territory, which constitutes the fundamental basis of its system of life and customs and which gives them their own ethnic identity.

b) Right of prior consultation and prior, free and informed consent

Another right that appears violated is the right to prior consultation. Thus, Ercilia, President of the Colla de Pai-Ote Community, stated: “In the case of Coipa phase 7 [...] there was no consultation. They [Kinross] should have done a study [EIA] and consultation” (Ercilia Araya, interview, September 15, 2017).

In fact, as stated before, the regulation that was imposed regarding this right in the context of SEIA, only considers the implementation of consultation processes for the case of initiatives assessed through the modality of an EIA, and not for those cases of projects assessed through a DIA. This was the case with the exploration and extraction projects associated with the La Coipa mine (Kinross), the alteration of the Refugio (Kinross) mining project, the Cerro Maricunga mine exploration project (Atacama Pacific Gold Corporation), the expansion project Caspiche Central (Goldcorp), all submitted to environmental assessment through DIA, after the ratification of ILO Convention 169, without considering

the impacts on the Colla communities and without implementing prior consultation processes.

Also, the same administrative regulation of the right of consultation in the context of SEIA allows that, even when a project is assessed through an EIA, it is not necessary to implement a consultation process if the Environmental Authority considers that the project does not “directly affect” an indigenous community, or that the indigenous consultation process is limited to only a few communities, generating unequal and discriminatory treatments and imposing additional requirements on this right through its regulatory development.

This allowed the Government of Chile to omit the implementation of indigenous consultation processes in a series of exploration projects or modifications to existing facilities, which violates the prior nature of the consultation and the obligation to carry out this process from the first stages of elaboration or planning of the proposed measure, and throughout the life of a project. This was the case with the Cerro Casale optimization project (Barrick Gold and Goldcorp), which, although it was assessed in the form of an EIA, did not have the implementation of an indigenous consultation process according to the standards of ILO Convention 169, since the dialogue processes were developed directly by the main companies interested in the development of a given project. These companies did not include all the communities that could be impacted, as was the case of the Colla de Pai-Ote Community.

In addition, in those cases in which consultation took place, it was limited to the determination of financial compensation, losing sight of the main purpose of this process as an instance of intercultural dialogue that, in the context of SEIA, allows - first of all - to make visible the impacts that certain project may have on the rights of indigenous peoples.

Failure to carry out or limit prior, free and informed consultation makes it impossible for Colla communities to exercise self-determination, by depriving them of the possibility of exposing to the Environmental Authority the way in which these projects impact their ways of life and customs and their development priorities. It should be noted, as previously exposed, that most of the projects analyzed correspond to megaprojects. However, until now, a standard of prior, free and informed consent, in accordance with international standards, required by the Inter-American Court under the American Convention on Human Rights has not been guaranteed.

c) Right to carry out socio-environmental impact studies.

The shortcomings and lack of a human rights focus during the environmental assessment of mining projects is another issue raised by the members of the Colla de Pai-Ote Community interviewed. In this sense, Ercilia Araya states that “what happens with these companies is that they arrive in the territory in exploitation or to work, but without respect for the communities” (Ercilia Araya, interview, September 15, 2017), realizing that when socio-environmental impact studies were carried out, their traditions and culture were not taken into consideration. As seen when analyzing investment projects, both SEIA and the Environmental Authority responsible for their administration, had serious shortcomings when considering the impacts of projects on indigenous communities, which is attributed to the high level of administrative autonomy the Authority has when considering the absence of impacts on the Colla communities, and deciding whether to approve or reject a given project¹⁷³.

In several projects analyzed, the Government Administration bodies that should check if the basic information presented by the holders

responded to the impacts of the projects on the Colla communities, did not protect these communities or simply left the evaluation process. This generated great distrust by the communities in relation to these authorities, as is the case of CONADI: “CONADI ignored the existence of Colla communities” (Ercilia Araya, interview, 15 September 2017).

3.2. Responsibility of the players involved

a) Responsibility of the Government of Chile

Following the aforementioned United Nations GP, it appears that the Government of Chile bears a central responsibility in the violation of the rights of the Colla de Pai-Ote Community, as well as in relation to the other Colla communities that make use of the territory today impacted by the mining projects analyzed. This was widely stated by *Doña Ercilia*, member and President of the Colla de Pai-Ote Community. “For me, the main responsible is the [Chilean] State”.

In fact, the Government of Chile has failed to fulfill its obligation to protect this community from human rights violations committed by third parties, in this case by companies, by granting them the mining concessions on land with resources of ancestral use that gave rise to these mining projects, without considering the impact on the rights of these communities and others that occupy and make use of the property. Also, the Government of Chile has failed to fulfill its obligation to protect the Colla de Pai-Ote Community and its members by granting environmental licenses for the analyzed mining projects, without assessing the socio-environmental impact of these initiatives and violating their rights to prior, free and informed consultation and consent.

Likewise, the Chilean State has failed to enforce domestic laws, such as Law 19.253, and international laws, such as ILO Convention 169 rati-

fied by Chile, with the aim of ensuring respect for the rights of the Colla communities and their members in relation to these mining projects. The Chilean State has also failed to comply with its domestic legal system and sectoral laws relating to natural resources and SEIA to international standards on the human rights of indigenous peoples. This, despite the different international instances, including treaty bodies of the United Nations System, Special Rapporteurs of the same entity and the ILO, who recommended to the Chilean State since the entry into force of Convention 169, on different occasions, the adaptation of its regulations in the matter to international standards.

b) Responsibility of the Government of Canada

It is a fact that in recent years, Canada has become a gravitational player in the extractive industry, especially in mining¹⁷⁴, which gave rise to a large number of conflicts as a result of resistance to the affected communities. The absence of a regulatory framework in the Canadian State to address the impacts caused to human rights committed outside its borders by companies domiciled in that country, including the rights of indigenous peoples, raised the concern of international human rights bodies,

¹⁷⁴ A study by the Working Group on Mining and Human Rights in Latin America on the impact of Canadian mining in Latin America and Canada's accountability shows that for 2012, 57% of mining companies globally were registered in the Toronto Stock Exchange. Approximately half of the companies registered there were developing investment projects outside Canada. Of the 4,322 projects carried out by these companies outside Canada, 1,526 were in Latin America. In 2013, the Latin American countries where Canadian companies had the most assets were Mexico (US\$ 20 billion) and Chile (US\$ 19 billion) (Working Group on Mining and Rights in Latin America, 2013).

especially CERD¹⁷⁵, the Human Rights Committee¹⁷⁶, Committee on Economic, Social and Cultural Rights¹⁷⁷ and the IACHR (2015, par. 80).

In addition, the lack of effective administrative mechanisms for receiving and processing complaints for human rights violations committed by Canadian companies outside Canada, has meant that in recent years those affected by these types of situations have filed claims directly in Canadian courts¹⁷⁸. However, to date, in none of these cases have foreign plaintiffs been successful, and their claims have, in general, been rejected for reasons of jurisdiction or because the parent company and its subsidiaries are considered to be separate entities, thus avoiding the establishment of legal responsibility to the parent company for the activities of its subsidiaries (Observatorio Ciudadano, 2016).

175 In 2007, CERD expressed its concern on this issue, and requested Canada to take measures to prevent the negative impact on indigenous rights outside the country by transnational companies domiciled in that country, recommending in particular to study ways to make effective the responsibility for such impacts (CERD, 2012). In addition, CERD made a note in 2012 to the Government of Canada: “Although we notes that the Member State has approved a Corporate Responsibility Strategy, the Committee is concerned that the Member State has not yet adopted measures regarding transnational companies with a social domicile in Canada, and whose activities, especially mining, negatively impact rights of indigenous peoples outside Canada (art. 5)./ The Committee recommends that the Member State adopts the appropriate legislative measures to prevent transnational companies with a social domicile in Canada from carrying out activities that negatively affect the exercise of the rights of indigenous peoples outside Canada, and to demand accountability from these companies”(CERD, 2012, par. 14).

176 In 2015, the Human Rights Committee recommended Canada “to develop a legal framework that offers legal resources to people who have been victims of the activities of these companies operating abroad” (Human Rights Committee, 2015, par. 6).

177 In March 2016, the CESCR Committee recommended that Canada: “Introduced effective mechanisms to investigate complaints filed against these companies [registered or domiciled in their jurisdiction] and adopted the necessary legislative measures to facilitate access to justice before the national courts of the victims of the these companies’ actions” (CESCR Committee, 2016).

178 Above ground, Claims against extractive companies in Canada: Advances in transnational civil litigation, 1997-2016. Available at: <http://www.aboveground.ngo/recent-works/demandas-contra-empresas-extractivas-presentadas-en-canada-avances-en-el-litigio-civil-transnacional-1997-2016/>

In summary, and in general, it is possible to conclude that the Government of Canada has contributed to the violation of the human rights of indigenous and local communities in conflicts that are the result of the installation of extractive projects in their territories, both in Chile and in the rest of the Area, given its role in promoting extractive investments outside its borders, carried out by companies domiciled in Canada; and the refusal to accept the recommendations of international human rights organizations, which has repeatedly asked its government to take measures to assume its extraterritorial obligations with companies domiciled in Canada that operate outside that country, measures that will prevent, repair and punish such violations.

c) Responsibility of the companies that own the mining projects chilean territory.

The companies analyzed, involved in the projects, did not comply in this case with their obligation to respect the internationally recognized human rights of indigenous peoples. In fact, as has been stated, the companies that own the mining projects, far from refraining from infringing the collective rights of the Colla communities impacted by these initiatives and from preventing their activities from violating their rights, have not had the due diligence required for its activity.

This is the case of the Refugio Mining Project, whose owner until now is the company Kinross, who until this date has not made any repairs in favor of the Colla communities affected by the drought caused in at least 70 hectares of swamps in the Laguna del Negro Francisco Lagoon Complex and Laguna Santa Rosa (located within the Nevado de Tres Cruces National Park, which was declared a Ramsar reserve in 1996), which is part of the ancestral territory of several Colla communities, among them the Colla de Pai-Ote.

Likewise, during the environmental study of this project, as well as others previously analyzed (Cerro Casale, La Coipa, Quebrada Seca, Cerro Maricunga and Caspiche), developed and promoted directly by the companies, they also did not have human rights criteria applied and were not dedicated to preventing the possible negative impacts of the activities projected on the environment and the economic, social and cultural life of the Colla communities. Proof of this is the case of the Refugio Mining Project, whose impacts became evident during the project's operation

At the same time, as demonstrated when analyzing the case of the Cerro Casale Project - currently owned by Barrick Gold (50%) and Goldcorp (50%) through Compañía Minera Cerro Casale (a Chilean company) - the incumbent company was directly involved in violations of the Colla de Pai-Ote Community's right to consultation, by replacing the Government as the party responsible for this process and undertaking direct dialogue processes with the Colla de Río Jorquera Community and its Affluents, making them pass as prior consultation processes, in accordance with ILO Convention 169 standards.

Also, the same company, far from sharing with the Colla de Pai-Ote Community the profits obtained by the Cerro Casale Project, used these resources as a way of destabilizing the Colla people's organizations and weakening the unity of their social network; this extended to other institutions responsible for local administration, such as municipal administrations, affecting intercultural relations in the territory. It is worth remembering, as stated by former Special Rapporteur on indigenous rights James Anaya (2010) profit sharing is a consequence of limitations or deprivations of the right to indigenous property over land and its resources. Therefore, in addition to being a fair and equitable participation, it must be understood as a way of fulfilling a right and not as a char-

ity grant that seeks social support for the project or reduces conflicts, as it happened in this case.

Finally, it is worth noting that, in contradiction with the GP of companies and human rights, none of the companies analyzed had effective complaint mechanisms for the adverse impacts of their investments in human rights.

References

Anaya, J. 2013. *Study on Extractive industries and indigenous peoples. Report to the Human Rights Council*, A/HRC/24/41. Available at: <http://unsr.jamesanaya.org/annual-reports/report-to-the-human-rights-council-a-hrc-24-41-2013>

_____. 2012. *Comentarios del Relator Especial sobre los derechos de los pueblos indígenas en relación con el documento titulado: “Propuesta de gobierno para nueva normativa de consulta y participación indígena de conformidad a los artículos 6° y 7° del Convenio N° 169 de la Organización Internacional del Trabajo”, Chile*. November 2012. Available at: <http://unsr.jamesanaya.org/special-reports/comentarios-a-la-propuesta-del-normativa-de-consulta-chile>

_____. 2010. *Summary of activities, corporate responsibility with respect to indigenous peoples. Report to the Human Rights Council*, A/HRC/15/37. Available at: <http://unsr.jamesanaya.org/annual-reports/report-to-the-human-rights-council-a-hrc-15-37-19-july-2010>

_____. (2009). *Principios Internacionales Aplicables a la Consulta en relación con la reforma constitucional en materia de derechos de los Pueblos Indígenas en Chile. Informe temático a Chile, de James Anaya, Relator*

Especial de Naciones Unidas sobre la Situación de los Derechos y Libertades Fundamentales de los Indígenas. Available at: <http://www.politicaspUBLICAS.net/panel/re/docs/393-ppios-consulta.html>

Atacama Pacific Gold Corporation. s/f. *Sitio web oficial de Atacama Pacific*. Available at: <http://www.atacamapacific.com> (Consultado em 13 de novembro de 2017).

Aylwin, J. (Coord.), Meza-Lopehandía, M. Y Yáñez, N. 2013. *Los pueblos indígenas y el derecho*. Santiago de Chile: LOM Ediciones.

Bahamonde, M. 1978. *Diccionario de voces del norte de Chile*. Santiago de Chile: Editorial Nascimento.

Barrick Gold Corporation. 2011. *Municipio de Tierra Amarilla y Cerro Casale firman importante convenio para mejorar infraestructura de la comuna*. Available at: <https://barricklatam.com/municipio-de-tierra-amarilla-y-cerro-casale-firman-importante-convenio-para-mejorar-infraestructura-de-la-comuna/barrick/2012-06-11/180316.html>

Barrick Gold Corporation. s/f. *Sitio web oficial de Barrick Gold Corporation*. Available at: <https://barricklatam.com> (Consultado em 13 de novembro de 2017).

Bermúdez, J. 2014. *Fundamentos de Derecho Ambiental*, 2a Edición. Valparaíso: Ediciones Universitarias de Valparaíso, Pontificia Universidad Católica de Valparaíso.

Bertelsen, R. 1996. “Rango jurídico de los tratados internacionales”. *Revista Chilena de Derecho*, 23 (2-3), Tomo I, 211-222.

Biblioteca del Congreso Nacional (BCN). 1994. *Historia de la Ley No 19.300 de Bases del Medio Ambiente*

Comisión de Expertos en Aplicación de Convenios y Recomendaciones de la OIT (CEACR). 2010. Observación 2010/81. Pueblos Indígenas y tribales. Available at: http://www.ilo.org/wcmsp5/groups/public/---ed_norm/---normes/documents/meetingdocument/wcms_305844.pdf

_____. 2009a. *Observación General – Adopción: 2008, Publicación: 98a reunión CIT* (2009). Available at: http://www.ilo.org/dyn/normlex/es/f?p=NORMLEXPUB:13100:0::NO::P13100_COMMENT_ID,P11110_COUNTRY_ID,P11110_COUNTRY_NAME,P11110_COMMENT_YEAR:3066698,,,2008.

_____. 2009b. *Observation adopted 2008, published 98th ILC session. Indigenous and Tribal Peoples Convention, 1989 (Nº 169)*. Mexico. Available at: http://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:13100:0::NO::P13100_COMMENT_ID,P13100_LANG_CODE:2296526,es

Comisión de Evaluación Ambiental (COEVA) de Atacama. 2016a. *Resolución Exenta No 173, 14 de septiembre de 2016, que califica Ambientalmente el proyecto “Explotación de Minerales La Coipa Fase7”*. Available at: <http://infirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=f6/32/e1edf90a9a95e1b823ddb7d70acc7aa8587a>

_____. 2016b. *Resolución Exenta No 54, 30 de marzo de 2016, que califica ambientalmente el proyecto “Prospecciones Geológicas Mantos de Oro Fase 2”*. Available at: <http://infirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=f4/40/60bb6e8e8aecba6995abef0c1617f98b1976>

_____. 2013. *Resolución Exenta No 004, 3 de Enero de 2013, Califica Ambientalmente favorable el Estudio de Impacto Ambiental del proyecto*

“Optimización Proyecto Minero Cerro Casale”. Available at: http://seia.sea.gob.cl/archivos/RCA_CASALE_enero_2013.pdf

_____. 2012. *Resolución Exenta No 57, de 7 de marzo de 2012, que califica ambientalmente favorable el Proyecto “Prospecciones Geológicas Mantos de Oro”*. Available at: http://seia.sea.gob.cl/archivos/RCA_57.pdf

_____. 2011a. *Resolución Exenta No 45, de 28 de Febrero de 2011, Califica Ambientalmente el proyecto “Modificación Proyecto Minero Refugio Racionalización de la Operación Mina Planta”*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=1a/71/6b1b100cbbb3d000c3cbc212ea34daab2d1e>

_____. 2011b. *Resolución Exenta No 232, 3 de Noviembre de 2011, Califica Ambientalmente el proyecto “Prospecciones Mineras Cerro Maricunga”*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=bf/42/fb89b3c1f9dfb8da2f541ab3c9fe93890672>

Comisión Interamericana de Derechos Humanos. 2015. *Pueblos indígenas, comunidades afrodescendientes y recursos naturales: protección de derechos humanos en el contexto de actividades de extracción, explotación y desarrollo*. OEA/Ser.L/V/II. Doc. 47/15. Available at: <http://www.oas.org/es/cidh/informes/pdfs/IndustriasExtractivas2016.pdf>

_____. 2009. *Derechos de los pueblos indígenas y tribales sobre sus tierras ancestrales y recursos naturales: Normas y jurisprudencia del sistema interamericano de derechos humanos (OEA documentos oficiales)*. OEA/Ser.L/V/II. Doc. 56/09. Available at: <http://www.oas.org/es/cidh/indigenas/docs/pdf/tierras-ancestrales.esp.pdf>

Comisión Regional del Medio Ambiente (COREMA) de Atacama. 2009. *Resolución Exenta No 057, 6 de Marzo de 2009, Califica Ambientalmente el*

proyecto “Ampliación Caspiche Central”. Available at: [http:// infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=a8/d0/ff096be0b38968d20ace29ebb2a5a696d43d](http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=a8/d0/ff096be0b38968d20ace29ebb2a5a696d43d)

_____. 2007a. *Informe Consolidado No 1 de Solicitud de Aclaraciones, Rectificaciones y/o Ampliaciones a la Declaración de Impacto Ambiental del Proyecto “Exploraciones Caspiche Central”*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=a5/8a/ofb6de8898d2364d5163c2e121d95c4ba50b>

_____. 2007b. *Resolución Exenta No 264, 6 de Marzo de 2009, Califica Ambientalmente el proyecto “Ampliación Caspiche Central”*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=fa/c2/4a1bob40c77ba71852d6ac6327cd52496be0>

_____. 2002. *Resolución Exenta No 14, 31 de enero de 2002, que califica favorablemente el Estudio de Impacto Ambiental del Proyecto “Proyecto Minero Aldebarán”*. Available at: http://seia.sea.gob.cl/archivos/EIA/2013071501/EIA_3725_DOC_8359522.pdf

_____. 2001. *Informe Consolidado de solicitudes de aclaraciones, rectificaciones y/o ampliaciones al proyecto “Aldebarán”*. Available at: http://seia.sea.gob.cl/archivos/EIA/2013071501/EIA_3725_DOC_8359495.pdf

_____. 1999. *Resolución Exenta No 9, de fecha 22 de febrero de 1999, que califica ambientalmente favorable la declaración de impacto ambiental del proyecto “Actividades de Prospección Minera en Bloque Quebrada Seca”*. Available at: http://seia.sea.gob.cl/archivos/DIA/2014102901/DIA_355_DOC_2129929799.pdf

_____. 1994. *Resolución Exenta No 02, 14 de diciembre de 1994, que califica favorablemente el “Estudio de Impacto Ambiental Proyecto Refugio”*.

Available at: http://seia.sea.gob.cl/archivos/EIA/2013053003/EIA_935_DOC_8229913.pdf

Comisión de Verdad Histórica y Nuevo Trato. 2008. *Informe de la Comisión de Verdad Histórica y Nuevo Trato con los Pueblos Indígenas*. Santiago de Chile: Comisionado Presidencial para Asuntos Indígenas.

Comité de Derechos Económicos, Sociales y Culturales (Comité DESC). 2016. *Observaciones finales sobre el sexto informe periódico del Canadá*. E/C.12/CAN/CO/6. Available at: http://tbinternet.ohchr.org/_layouts/treatybodyexternal/Download.aspx?symbolno=E/C.12/CAN/CO/6&Lang=En

_____. 2013a. *Examen de Austria*. E/C.12/AUT/CO/4. _____. 2013b. *Observaciones finales sobre el quinto informe periódico de Noruega*. E/C.12/NOR/CO/5.

Comité de Derechos del Niño. 2013. *Observación General No 16. Sobre las obligaciones del Estado en relación con el impacto*.

Comité de Derechos Humanos. 2015. *Observaciones finales sobre el sexto informe periódico de Canadá*. CCPR/C/CAN/C=6. Available at: <http://ihrp.law.utoronto.ca/un-human-rights-committees-2015-review-canada>

_____. 2012. *Concluding observations on the sixth periodic report of Germany, adopted by the Committee at its 106th session, 15 October to 2 November*. ICCPR/C/DEU/CO/6.

_____. 2004. *Observación General No 31. La índole de la obligación jurídica general impuesta a los Estados Partes en el Pacto*. Doc. CCPR/C/21/Rev.1/Add.13. 800 período de sesiones, 26 de mayo de 2004.

Comité para la Eliminación de la Discriminación Racial de Naciones Unidas (CERD). 2013. *Consideration of reports submitted by States parties under article 9 of the Convention. Concluding observations of the Committee on the Elimination of Racial Discrimination: United Kingdom of Great Britain and Northern Ireland. Eighty-second session. CERD/C/GBR/CO/18-20/Add.1.*

_____. 2012. *Concluding observations of the Committee on the Elimination of racial Discrimination, Canada. CERD/C/CAN/CO/19- 20.* Available at: <http://www2.ohchr.org/english/bodies/cerd/docs/CERD.C.CAN.CO.19-20.pdf>

_____. 2003. *Consideraciones de los Informes presentados por los Estados Partes conforme al artículo 9 de la Convención. Observaciones Finales respecto del Ecuador. Sesión sesenta y dos. CERD/C/62/CO/2.*

Compañía Minera Casale. 2012a. *Adenda No 1 en respuesta a la Solicitud de Aclaraciones, Rectificaciones o Ampliaciones a la Adenda del Proyecto “OPTIMIZACIÓN PROYECTO MINERO CERRO CASALE”.* Available at: <http://seia.sea.gob.cl/documentos/documento.php?idDocumento=6509782>

Compañía Minera Casale. 2012b. *Adenda No 4 en respuesta a la Solicitud de Aclaraciones, Rectificaciones o Ampliaciones a la Adenda del Proyecto “OPTIMIZACIÓN PROYECTO MINERO CERRO CASALE”.* Available at: <http://seia.sea.gob.cl/documentos/documento.php?idDocumento=7617063>

Comunidad Colla de Pai-Ote. 2016. *Voces trashumantes. La última travesía Colla del Atacama.* Copiapó-Valparaíso: Maceteros Producciones.

Consejo de Administración OIT. 2009. *Informe del Comité encargado de examinar la reclamación en la que se alega el incumplimiento por Brasil del*

Convenio sobre pueblos indígenas y tribales, 1989 (núm. 169), presentada en virtud del artículo 24 de la Constitución de la OIT por el Sindicato de Ingenieros del Distrito Federal (SENGE/DF). Ginebra.

Consejo de Derechos Humanos. 2011. *Informe del Representante Especial del Secretario General para la cuestión de los derechos humanos y las empresas transnacionales y otras empresas, John Ruggie. Principios Rectores sobre las empresas y los derechos humanos: puesta en práctica del marco de las Naciones Unidas para “proteger, respetar y remediar”. A/HRC/17/31. 170 período de sesiones.*

Consortio ETO. 2013. *Principios de Maastricht sobre las Obligaciones Extraterritoriales de los Estados en el Área DE los Derechos Económicos, Sociales y Culturales.* Heidelberg. Available at: <https://www.fidh.org/IMG/pdf/maastricht-eto-principles-es-web.pdf>

Cordero Vega, L. 2013. “Derecho administrativo y Convenio 169. La procedimentalización de los conflictos a consecuencia de soluciones incompletas”, en *Derecho y Pueblo Mapuche. Aportes para la discusión.* Santiago de Chile: Centro de Derechos Humanos de la Universidad Diego Portales.

Dirección Ejecutiva del Servicio de Evaluación Ambiental (SEA). 2015. *Resolución Exenta No 532, de fecha 8 de mayo de 2015, que llevó a efectos el Acuerdo No 1, de fecha 19 de enero de 2015, del Comité de Ministros.*

Dirección Nacional de la CONADI. 2016. *Oficio ordinario No 522, de 12 de julio de 2016.* Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=2130621114

_____. 2015. *Oficio ordinário No 675, de fecha 10 de agosto de 2015*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=2130621114

_____. 2012. *Oficio ordinário No 629/2012, de 17 de dezembro de 2012*. Available at: http://seia.sea.gob.cl/archivos/CONADI_AD_4_CASALE.pdf

Donoso R., S. 2014. *Declaraciones de impacto ambiental y consulta indígena en el SEIA: Comentario a la tendencia de homologación de impactos ambientales que exigen un EIA y a susceptibilidad de afectación directa del Convenio 169 OIT. Anuario de doctrina y jurisprudencia. Sentencias destacadas 2013. Una mirada desde la perspectiva de las políticas públicas*. Santiago de Chile: Ediciones LYD/Libertad y Desarrollo.

Gahona, A. 2000. "Informe antropológico". En, INAS. *Acciones de apoyo para el traspaso de predios fiscales a favor de comunidades, asociaciones familiares y otras organizaciones indígenas de la Tercera Región*. Iquique: Corporación Nacional de Desarrollo Indígena.

Goldcorp. 2017a. *Goldcorp and Barrick to consolidate Cerro Casale and Caspiche gold projects in a 50/50 joint venture*. Available at: <https://www.goldcorp.com/investors/news-releases/news-release-details/2017/Goldcorp-and-Barrick-to-consolidate-Cerro-Casale-and-Caspiche-gold-projects-in-a-5050-joint-venture/default.aspx>

Goldcorp. 2017b. *Goldcorp Reports Positive Progress on Project Pipeline*. Available at: <https://www.goldcorp.com/investors/news-releases/news-release-details/2017/Goldcorp-Reports-Positive-Progress-on-Project-Pipeline/default.aspx>

Grupo de Trabajo sobre la cuestión de los Derechos Humanos y las Empresas Transnacionales y Otras Empresas (gT). 2013. *Los derechos*

humanos y las empresas transnacionales, Naciones Unidas, Asamblea general. A/68/270.

Grupo de Trabajo sobre Minería y Derechos Humanos en América latina. 2013. *El impacto de la minería canadiense en América latina y la responsabilidad de Canadá. Resumen Ejecutivo del Informe Presentado a la Comisión Interamericana de Derechos Humanos.* Available at: http://www.dplf.org/sites/default/files/informe_canada_resumen_ejecutivo.pdf

Guerra-Schleef, F. 2017a. “Los Tribunales Ambientales en la implementación de los derechos indígenas durante la evaluación ambiental de proyectos de inversión en Chile”. *Revista Justicia Ambiental*, 9.

Guerra-Schleef, F. 2017b. *El rol de los pueblos indígenas y comunidades locales en la protección de la biodiversidad.* (Informe preparado para el Instituto Nacional de Derechos Humanos, para ser utilizado como insumo para el Informe Anual 2017, sobre la situación de los Derechos Humanos en Chile).

Gundermann K., Hans, Vergara del S., Jorge Iván, & Foerster G., Rolf. 2005. “Contar a los indígenas en Chile: Autoadscripción étnica en la experiencia censal de 1992 y 2002”. *Estudios atacameños*, (30), 91-113. Available at: <https://dx.doi.org/10.4067/S0718-10432005000200006>

Instituto Nacional de Derechos Humanos (INDH). 2015. *Mapa de Conflictos Socioambientales.* Available at: <http://mapaconflictos.indh.cl>

_____. 2010. *Informe Anual 2010: Situación de los Derechos Humanos en Chile.* Available at: http://www.indh.cl/wp-content/uploads/2010/12/Informe_Final_Corregido1.pdf

Instituto Nacional de Estadísticas (INE). 2005. *Estadísticas sociales de los pueblos indígenas en Chile – Censo 2002*. Available at: <http://www.ine.cl/estadisticas/sociales/etnias>

Kinross Gold Corporation. s/f. *Sitio web oficial de Kinross en Chile*. Available at: <http://www.kinrosschile.cl> (Consultado el 13 de noviembre de 2017).

Lira Ovalle, S. 1998. *Curso de derecho de minería*. Santiago de Chile: Editorial Jurídica de Chile (3a edición).

McGahey, D., Davies, J., Hagelberg, N., and Ouedraogo, R. 2014. *Pastoralism and the Green Economy – a natural nexus? Nairobi: UICN y PNUMA*. Available at: <https://portals.iucn.org/library/sites/library/files/documents/2014-034.pdf>

Meza-Lopehandía, M. 2016. “La jurisprudencia del multiculturalismo en Chile: La consulta previa indígena ante tribunales”. *Revista de Ciencias Sociales. Universidad de Valparaíso*, No 69.

Minería Chilena. 2011. *Potenciando el distrito de Maricunga*. Available at: <http://mch.cl/reportajes/potenciando-el-distrito-de-maricunga/>

Ministerio de Desarrollo Social. 2017. *Casen 2015. Pueblos indígenas. Síntesis de Resultados*. Available at: http://observatorio.ministeriodesarrollosocial.gob.cl/casen-multidimensional/casen/docs/CASEN_2015_Resultados_pueblos_indigenas.pdf

_____. 2013. *Casen 2013. Pueblos indígenas. Síntesis de Resultados*. Available at: http://observatorio.ministeriodesarrollosocial.gob.cl/documentos/Casen2013_Pueblos_Indigenas_13mar15_publicacion.pdf

Molina, R. 2013. Los Collas: “Identidad y relaciones interculturales en Atacama”. Em, Durston, J. (Coordinador Geral), *Pueblos originários*

y sociedad nacional en Chile: La interculturalidad en las prácticas sociales. Santiago de Chile: Programa de las Naciones Unidas para el Desarrollo (PNUD), pp. 99-113.

Montt, S y M. Matta. 2011. “Una revisión panorámica al Convenio 169 y su implementación en Chile”. *Revista de Estudios Públicos*, 121, Available at: https://www.cepchile.cl/cep/site/artic/20160304/asocfile/20160304095447/rev121_SMontt_MMatta.pdf.

Nash, C. 2012. *Derecho Internacional de los Derechos Humanos en Chile. Recepción y aplicación en el ámbito interno.* Santiago de Chile: Centro de Derechos Humanos Facultad de Derecho Universidad de Chile. Available at: <http://repositorio.uchile.cl/bitstream/handle/2250/142503/Derecho-internacional-de-los-derechos-humanos-en-Chile.pdf?sequence=1>

———. 2008. *La concepción de derechos fundamentales en Latinoamérica. Tendencias jurisprudenciales.* (Tesis de doctorado. Facultad de Derecho, Universidad de Chile. Santiago, Chile)

Nogueira, H. 2012. “La concepción de Constitución, el bloque de constitucionalidad de derechos fundamentales y el control de convencionalidad en la práctica jurisprudencial del tribunal constitucional y la Corte de Suprema de Justicia de Chile”. En Pfeffer, E. (Coord.). *Derechos Fundamentales. Libro Homenaje al profesor Francisco Cumplido Cereceda.* Santiago de Chile: Editorial Jurídica de Chile. 219-260.

———. 2004. “Una senda que merece ser transitada: la Sentencia Definitiva de Casación de la Quinta Sala de la Corte de Apelaciones de Santiago, Rol N° 11.821-2003, Caso Miguel Ángel Sandoval Rodríguez”. *Revista Ius et Praxis*, 9, (2), 235-236.

_____. 2003. “Los derechos esenciales o humanos contenidos en los tratados internacionales y su ubicación en el ordenamiento jurídico nacional: doctrina y jurisprudencia”. *Revista Ius et Praxis*, 9, (1), 403-466.

Observatorio Ciudadano. 2016. *Proyectos mineros canadienses en el territorio de la comunidad agrícola de los diaguitas huasco altinos en Chile. Evaluación de Impacto en Derechos Humanos*. Temuco: Observatorio Ciudadano.

_____. 2014. *El Derecho a la Consulta de los Pueblos Indígenas: Análisis del Derecho Nacional, Internacional y Comparado*. Informe 19 IWGIA, pp. 22-31.

Observatorio Social del Ministerio de Desarrollo Social. 2015. *Nueva Metodología de Medición de la Pobreza por Ingresos y Multidimensional*. Available at: http://observatorio.ministeriodesarrollosocial.gob.cl/documentos/Nueva_Metodologia_de_Medicion_de_Pobreza.pdf

Oficina Regional para América Latina y el Caribe OIT. 2007. *Convenio N° 169 sobre pueblos indígenas y tribales en países independientes*. 2a.ed. Peru Available at: http://www.oit.org.pe/WDMS/bib/publ/libros/convenio_169_07.pdf

Oficina Internacional del Trabajo (OIT). 2013. *Manual para los mandantes tripartitos de la OIT: Comprender el Convenio sobre pueblos indígenas y tribales, 1989 (núm. 169)*. Ginebra. Available at: http://www.ilo.org/wcmsp5/groups/public/@ed_norm/@normes/documents/publication/wcms_205230.pdf

Organización de las Naciones Unidas para la Alimentación y la Agricultura (FAO). 2016. *Improving governance of pastoral lands. Implementing the Voluntary Guidelines on the Responsible Governance of Tenure of Land, Fisheries and Forests in the Context of National Food Security*. Rome: FAO. Available at: <http://www.fao.org/3/a-i5771e.pdf>

Oxfam & FIDH. 2011. *Evaluaciones de impacto en los derechos humanos basadas en la comunidad: La guía Todo Derecho. MANUAL DE CAPACITACIÓN*. Available at: https://www.oxfamamerica.org/static/media/files/COBHRA_Manual_de_capacitacion_-_Espanol.pdf

Pfeffer, E. 2003. “Los Tratados Internacionales sobre Derechos Humanos y su ubicación en el orden normativo interno”. *Revista Ius et Praxis*, 9 (1), 467-484.

Red DESC. 2014. *Economía global, derechos globales. Guía para interpretar las obligaciones relacionadas con los derechos humanos en la economía global*. Available at: <https://www.escri-net.org/sites/default/files/Economia%20Global%20Derechos%20Globales.pdf>

Ribera, T. 2007. “Los tratados internacionales y su control a posteriori por el Tribunal Constitucional”. *Revista Estudios Constitucionales*, 5 (1), 89-118.

Ruiz Tagle, P. 2006. “Una visión democrática y liberal de los derechos fundamentales para la constitución chilena del bicentenario”. En Bordalí, A. (Ed.), *Justicia Constitucional y derechos fundamentales*. Santiago de Chile: Lexis Nexis. 69-128.

Secretaría del Convenio sobre la Diversidad Biológica. 2005. *Directrices Akwé: Kon. Directrices voluntarias para realizar evaluaciones de las repercusiones culturales, ambientales, y sociales de proyectos de desarrollo que hayan de realizarse en lugares sagrados o en tierras o aguas ocupadas o utilizadas tradicionalmente por las comunidades indígenas y locales, o que puedan afectar a esos lugares*. Montreal: Secretaría del Convenio sobre la Diversidad Biológica. Available at: <https://www.cbd.int/doc/publications/akwe-brochure-es.pdf>

Secretaría Regional Ministerial de Desarrollo Social de Atacama. 2011a. *Oficio Ordinario No 544/2011, de fecha 18 de agosto de 2011*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=8c/ec/12ac841e8d28f41a330d93dd734df53d7ec5>

_____. 2011b. *Oficio Ordinario No 724/2011, de fecha 20 de octubre de 2011*. Available at: http://seia.sea.gob.cl/archivos/8f5_CCF21102011_000000.pdf

Secretaría Regional Ministerial SECPLAC. 2007. *Oficio Ordinario No 758/2007, de fecha 21 de septiembre de 2007*. Available at: <http://seia.sea.gob.cl/documentos/documento.php?idDocumento=2396750>

Servicio de Evaluación Ambiental (SEA) de la Región de Atacama. 2016. *Informe Consolidado de la Evaluación Declaración de Impacto Ambiental del Proyecto “Explotación de Minerales La Coipa Fase 7”*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=34/af/8af9ee63eee70115626f6479ae55e7fa66a8>

_____. 2012. *Informe Consolidado de la Evaluación de Impacto Ambiental de la Declaración de Impacto Ambiental del Proyecto “Prospecciones Geológicas Mantos de Oro”*. Available at: <http://infofirma.sea.gob.cl/DocumentosSEA/MostrarDocumento?docId=f6/2c/b3885e56241359fc8606d1d3011b68c9554b>

Sociedad Contractual Minera Eton Chile. 2007a. *Declaración de Impacto Ambiental “Exploraciones Caspiche Central”*. Available at: <http://seia.sea.gob.cl/documentos/documento.php?idDocumento=2358562>

Sociedad Contractual Minera Eton Chile. 2007b. *Adenda No 1 en respuesta a la Solicitud de Aclaraciones, Rectificaciones o Ampliaciones a la Declaración de impacto Ambiental del Proyecto “Exploraciones Caspiche*

Central”. Available at: <http://seia.sea.gob.cl/documentos/documento.php?idDocumento=2430749>

Subdirección Norte de la CONADI de Atacama. 2016. *Oficio Ordinario No 144, de fecha 19 de febrero de 2016*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expedient

_____. 2015. *Oficio Ordinario No 983, de fecha 11 de diciembre de 2015*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=2130902043

_____. 2012a. *Oficio Ordinario No 015, de fecha 9 de enero de 2012*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=6373082

_____. 2012b. *Oficio ordinario No 059/2012, de fecha 16 de febrero de 2012*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=585475

_____. 2012c. *Oficio Ordinario No 066, de fecha 1 de marzo de 2012*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=6373082

_____. 2012d. *Oficio ordinario No 229/2012, de fecha 22 de junio de 2012*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=5854754

_____. 2011a. *Oficio ordinario No 238/2011, de fecha 7 de junio de 2011*. Available at: <http://seia.sea.gob.cl/archivos/23800.PDF>

_____. 2011b. *Oficio ordinario No 379/2011, de fecha 7 de octubre de 2011*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=5854754

_____. 2010a. *Oficio Ordinario No 08-224/2010, de fecha 6 de septiembre de 2010*. Available at: <http://seia.sea.gob.cl/documentos/documento.php?idDocumento=4892325>

_____. 2010b. *Oficio Ordinario No 08-299/2010*. Available at: http://seia.sea.gob.cl/expediente/expedientesEvaluacion.php?modo=ficha&id_expediente=4804415

The Ramsar Convention Secretariat. 2014. *Complejo Lacustre Laguna del Negro Francisco y Laguna Santa Rosa*. Available at: <http://www.ramsar.org/news/complejo-lacustre-laguna-del-negro-francisco-y-laguna-santa-rosa>

Yáñez, N., & Molina, R. 2008. *La Gran Minería y los Derechos Indígenas en el Norte de Chile*. Santiago de Chile: Lom Ediciones.

Interviews

Ercilia Araya, president of the Colla de Pai-Ote Community, Quebrada de Paipote, September 15, 2017.

Segundo Araya, a member of the Colla de Pai-Ote Community, Quebrada de Paipote, September 16, 2017.

Court Decisions

Corte de Apelaciones de Copiapó. 2013. *Sentencia de fecha 230 de abril de 2013, en autos Rol No 26-2013, caratulado “LAUTARO CARMONA SOTO*

CON SERVICIO DE EVALUACIÓN AMBIENTAL TERCERA REGION DE ATACAMA”.

Corte Interamericana de Derechos Humanos (Corte IDH). 2015a.

Comunidad Garífuna Triunfo de La Cruz y sus miembros vs. Honduras. Sentencia de 8 de octubre de 2015 (Fondo, Reparaciones y Costas). Serie C No 305.

_____. 2015b. *Caso Pueblos Kaliña y Lokono vs. Surinam. Sentencia de 25 de noviembre de 2015 (Fondo, Reparaciones y Costas).*

_____. 2012. *Caso Pueblo Indígena Kichwa de Sarayaku Vs. Ecuador. Sentencia de 27 de junio de 2012 (Fondo y Reparaciones). Serie C No 245.*

_____. 2010. *Caso Comunidad Indígena Xákmok Kásek Vs. Paraguay. Sentencia de 24 de agosto de 2010 (Fondo, Reparaciones y Costas). Serie C No 214.*

_____. 2008. *Caso del Pueblo Saramaka Vs. Surinam. Sentencia de 12 de agosto de 2008 (Interpretación de la Sentencia de Excepciones Preliminares, Fondo, Reparaciones y Costas). Serie C No 185.*

_____. 2007. *Caso Saramaka vs. Surinam. Sentencia de 28 de noviembre de 2007 (Excepciones Preliminares, Fondo, Reparaciones y Costas). Serie C No 172.*

_____. 2006. *Caso Comunidad Indígena Sawhoyamaya Vs. Paraguay. Sentencia de 29 de marzo de 2006 (Fondo, Reparaciones y Costas). Serie C No 146.*

_____. 2005. *Caso Comunidad Indígena Yakye Axa Vs. Paraguay. Sentencia de 17 de junio de 2005 (Fondo, Reparaciones y Costas). Serie C. No 125.*

_____. 2001. *Caso Comunidad Mayagna (Sumo) Awas Tingni vs. Nicaragua. Sentencia de 31 de agosto de 2001 (Fondo, Reparaciones y Costas). Serie C No 79.*

_____. 1988. *Caso Velásquez Rodríguez Vs. Honduras. Sentencia de 29 de julio de 1988 (Fondo). Serie C No 4.*

Corte Suprema. 2009a. *Causa Rol No 2840-2008, sentencia de fecha 25 de noviembre de 2009, caratulado “Alejandro Papic Domínguez con Comunidad Indígena Aymara Chuzmiza y Usmagama”.*

_____. 2009b. *Causa Rol N° 696-2008, sentencia de 25 de mayo de 2009.*

_____. 2008a. *Causa Rol N° 6811-2008, sentencia de 11 de noviembre de 2008.*

_____. 2008b. *Causa Rol N° 876-2008, sentencia de 4 de mayo de 2008.*

_____. 2008c. *Causa Rol N° 6053-2007, sentencia de 29 abril de 2008.*

_____. 2007a. *Causa Rol N° 4183-2006, sentencia de 18 de abril de 2007.*

_____. 2007b. *Causa Rol N° 3125-2004, sentencia de 13 de marzo de 2007.*

_____. 2004.

Segundo Tribunal Ambiental. 2017a. *Sentencia de fecha 12 de junio de 2017, en autos Rol No R-72-2015, caratulado “Compañía Minera Casale / Director Ejecutivo del Servicio de Evaluación Ambiental (Res.Ex.N° 532; de 08 de mayo de 2015)”.*

_____. 2017b. *Sentencia de fecha 31 de agosto de 2017, en autos Rol N° R-118-2016, caratulado “SCM Compañía Minera Maricunga / Superintendencia Del Medio Ambiente (Res. Ex. N° 571, de 23 de junio 2016)”.*

_____. 2017c. *Sentencia de fecha 31 de agosto de 2017, en autos Rol N° R-111-2016 (acumulado Rol No R-113-2016), caratulado “SCM Compañía Minera Maricunga / Superintendencia Del Medio Ambiente (Res. Ex.N° 391, de 02 de mayo 2016)”.*

_____. *Sentencia de fecha 1 de diciembre de 2015, Rol R-54-2014, caratulado “LOS PUEBLOS INDÍGENAS UNIDOS DE LA CUENCA DE TARAPACÁ, QUEBRADA DE AROMA, COSCAYA Y MIÑI-MIÑI / DIRECTOR EJECUTIVO DEL SERVICIO DE EVALUACIÓN AMBIENTAL (RES. EX. N° 87, DE 06 DE OCTUBRE 2014)”*.

_____. 2014. *Sentencia de fecha 19 de junio de 2014, en autos Rol N° R-20-2014 (acumulada Rol N° R-30-2014), caratulado “Compañía Minera Maricunga / Superintendencia del Medio Ambiente (ORD. U.I.P.S. N° 1033)”*.

Tercer Tribunal Ambiental. 2016a. *Sentencia de fecha de 28 de diciembre de 2016, Rol R-38-2016, caratulada “LUIS ALBERTO ARANEDA NECUMAN CON DIRECTOR EJECUTIVO DEL SERVICIO DE EVALUACIÓN AMBIENTAL”*.

_____. 2016b. *Sentencia de fecha de 17 de noviembre de 2016, Rol R-30-2016, caratulado “JOSÉ HORACIO CAYÚN QUIROZ CON COMITÉ DE MINISTROS”*.

Tribunal Constitucional de Chile. 2014a. *Causa Rol No 2493, sentencia de 6 de mayo de 2014*.

_____. 2014b. *Rol No 2363-2012, sentencia de 14 de enero de 2014*. _____. 2009. *Causa Rol N° 1340, sentencia de 29 de noviembre de 2009*. _____. 2008. *Causa Rol N° 815, sentencia de 14 de agosto de 2008*. _____. 1995. *Causa Rol N° 226, sentencia de 30 de octubre de 1995*.

PART II

**Case Studies:
Brazil**

Employment Relationships and Transnational Mining Corporations in Carajás/ Pará

*Adriana de Azevedo Mathis*¹⁷⁹

*Carla Rafaela Lemos Sales*¹⁸⁰

*Flávia do Amaral Vieira*¹⁸¹

Introduction

This paper presents the results from the first and second phases of the study called “Policies for the Regulation of Transnational Corporations due to Human Rights Violations in Latin America,” carried out by the Human Rights Clinic run by the Graduate Law Program (PPGD) in collaboration with the Labor, Human Rights, and Social Security Research Group (TRADHUSS) of the Graduate Social Work Program (PPGSS) at Universidade Federal do Pará, under a grant from the Ford Foundation.

In 2016, Universidade Federal do Pará (UFPA), through its Human Rights Clinic connected to the PPGD and the TRADHUSS connected to the PPGSS, was tasked with conducting a document-based and empirical study about Employment Relationships and Transnational Mining Corporations in Carajás/Pará.

To that end, the researchers reviewed the literature, gathered data on mining in Latin America (focused on Brazil and the State of Pará), ran open, public surveys in Pará's capital "Belém" and in the city of Marabá; and did field research and observations in Parauapebas and Marabá in southwest Pará where large-scale mining is the main local economic activity. Incidentally, the area is home to the world's largest mining project, located in the Carajás Mountain Range, where the Carajás S11D Iron Project has recently become a major operation after having been set up by transnational corporation Vale in Canaã dos Carajás in 2016¹⁸².

We should also point out that, back in the first phase, we looked into Brazilian labor laws and their relationship with mining working conditions. The study considered that Brazil's economic and social history is intrinsically tied to the development and expansion of mineral extraction activities.

For information purposes, Brazil currently exports 80% of all the iron and 96% of the niobium in the world. Most of this iron is located in Carajás¹⁸³. Additionally, mining accounts for 4% of the GDP. In 2010, the mineral extraction and processing industry employed more than 855,000 people under the Brazilian Labor Code (decree law no. 5452/1943), CLT¹⁸⁴. That same year, 174,100 people (including company

182 Further information at: <http://www.vale.com/brasil/PT/aboutvale/across-world/Paginas/default.aspx>. Retrieved: September 2017.

183 Data from SIMINERAL, available at: <http://simineral.org.br/mineracao/mineracao-para>> Retrieved in August 2017.

184 Data from the Ministry of Industry, Foreign Trade, and Services of the Federal Government, Brazil. Available at: <http://investimentos.mdic.gov.br/public/arquivo/arq1314392332.pdf>> Retrieved on Aug 5, 2017.

employees and outsourced personnel) were working for transnational corporation Vale¹⁸⁵.

Under the recently passed “Labor Reform,” Law no. 13467 of July 13, 2017, and the law on outsourced labor, Law no. 13429 of March 31, 2017, labor rights have been definitely relaxed and, it seems, the provision expressly guaranteed by article 7 of the 1988 Brazilian Federal Constitution which states labor rights are meant to “improve workers’ social condition” is no longer enforceable.

Building on the efforts put in at first, the research’s second phase primarily comprised workplace-related studies in the Carajás-Pará area. The main focus was working relationships and conditions at mining companies operating in the area of Carajás/Pará (particularly the cities of Marabá, Parauapebas, and Canaã dos Carajás). The data used for analyses in all of the studies is from 2012 to the beginning of 2018, and considers the increased rates of unemployment, non-standard employment, and labor outsourcing in the area, in addition to the construction of the facilities for the “Carajás S11D Iron” Project in the period.

In quali-quantitative terms, the studies considered: information provided by research institutions such as IBGE, IBASE, ILO etc.; Vale’s sustainability reports; reports and collective bargaining agreements between unions and mining companies in the area; diagnoses drawn up; and field observations in the cities of Parauapebas, Marabá, and Canaã dos Carajás. The researchers also interviewed representatives from: Labor Courts; ILO; State Appellate Labor Court (TRT 8th Region); and other government agencies related to workplace health and

¹⁸⁵ According to the 2010 Sustainability Report. Available at: http://www.vale.com/PT/about-vale/sustainability/links/LinksDownloadsDocuments/Relat%C3%B3rio_Sustentabilidade_Port_2010.pdf. Retrieved in August 2017.

safety, such as the Workers' Health Reference Center (CEREST), the Health Inspection Office at the Parauapebas City Health Department (SEMSA), SEMSA's Workers' Health division, the labor tax audit office at the State Labor and Employment Agency (GRTE), the Office of the State Labor and Employment Superintendence (SRTE), Fundação Jorge Duprat e Figueiredo (FUNDACENTRO), which reports to the Ministry of Labor and Social Security (MPTS), the INSS and its social security agency, the City Health Council; in addition to workers and people representing local unions, associations, and social movements.

Please note that the final part of the report provides the results from interviews with judges working in the Carajás area.

1. Brazil in the global mining scene

This section presents the results from compared research encompassing seven Latin American countries (Argentina, Brazil, Chile, Colombia, Mexico, Paraguay, and Peru) and the global mining scene.

Latin American mining investments increased more than five-fold from USD 566 million in 2003 to USD 3,024,000,000 in 2010¹⁸⁶. Therefore, the area brought in a third of the mining industry's total investments in the world. As for the international factors, we can cite the high prices and growing demand. In terms of domestic factors, the goal of drawing in transnational corporations has led to: massive governmental investments, tax breaks, and relaxed environmental and social laws that make it easier to outsource and subcontract labor on a large scale.

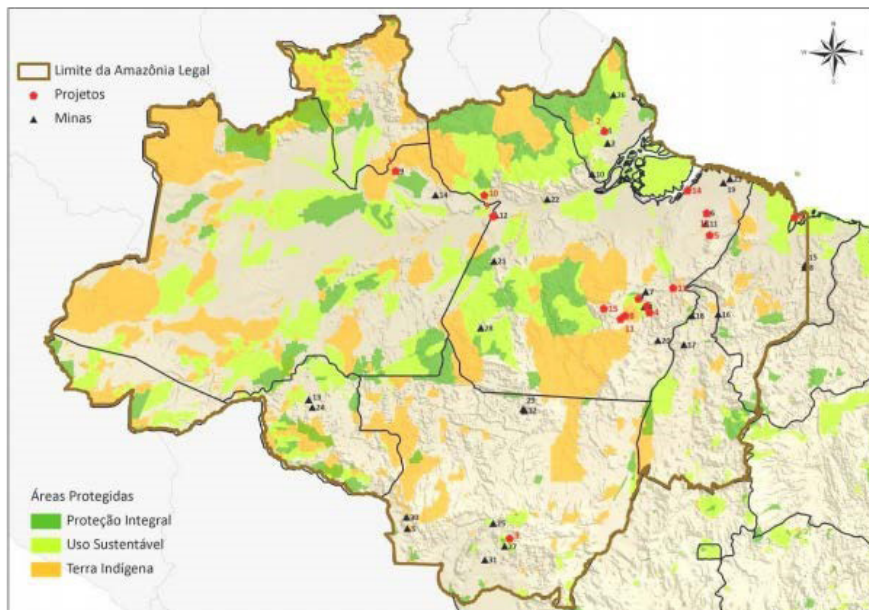
¹⁸⁶ CEPAL y UNASUR (2013).

Regarding Brazil, we see the country is keeping up with the pace of mining in Latin America, considering: a constantly growing mining industry which boasts a 550% increase, the output of more than 72 types of ores, and, consequently, a greater share by the mining industry in the growth of the Gross Domestic Product (GDP) and per capita GDP between 2002 and 2016¹⁸⁷. In that timeframe, 2008 stood out, for instance, when the extraction of natural resources reached 6% of the GDP. Such figure then dropped to 4% in 2010 and went up again in 2013 to achieve a 4.3% (USD 42 billion) share of the entire GDP and 16.9% (USD 150 billion) of the entire Industrial GDP.

Considering the ores mined in Brazil, although niobium takes the top spot in terms of global scale output (along with tantalum), iron ore also stands out in terms of its GDP impact by accounting for 60% of the country's total output. In that regard, the states boasting the largest mineral output are Minas Gerais and Pará, the latter of which holds the world's largest iron ore reserves, the Carajás Mountain Range, as previously mentioned.

¹⁸⁷ Source: The World Bank. World Development Indicators. The amounts are given in US dollars and take into account the purchasing power parity between the countries for reference year 2011.

Map 1- Mining projects and mines set up in the Brazilian Amazon versus protected areas.



Source: SGM/MME, based on information from IBGE, DNPM, and ICMBio (BRAZIL, 2010).

Upon analyzing the situation of Brazilian multinational companies in Latin America, we find the striking presence of Vale, a former state-run company privatized in 1997 which is currently the top iron ore miner¹⁸⁸. Standing out along with Vale, there are other companies that operate either directly or indirectly in the mining industry and which at times provide third-party services, for instance. They are: Gerdau in the steel-making industry, Odebrecht and Andrade Gutierrez in the construction industry, Conteminas (mining industry), Camargo Corrêa (economic Group), and others¹⁸⁹.

These companies' growth is the product of the Brazilian Government's efforts put in especially in the late 1980s via policies that opened

up the country to foreign investments. However, despite the high figures economically obtained from the Brazilian mineral output, we have found that, out of the countries analyzed, in 2014 Brazil and Chile ranked second among those with the worst income inequality, namely 41%, following only Colombia (42%). That translates into its position as the third country with the highest rate of absolute poverty among the countries studied, which figure reached 7.6% that same year. These rates are seen as consequences from the mineral extraction model adopted.

As examples of negative impacts caused by the circumstances mentioned above, we have: conflicts emerging from mining activities, as well as a break with the values, traditions, and way of life of populations living close to mines, lack of safety and/or protection of the population by the authorities, rapid demographic growth, increased prices of goods and services, threats to the population's economic independence, destruction of livelihoods, health hazards, inexistent or deficient use of clean production technologies and technologies to rehabilitate degraded areas, employment claims involving mining companies, and worsening land disputes.

We can also mention out-of-control city growth, lack of infrastructure to serve the population, increased violence, low economic and social growth of cities, prostitution increase, population impoverishment, child labor, water pollution, river silting, air pollution, improper disposal of refuse and spoils, deforestation, soil pollution, underground water pollution, landscape damage and extinction of plants and animals, illegal felling of native trees, dam bursts, contamination by heavy or radioactive metals during mining, substantial changes to the physical environment caused by deforestation, erosion, contamination of water bodies, increased dispersal of heavy metals, landscape and soil changes, in addition to threats to animals and plants.

2. Mining Impacts Under Brazilian Labor Laws

Inhumane, degrading treatment is not allowed. Under Brazilian law, subjecting workers to situations of torture or humiliation is a crime. Such circumstances are closely related to the topic on unfree labor. The researchers have found that Brazilian regulations carry criminal sanctions for any practices that reduce someone to a slave-like condition, such as forced labor or compulsory overwork.

Institutions such as the Ministry of Labor and Employment, the Labor Prosecution Office, and the Federal Police are responsible for enforcing the Policy against Unfree Labor, carrying out inspections, and publishing the Black List of violators. In turn, the Federal Administration's Human Rights Office includes the National Committee for the Eradication of Unfree Labor (CONATRAE).

With respect to child labor, we should first note that the Brazilian Constitution recognizes the protection of childhood as a social right in its article 6, as does Brazil's Statute on Children and Adolescents. Consequently, the CLT carries labor and administrative sanctions for those who put children and teenagers to work.

Regarding union freedom, there are institutions responsible for ensuring free participation in unions (as provided for in article 8 of the 1988 Constitution and OJ 20 of the TST's SDC), namely the Labor Prosecution Office and the Labor Courts. Violating such right is a crime against the organization of labor, according to art. 199 of Brazil's Criminal Code.

As for hiring practices in the mining industry, considering people are essentially hired by non-state-run companies, the CLT applies to most workers, that is, there is a contract between employer and employee. Such contracts usually remain in effect for an unspecified length of time and must be recorded in employees' employment booklet. Employees

are entitled to paid vacation at an additional 30% compensation, year-end bonus, employment security fund, and other rights under the CLT.

In Brazil, transnational corporations and companies operating in the mining industry tend to outsource production and maintenance services. Notwithstanding their particularities across the country, the same social issues stem from such practice: low wages paid to third-party workers; inexistent or lower social security benefits; longer working hours; and high turnover among third-party workers. Regarding this phenomenon, changes made to labor laws are further discussed in the section below.

2.1. Outsourcing and subcontracting in the spotlight

Brazil follows a worldwide trend in which, particularly in the case of the mining industry, we find the “phenomenon of transnational labor outsourcing” (POCHMANN, 2013). Most of the time, these transnational corporations work in production networks, operate above national states, and resort to labor subcontracting and outsourcing in an effort to reduce labor costs. They also carry out initiatives to enhance technology innovation, automation, multifunctionality, and quality to meet the international market’s needs.

In that regard, the recently enacted Law no. 13429 of March 31, 2017, regulates third-party service contracts and the employment relationships under them. This law allows companies and several government bodies to outsource their core activities and was one of the main bills brought by the Temer administration. It was heavily criticized by unions and opposition congresspeople, who claimed it would relax and weaken employment relationships, in addition to impacting wages.

It should be noted that allowing for outsourced third-party management and subcontracting “may lead to an excessive breakdown of

production processes and make it harder for government agencies to control the various service providers' compliance with tax and social security regulations" (DIEESE, 2017, p. 09). In that regard, we believe these omissions may increase labor turnover and create employment and legal insecurity for workers and companies, which would lead to a higher number of employment claims brought to the courts and further compromise the balance of government accounts.

2.2. Considerations on the relaxation of labor rights

In Brazil under President Michel Temer (2016-today), affiliated to the PMDB party, after the impeachment of the Workers' Party Dilma Rousseff (2011-2016) and breach of democratic principles, the Executive Branch brings forward a large bill for legislative reform meant to put austerity measures in place.

The Temer administration's labor reform, Law no. 13467 enacted in July 2017, allows greater latitude for individual agreements between employees and employers, essentially bringing back into effect the service rental law in force in Brazil from 1830 and overruled worldwide since the commitment assumed in the post-war under the 1919 Treaty of Versailles.

Among other things, the reform authorizes zero-hour contracts (article 443)¹⁹⁰, the outsourcing of companies' core business under Law no. 13429/2017 (article 4-A), and the relaxation of rights via collective bargaining (article 611-A), especially in terms of working hours. Work breaks are no longer required to last one hour but may be 30 minutes long (article 611-A, III), and the exposure of pregnant women to unhealthy working conditions is also allowed (article 694-A).

Furthermore, the reform has also made it harder for workers to resort to labor courts as workers are no longer exempt from court costs but required to pay for them in order to file a claim (article 844, §3º), in addition to encouraging private arbitration (article 507-A). It has also created the formula for the annual discharge of labor rights while employment relationships are still ongoing (article 507-B).

The issue emerging from this becomes clear when we understand that, in fact, large economic conglomerates which employ thousands of people use their might to coerce, via threats of mass terminations, union officials into agreeing to working conditions below the minimum legal standards. The fact that work is becoming more precarious also has an adverse effect on the situation of people working for smaller companies, which are unable to compete against the major corporations unless they also resort to the same tactics to increase labor exploitation.

Furthermore, a study conducted by researchers from the independent media center Intercept Brasil have claimed that corporate lobbyist would be the actual masterminds of one out of three changes suggested for the labor reform (MAGALHÃES et al, 2017).

Of those suggestions, no less than 292 (34.3%) were entirely written on computers belonging to representatives of the National Confederation of Transport (CNT), the National Confederation of Financial Institutions (CNF), the National Confederation of the Manufacturing Industry (CNI), and the National Association of Freight Transport and Logistics (NTC&Logística), and employer associations representing employer interests at the National Congress. To top it all off, the majority of congresspeople has close ties to the business world.

In that regard, we find that the arguments that may justify the reform, such as an encouragement for the creation of jobs and economic growth, are an excuse for the breach of commitments taken on at the time the Democratic State Based on the Rule of Law was created, commitments which are even espoused by our Federal Constitution. Although unwittingly, such arguments end up bolstering slavery-condoning rationales which insist on haunting the reality of working relationships in Brazil and, therefore, place all their chips on barbarism (SEVERO, SOUTO MAIOR, 2017).

3. The Carajás area and mining: impacts on employment relationships and conditions

The Carajás/Pará¹⁹¹ area is located in the Eastern Amazon. Definitively integrated to the domestic market in the 1970s – when Large Projects were set up there, especially the Carajás Project – the area distinguishes itself from the 1990s onward as the government embraces neoliberal tenets coupled with an interest in advancing production on a global scale, which increased the demand for agricultural and mineral commodities. From the start, the perspective of development based on the extraction of mineral commodities has been constantly drawing to the area thousands of workers, farmers, loggers, miners, and companies that have caused not only a population boom (which may reach 100% in annual growth in case there is a boost to production or new projects are set

191 According to the State Government, the Carajás integration area contains 12 cities: Bom Jesus do Tocantins, Brejo Grande do Araguaia, Canaã dos Carajás, Curionópolis, Eldorado dos Carajás, Marabá, Palestina do Pará, Parauapebas, Piçarra, São Domingos do Araguaia, São Geraldo do Araguaia, São João do Araguaia.

up)¹⁹². However, all economic activities revolve around the area's fundamental activity, i.e. mining, and the one driving this process is transnational corporation Vale S/A.

It should be noted that, in this picture, work-led migration is the major feature in the area, along with the consequent high rates of labor turnover and unemployment¹⁹³ which go hand in hand with mining enterprises.

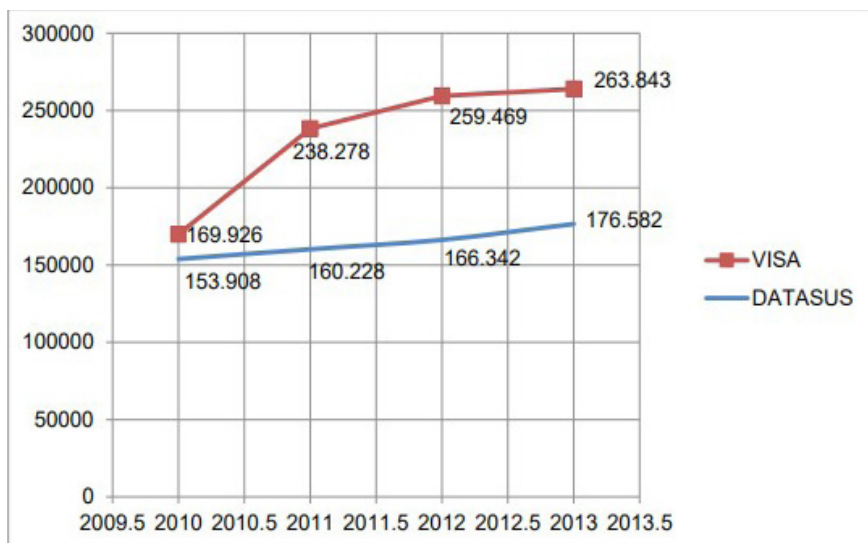
This is a common trend in places where mining is a booming activity, such as the cities in the Carajás area. At the same time, the authorities have a hard time catering to the population's needs, including in terms of controlling and assessing the socioeconomic and environmental impacts from the activities carried out there¹⁹⁴. As an example, the chart below shows the population growth in the city of Parauapebas.

Graph 1 – Parauapebas population growth in 2010 to 2013

192 From the latest Demographic Census conducted in 2010 up to October this year, the top mining towns saw their population grow by approximately 50,000 people in Parauapebas, 38.000 people in Marabá, and 10.000 people in Canaã dos Carajás, according to the IBGE.

193 Regarding unemployment, according to results from a study by Sales and Mathis (2015), we have the example of the city of Parauapebas where, from 2012 to early 2014, the number of dismissals averaged 55%, while hirings were about 45%. Furthermore, between 2010 and 2013, hirings dropped 34% in the mining industry, the main activity in Parauapebas. It should be noted that in 2015, in the cities of Marabá, Parauapebas, and Canaã dos Carajás, the average was only 41.7% of the working population, according to the Brazilian Institute of Geography and Statistics (IBGE).

194 Mathis and Mathis (2012) point out the direct impacts from social policy changes and government reshaping especially from the 1990s onwards (from the neoliberal ideological principles of privatization, selectivity, and focus), based on a particular understanding of the Carajás area in the Amazon and its importance for the international capital. The area is seen to be not only tied to a local reality but also inserted in the world market given the presence of transnational corporation Vale, which heads the economy towards the “export of raw materials in line with international economic trends” (MATHIS; MATHIS, 2012, p. 187). In the area, the government does not show up as a regulator and promotor of social policies. Instead, it takes steps to cater to the market's needs and is locally weak when it comes to making decisions about Vale's operations, the main local development agent.



Source: VISA – Parauapebas City Health Department, 2016.

Results from the study’s first phase identified the use of legal strategies that give transnational mining corporations the upper hand at labor courts.

After sorting through and analyzing the legislation on labor rights (as mentioned in the previous item), field research was conducted in April 2017 in Parauapebas, Pará, a city located in the Carajás area. The researchers focused on interviewing labor court judges and healthcare professionals from Psycho-Social Care Centers (CAPS/SUS) about local working conditions.

Interviews with labor court clerks helped identify the legal strategies that favor companies: leading workers to file individual claims with the courts, legal dilatory tactics, collusion between the government and companies to dodge taxes and debts, existence of laws benefiting the industry, little or no transparency of and access to information related to

contracts signed between companies and transnational corporations in Brazil, and corporate sway over the media and other bodies in charge of protecting rights. Furthermore, the court system in areas where transnational corporations do business is extremely flawed structure-wise, not to mention chronically sluggish. Eight main points have emerged from the results obtained:

Chart 1 – Eight main points found by field studies

1)	Difficulty to access labor judges given the backlog of lawsuits and timing issues;
2)	Flawed or missing corporate social policies at subcontractor companies;
3)	Different fringe benefit and wage incentive policies for transnational corporation employees and outsourced workers;
4)	Failure by affiliates and transnational corporations to disclose detailed information on how worker-related corporate social policies are drawn up;
5)	Lack of records showing transnational corporations extend benefits and wage incentives to outsourced workers;
6)	Flawed or inexistent network of institutions representing labor rights given the absence of certain bodies in cities in the Carajás area, such as a Federal Police Bureau, Labor’s Wage and Hour Bureau, Brazilian Social Security Institute (INSS), etc.;
7)	High judge turnover;
8)	High rates of human rights violations, such as: child labor, sexual abuse, and neglect against children, adolescents, and the elderly.

Source: The authors, based on field research, 2017.

These eight points are looked into in greater detail in the second part of the study “Policies for the Regulation of Transnational Corporations due to Human Rights Violations in Latin America,” conducted by researchers from TRADHUSS/PPGSS and Human Rights Clinic/PPGD at UFPA. Next, the results obtained from the second phase are examined.

3.1. Foundations' efforts put into steering and setting up social programs and projects for transnational mining corporations in the state of Pará

The relationship between transnational corporations' socially responsible actions and working conditions is built on the need for such companies to provide a response (albeit under the guise of social marketing) to the areas where they do business and which they economically, socially, and environmentally etc. impact. These companies change people's living conditions by altering migration processes and building slurry pipelines, dams, workers' housing facilities, and other things required for company operations. All that tends to lead to conflicts of interest between mining companies and the affected communities¹⁹⁵.

Hence, given the high impact of their operations, companies are subject to assessments and certifications to prove they do business responsibly¹⁹⁶. As a result and considering the following criteria: a) higher planned investments per mesoregion between 2012 and 2016, b) availability/willingness to take part in the survey, and c) carrying out corporate social policies in the communities surrounding company operations, the city of Canaã dos Carajás stands out in the Carajás area for the iron ore mining activities (considered the largest operation in the world, estimated to turn out 90 million metric tons a year) At the Carajás S11D Iron project run by transnational company Vale S/A.

To lessen the social impacts caused, the company has a Sustainability Action Plan (SAP) in place based on UN guidelines and human rights principles¹⁹⁷. Este This Plan materializes in several of Vale's policies, such as the ones on Human Rights, Human Resources, Outreach etc. Under the last-named one, the transnational company sets the grounds for an ethi-

197 In reference to the implementation of the 2030 Agenda connected to the sustainable development goals set by the UN for the millennium.

cal, transparent relationship with employees and communities surrounding its mines.

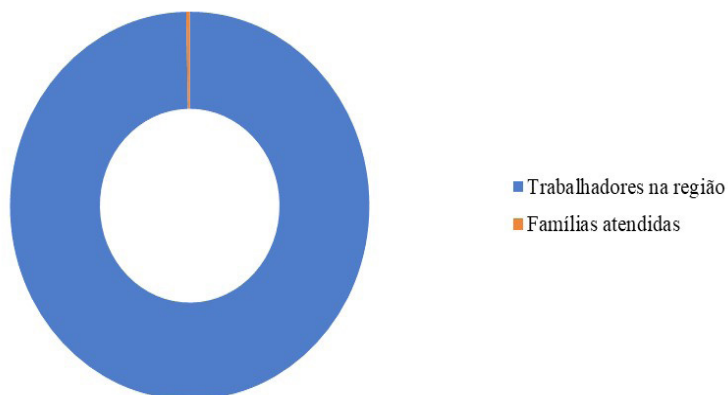
Especially via Sustainability Reports and initiatives by the Vale Foundation, the company reports on the benefits it has brought through its social responsibility initiatives dedicated to health, education, creation of jobs and income, sports, culture, and urban development. In Canaã dos Carajás, the Economic and Social Development agency (*Agência Canaã*) is in charge of carrying out such initiatives.

The company tends to find support on data announced by research institutions that discloses positive results in bustling mining cities. For instance, the City Development FIRJAN³⁶ Rate (IFDM, in Portuguese) assesses the socioeconomic development in Brazilian cities based on categories like employment and income, and education and health. According to that rate, Canaã dos Carajás shows high development in terms of employment and income, and moderate development in education and health.

However, when we look into the reach of the company's initiatives towards the creation of jobs and income, we find the number of families is small (83 families served in 2016) given the universe of workers in the area (nearly 27.000 people in work, including employed and free lancers, in 2015, without considering the number of unemployed people, according to the IBGE).

Graph 2- Comparison between the total workers and the number of families served by company Vale S/A's social initiatives in Canaã dos Carajás.

Comparação entre o total de trabalhadores e o número de famílias atendidas pelas ações sociais da empresa Vale S/A em Canaã dos Carajás



Source: The authors, based on data collected during research, 2016.

It should be noted that we have no way of knowing the number of Vale's own employees living in the city before the S11D Project was set up. The same is true about those who have migrated in search of work and been hired by the company. The lack of information is even worse with respect to outsourced workers¹⁹⁸. That is because, although the company praises itself for its social initiatives, Vale is not clear when it comes to disclosing data, which is spread out across its sustainability reports.

Furthermore, according to the Brazilian Institute for Social and Economic Analyses (IBASE), cities where extraction companies operate suffer various socioeconomic impacts. The main ones are: rampant disease spread,

¹⁹⁸ The company has merely admitted that in 2015 it had a total of 74.1 own employees and 92.2 outsourced workers. However, the company has not stated the specific numbers in the cities in which it operates. About outsourcing in the area, we should mention the discussion by Mathis (2016, p. 122-123), who says: "Outsourcing and subcontracting strategies cause countless impacts on labor social relationships, how work is socially protected, outsourced workers' relationships with workers' unions, and forms of worker resistance."

labor and land issues and conflicts, haphazard growth, booming population deprived of proper infrastructure, and increased rates of violence and prostitution (IBASE, 2016). It is no wonder that people rally against Vale in search of answers to: pollution and contamination of farming land and rivers; river silting; cracking of house walls, people being run over by vehicles, and violation of communities' right to come and go in areas close to railways; communities forcibly displaced for mines to be set up, thereby pushing work-able men and women to urban areas which, already lacking job posts, are unable to absorb them. Also, with respect to labor issues, unions complain about "workplace accidents going unreported, longer working areas, countless overtime, increased demands and harassment in companies, self-dealing union leaders, and persecution of union leaders"³⁸.

Most of this information is the product of initiatives taken by social movements and is based on Vale's Sustainability Report. They revise the information contained in the company's Sustainability Report run by the media and reveal the actual impact from mining activities and which do not show up in the document organized by the company. This revised Report is put together by the International Association of People Impacted by Vale (*Articulação Internacional dos Atingidos pela Vale*), but there are other relevant movements in the area: Pastoral Committee for the Land (*Comissão Pastoral da Terra - CPT*), National Committee in Defense of Mining Areas (*Comitê Nacional em Defesa dos Territórios Frente à Mineração*), Movement of Landless Farmers (*Movimento dos Trabalhadores Rurais Sem Terra - MST*), National Movement for the People's Sovereignty over Mining (*Movimento Nacional pela Soberania Popular frente à Mineração - MAM*), Movement of People Displaced by Dams (*Movimento dos Atingidos por Barragens - MAB*), Justice on Track (*Justiça nos Trilhos*), Youth Impacted by Mining (*Juventude Atingida pela Mineração*) in the states of PA and MA, and Global Justice (*Justiça Global*).

Chart 2 – Vale S/A mining projects associated to rights violation in the state of Pará.

Projeto Onça Puma: O povo Xikrin realizou diversos protestos na região de Ourilândia do Norte (PA) em função dos danos causados à saúde da população devido a exploração de Niquel. Além da poluição do rio Caeté que serve a comunidade.

Projeto Salobo: No município de Marabá (PA), o povo Xikrin denuncia contaminação das áreas de castanhais utilizadas por eles, devido a exploração de cobre na região.

Projeto Bio Vale: Em 2014, o Instituto Evandro Chagas comprovou a contaminação por agrotóxico em plantações de dendê nos municípios de São Domingos do Capim, Concórdia do Pará, Bujaru e Acará; Desde 2008, quilombolas de Concorórdia (PA) acusam a empresa de pressionar agricultores a venderem suas terras, ameaçando-os com desapropriações; Índios Tembê do território Turé-Mariquita denunciam os impactos das atividades da empresa em suas terras, através da contaminação por agrotóxicos.

Estrada de Ferro Carajás: Comunidades sofrem com assoreamento de suas fontes hídricas, rachaduras nas estruturas de suas casas, atropelamentos de pessoas e animais, violação do direito de ir e vir das comunidades e remoções; Ocorrem viagens clandestinas de crianças e adolescentes no trem da empresa, especialmente dentro das composições que transportam minério de ferro.

Sindicatos denunciam subnotificação dos acidentes de trabalho, o aumento da jornada de trabalho, elevado número de horas extras cobrado dos funcionários, aumento da pressão e do assédio moral dentro da empresa, cooptação sindical e perseguição de líderes sindicais.

Projetos de atividade mineral da empresa Vale S/A associados a violações de direitos no estado do Pará

Source: The authors, based on Vale S/A 2015 Sustainability Report.

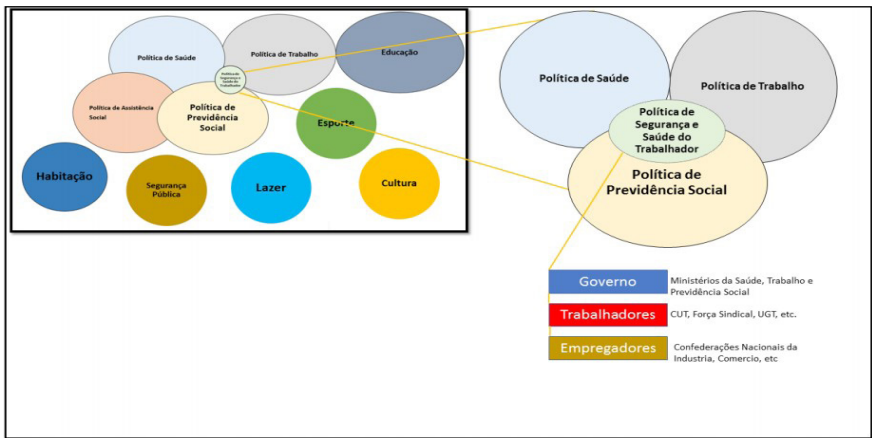
Given the circumstances, we find there is a mismatch between the impacts caused by the companies’ facilities and mining operations and what they give back to the communities surrounding their projects, which shows their social responsibility initiatives are hardly effective. Such feebleness seems nearly intentional as it closely resembles how employment relations and working conditions are handled in the Cara-

jás area. Such fact has been found in the other studies carried out and which complement this one, as described below.

3.3. Analysis of workers’ healthcare policy in place in Carajás-Pará

Looking closely at how workers’ healthcare is provided in the Carajás-Pará area, particularly in Parauapebas, we find a lack of efforts to guarantee their health. This statement is backed by the analysis of primary and secondary data revealing jobs in the area are deeply connected to the mining activities carried out by transnational corporation Vale S/A and its affiliates.

Image 1 – Makeup of the National Workers’ Health Policy.



Source: SILVA, 2016.

Chart 3 – Main points collected by the field research on workers’ health and safety¹⁹⁹

- 1) Inadequate compliance with workers’ health and safety regulations;

199 Especially given the program of inspections sent by the Workplace Inspection Office of the MTE, which program does not prioritize employees’ health and safety inspections.

2)	Demands for increased productivity over ever shortening timeframes; work shifts lasting 12 to 15 hours a day;
3)	The existence of a so-called “whopper shift” that comprises 15 working days in a row when some operation requires servicing;
4)	Countless overtime;
5)	People’s shortened working life;
6)	Disregard for lunch breaks;
7)	Reported use of sleeping or pain relief meds to make up for workers’ short time off work;
8)	Internal Accident Prevention Committees (CIPA, in Portuguese) powerless against companies’ economic might;
9)	Failure by the relevant authorities to monitor workplace health and safety conditions, considering no fines are imposed unlike those paid for labor law violations ⁴⁰ ;
10)	Inspections detecting workplace health and safety violations are of an educational and corrective nature instead of punitive;
11)	Lack of the equipment required for monitoring and assessing workplace safety;
12)	Transnational corporation sided with by public officials;
13)	Lack of communication between government agencies in charge of ensuring workplace health and safety;
14)	Federal and state funds and resources earmarked for workplace health and safety policies go unused;
15)	Lack of controls over the funding meant for monitoring the initiatives carried out under the policy;
16)	Consequently, the policy is basically restricted to private resources via healthcare plans ²⁰⁰ ;
17)	In the event of occupational accidents or illnesses, sick workers tend to be ousted and replaced with healthy ones;
18)	Absence of union officials in committees that set and manage the policy;

Continue →

²⁰⁰ It should be noted that a transnational corporation’s going into business in the area has drawn into the city dozens of Workplace Health and Safety services which today comprise 85% of the city’s healthcare establishments which are run by the private sector and make up the Supplementary Healthcare network. This network operates under contracts and largely serves employed workers whose healthcare plans are fully or partially paid by Vale S/A and its service providers.

19)	Workplace accidents are seen as merely individual issues by unions; also, the policy is missing from the agenda of discussions between the workers' union and the company;
20)	Finally, it should be noted that the main afflictions among local workers are mental issues and spinal diseases, most of which are diagnosed as unrelated to people's occupation, thereby unveiling the government's neglect or disregard about having a fully operational workplace health policy in place.

Source: The authors, based on field research, 2016.4

Hence, the data reveals that “life” to transnational corporation Vale S/A means much less than claimed by the company in its sustainability reports, as its operations clearly remain dictated by the market.

3.2. Limitations and possibilities for enforcing labor laws in mining: how labor judges view mining working conditions in southeast Pará

With the exception of a few cases, most judges preside over the main employment claims against Vale’s subcontractors or outsourced third-party management providers, or yet against large landowners, but not directly filed against the corporation itself. At the same time, judges see the area as thriving given the economic activities already in place, which shows their position is in line with a notion of development based on the extraction of commodities.²⁰¹

²⁰¹ On the one hand, this development model considers the capitalist development needs which, in a merger between market (which primarily serves the interests of large international corporations) and State (steered by neoliberal tenets and, at the same time, guaranteeing a minimum of social rights), employs capital accumulation strategies in a scene governed by the international division of labor, where areas rich in natural and mineral resources, such as the Amazon in Pará, play a valuable role. On the other, these same areas boasting the prospect of economic development create hope and therefore draw in thousands of workers in search of a better life. However, these workers are subjected to precarious and overwork conditions, added to failing public policies. Therefore, according to Mathis et. al.

Furthermore, they usually espouse the prevailing local culture according to which every employment relationship is expected to end up in court. Such a viewpoint makes it harder to deal with more grievous cases in a speedier manner. To make matters worse, there is a labor-related law practice market that masks the actual employment claims. It is relevant to note that most judges mentioned the fact that labor courts tend to be physically surrounded by countless law firms, most of which specialize in employment claims, although they also cater to companies' needs and interests.

Chart 6 – Characteristics of labor courts in Parauapebas.



Source: Based on field research, 2017.

Finally, despite the judges' claiming they resort to Brazilian and international laws and regulations to make their decisions, our analysis of their interviews show much is yet to be understood about the role of labor judges in view of the diversity of dreadful situations seen in terms of employment relations and working conditions in the Carajás area. Especially because we have also found a flawed or inexistent network of institutions representing labor rights given the absence of certain bodies in

several cities in the Carajás area, such as a Federal Police Bureau, Labor's Wage and Hour Bureau, Brazilian Social Security Institute (INSS) etc.

4. Considerations about employment relations and working conditions in Carajás

Overall, the two phases of the “Policies for the Regulation of Transnational Corporations due to Human Rights Violations in Latin America” study show that the operations of transnational mining corporations in Latin America lead to several processes that change the local economic, geopolitical, social, and environmental dynamics.

Likewise, different mining projects generate local impacts, such as: potential relaxation of social and environmental laws; people's needs and rights underacknowledged and underrepresented; violation of human and nature's rights; commodified nature; disintegrated areas; commodified justice; resistance and conflicts; subordinated global insertion; focus on the economy, and fights over scraps.

We also see that, even when Brazilian transnational corporations are the main mining companies and despite the economic potential they generate, their positive impacts are disputable once we realize the massive social and environmental issues that emerge from large mining operations. That is because their activities are focused on mining for export at low costs, while product processing, transformation, and distribution are taken over by the world's large economic powerhouses, such as Canada, the US, and China. Also, these companies start operating in Latin America and replicate, save for some particularities, the same scenario that plagues their national states as a result of foreign transnational corporations' operations there.

Such information suggests Latin American governments, and Brazil's in particular, contribute on a large scale to the international market's interests given their position in the local and global division of work. On the other hand, negative impacts pile on and social inequalities remain. Some of the worsening impacts are those on employment relations and working conditions in mining areas where transnational corporations do business. That is owed to the severe disconnect between the laws in force and what actually takes place in terms of employment relations and working conditions. This scenario only tends to further deteriorate as Brazilian labor laws become more relaxed under the "Labor Reform," Law no. 13467 of July 13, 2017, and the law on outsourcing, Law no. 13429 of March 31, 2017.

Therefore, in addition to violating Brazil's 1988 Federal Constitution and several international commitments the country has taken on with respect to the protection of Human Rights, the current changes to labor law, especially regarding outsourcing and subcontracting processes, tend to benefit transnational corporations and other companies, including those in the mining industry. That is because the new labor rights-relaxing laws have been conceived to undermine workers' ability to sue companies and hold them accountable for human rights violations.

However, there is no consensus among Brazilian labor judges about the recent enactment and validation of the Labor Reform and Law on Outsourcing. As a result, this past October the National Association of Labor Judges (ANAMATRA) released an official opinion claiming that most of the 125 provisions included in the Reform are unconstitutional. ANAMATRA also believes that companies should proceed with caution before they comply with any of the changes made to labor laws. In fact, there will be some resistance against the Labor Reform passed in Brazil and some judges will stick to labor courts' practice of applying the most favorable

norm to workers (when workers are clearly at a disadvantage), obviously within the boundaries of the Constitution and other laws.

Nevertheless, in the Carajás area we find that in most cases legal strategies are used to favor transnational mining companies. There is an evident lack of social services and legal aid for workers in these places, leaving companies free to do the bare minimum in terms of lessening the impacts from their operations, including the aforementioned precarious employment relations and working conditions. Such relations are bound to deteriorate even further as labor laws are relaxed, given unions now wield less power. That translates, for instance, in the different fringe benefit and wage incentive policies for the transnational corporation's own employees and outsourced workers.

In view of the foregoing, we find that the lack of proper enforcement of labor laws added to the government's failure to carry out public policies only worsens the conditions in mining towns and areas, particularly when we realize that the nearly inexistent network of social and legal protection for workers boosts the transnational mining corporations' growth potential. Furthermore, while governmental efforts towards implementing public policies are feeble, our studies show little can be expected in terms of socially responsible initiatives by transnational mining corporations, especially Vale. Such initiatives have proved to be selective, compensatory, and limited when we look at the impacts caused by mining.

Finally, we see that the local reality in the Carajás area, despite its particularities, is not detached from the Brazilian reality and that in other Latin American countries. This study's first and second phases are connected. Therefore, they depict a scenario that always poses yet another challenge in the fight against human rights violations and especially when it comes to protecting labor rights, in view of transnational mining corporations' continuous growth.

References

- ANAMATRA, **Enunciados aprovados na II Jornada de Direito Material e Processual do Trabalho**. October 2017. Available at: <http://www.jornadanacional.com.br/listagem-enunciados-aprovados-vis1.asp>> Retrieved Nov 12, 2017.
- ANDERSON, Perry. **Balanço do Neoliberalismo**. In: SADER, E. (Org.) **Pós-Neoliberalismo**. As Políticas Sociais e o Estado Democrático. São Paulo: Paz e Terra, 1995.p.09-38.
- ANTUNES, Ricardo. **Adeus ao trabalho?** Ensaio sobre as metamorfoses e a centralidade do mundo do trabalho. São Paulo: Boitempo, 2005.
- ARTICULAÇÃO INTERNACIONAL DOS ATINGIDOS PELA VALE. **Relatório de Insustentabilidade da Vale**. 2015. Available at: https://atingidospelavale.files.wordpress.com/2015/04/relatirio_pdf.pdf. Retrieved: September 2017.
- BAUMAN, Z. **O mal estar da pós-modernidade**. Rio de janeiro: Jorge Zahar, 1998.
- BECK, U. **O que é globalização?** Equívocos do globalismo, respostas à globalização. São Paulo: Paz e Terra, 1999.
- BORÓN, A. **A sociedade civil depois do dilúvio neoliberal**. In: SADER, E. (Org.) **Pós-Neoliberalismo**. As Políticas Sociais e o Estado Democrático. São Paulo: Paz e Terra, 1995. P.63-138
- BRASIL. **Constituição Federal de 1988**. Available at: http://www.planalto.gov.br/ccivil_03/constituicao/constituicaocompilado.htm. Retrieved: August 2017.

_____. Ministério da Previdência Social. **Anuário Estatístico de Acidentes de Trabalho 2013**. Available at: <http://www.previdencia.gov.br/dados-abertos/aeat-2013/>. Retrieved August 2017.

_____. **Convenção Americana de Direitos Humanos. 1969**. Available at: http://www.planalto.gov.br/ccivil_03/decreto/Do678.htm. Retrieved: August 2016.

_____. **Consolidação das Leis do Trabalho**. Decreto-lei n. 5.452 de 1º de maio de 1943. Available at: http://www.planalto.gov.br/ccivil_03/decreto-lei/Del5452.htm. Retrieved: August 2016.

_____. **Código Penal**. Decreto-lei n.º 2.848 de 7 de dezembro de 1940. Available at: http://www.planalto.gov.br/ccivil_03/decreto-lei/Del2848compilado.htm. Retrieved: August 2017.

_____. Ministério do Trabalho e Emprego. **Instrução Normativa nº. 91**. 2011. Available at: http://www.trtsp.jus.br/geral/tribunal2/ORGaos/MTE/In_Norm/IN_91_11.html. Retrieved: August 2016.

_____. Ministério do Trabalho e Emprego. **Norma Regulamentadora nº. 22**. Available at: <http://trabalho.gov.br/seguranca-e-saude-no-trabalho/normatizacao/normas-regulamentadoras/norma-regulamentadora-n-22-seguranca-e-saude-ocupacional-namineracao>. Retrieved: August 2016.

_____. **Pacto Internacional dos Direitos Civis e Políticos. 1966**. Available at: http://www.planalto.gov.br/ccivil_03/decreto/1990-1994/do592.htm. Retrieved August 2016. _____ . Lei nº 13.429, de 31 de março de 2017. Available at: http://legislacao.planalto.gov.br/legisla/legislacao.nsf/Viw_Identificacao/lei%2013.429-2017?OpenDocument. Retrieved August 2017.

BRITO FILHO, José Cláudio Monteiro de. Trabalho com redução à condição análoga à de escravo: análise a partir do tratamento decente e de seu fundamento, a dignidade da pessoa humana. In: VELLOSO, Gabriel; FAVA, Marcos Neves (Coord.). **Trabalho escravo contemporâneo: o desafio de superar a negação**. São Paulo: LTr, 2006. p. 132.

CASTELLS, M. Para o Estado-rede: globalização econômica e instituições políticas na era da informação. In: BRESSER-PEREIRA, L.C.; SOLA, L.; WILHEIM, J. (Orgs) **Sociedade e estado em transformação**. São Paulo: Editora Unesp, 1999. p.147-171.

CEPAL. **Anuário Estatístico da América Latina e do Caribe** (CEPAL, 2014). Available at: https://aldeiacomum.files.wordpress.com/2015/02/s1420569_mu.pdf.

CEPAL y UNASUR. 2013. **Recursos Naturales em UNASUR**. Situación y tendencias para uma agenda de desarrollo regional. CEPAL Y UNASUR, Santiago.

CIDH, Caso nº 12.066, Trabalhadores da Fazenda Brasil Verde. Available at: <https://www.oas.org/es/cidh/decisiones/corte/2015/12066NdeResPT.pdf>> Retrieved Oct 11, 2013.

CHESNAIS, F. **A mundialização do capital**. São Paulo: Xamã, 1996.

CUT- CENTRAL ÚNICA DOS TRABALHADORES, **Terceirização e desenvolvimento: uma conta que não fecha/Dossiê acerca do impacto da terceirização sobre os trabalhadores e propostas para garantir a igualdade de direitos**. Secretaria Nacional de Relações de Trabalho e Departamento Intersindical de Estatística e Estudos Socioeconômicos. - São Paulo: Central Única dos Trabalhadores, 2014.

DIAS, Priscila Tamara Menezes; MATHIS, Adriana Azevedo. **Política de combate ao trabalho escravo no Brasil contemporâneo: divergências e convergências na operacionalização da política.** Belém: papers do NAEA, n 282, p. 1-25.

DIEESE, Nota técnica nº 175, de abril de 2017. Available at: <https://www.dieese.org.br/notatecnica/2017/notaTec175TerceirizacaoTrabalhoTemporario.html>> Retrieved Oct 11, 2017.

_____. **A saúde do trabalhador no processo de negociação coletiva no Brasil.** Nº 76, maio de 2015. Available at: <https://www.dieese.org.br/estudosepesquisas/2015/estpesq76saudeTrabalhador.pdf>> Retrieved Nov 11, 2017.

DRUCK, Graça. **A precarização social do trabalho no Brasil: alguns indicadores.** In: ANTUNES, Ricardo (org.). Riqueza e miséria do trabalho no Brasil II. São Paulo: Boitempo, 2013, p. 55-73.

FEDERAÇÃO NACIONAL DOS BANCOS (FENABAM). **CCT/2005.** Available at: http://www.bancariosdf.com.br/site/images/stories/pdf/acordo_coletivo_2005-2006.pdf. Retrieved: August 2016. FIRJAN. Available at: www.firjan.com.br. Retrieved August 2017.

GALVÃO, Andrea; VARELLA, Paula. **Sindicalismo e Direitos.** Vitória da Conquista: Politeia: História e Sociedade, v. 11, n. 1, p. 241-257, jan.jun. 2011.

GIDDENS, A. **As consequências da modernidade.** São Paulo: Editora Unesp, 1991.

GOMES, J.M. **Política e democracia em tempos de globalização.** Petrópolis: Vozes, 2000.

GOVERNO DO PARÁ. **Regiões de integração do estado do Pará.** Available at: http://seplan.pa.gov.br/sites/default/files/PDF/loa/loa2016/13.anexo_x_-_regioes_de_integracao_e_municipios_do_estado_do_para.pdf. Retrieved: October 2017.

GUDYNAS. **Extractivismos:** Ecología, economía y política de un modo de entender el desarrollo y la Naturaleza. Bolívia, Cochabamba: CEDIB y CLAES, 2015.

IBASE. Available at: <http://ibase.br/pt/>. Retrieved: October 2016.

IBGE. **Cidades.** Available at: <https://cidades.ibge.gov.br/>. Retrieved: October 2017.

LIMA, Francisco Menton Marques de. **Elementos de Direito do Trabalho e Processo Trabalhista.** 12^a ed. São Paulo: LTR, 2007.

MACHACZEK. **Liberdade sindical no Brasil:** a Convenção 87 da OIT e a Constituição de 1988. São Paulo: 2009. Dissertação de Mestrado. Available at: <http://www.dominiopublico.gov.br/download/teste/arqs/cp117779.pdf>. Retrieved: July 2016.

MAGALHÃES, Alline; COSTA, Breno; LAMBRANHO, Lúcio; CHAVESIO, Reinaldo. Lobistas de bancos, indústrias e transportes estão por trás das emendas da Reforma Trabalhista. In The Intercept Brasil. Apr 26, 2017. Available at: <https://theintercept.com/2017/04/26/lobistas-de-bancos-industrias-e-transportes-quem-esta-por-tras-dasemendas-da-reforma-trabalhista/> Retrieved 11/11/2017.

MASCARO, Amauri. **Subcontratação ou Terceirização.** Revista de Direito do Trabalho | vol. 83 | p. 20 | Jul / 1993. Doutrinas Essenciais de Direito do Trabalho e da Seguridade Social | vol. 1 | p. 1169 | Set / 2012DTR\1993\330

MATHIS, Adriana. Pesquisa de pós-doutoramento, pela Universidade Livre de Berlim e financiada pela Coordenação de Aperfeiçoamento de Pessoal de Nível Superior (CAPES-Brasil). 2015.

_____, Adriana de; MATHIS, Armin. **Responsabilidade Social Corporativa e Direitos Humanos: discursos e realidades**. R. Katál., Florianópolis, v. 15, n. 1, p. 131-140, jan./jun. 2012.

_____, Adriana de. **Impactos de mineração e direitos humanos em Carajás-Pa**. Juiz de Fora: Homa publica: Revista Internacional de Direitos Humanos e Empresas. Vol. 01. Nov. 2016, p. 122-139.

_____, Adriana de Azevedo; NASCIMENTO, Maria Antônia C. do; NASCIMENTO, Nádia S. F.; GOMES, Vera L. B. **Desenvolvimento, neodesenvolvimentismo e impactos sobre o trabalho na Amazônia brasileira**. Belém: Novos Cadernos do NAEA, v. 19, n. 1 (2016), p. 259-262.

MATTOSO, Jorge. **A desordem do trabalho**. São Paulo: Scritta, 1996.

NEGRI, Fernanda. Padrões tecnológicos e de comércio exterior das firmas brasileiras. **Inovações, padrões tecnológicos e desempenho das firmas industriais brasileiras**. Brasília: IPEA, 2005.

NOGUEIRA, Marco Aurélio. **Um estado para a sociedade civil**. Temas éticos da gestão democrática. São Paulo: Cortez, 2011.

ORGANIZAÇÃO INTERNACIONAL DO TRABALHO (OIT). **Convenção 182**. Available at: <http://www.oitbrasil.org.br/node/518>. Retrieved: August 2016.

_____. **Convenção nº. 29 que trata sobre o Trabalho Forçado ou Obrigatório**. 1930. Available at: <http://www.oitbrasil.org.br/node/449>. Retrieved: August 2016.

_____. **Convenção nº. 105 de Abolição do Trabalho Forçado.** 1957. Available at: <http://www.oit.org.br/node/469>. Retrieved: August 2016.

_____. **Convenção 045 OIT.** Available at: http://www.trtsp.jus.br/geral/tribunal2/LEGIS/CLT/OIT/OIT_045.html. Retrieved: August 2016.

_____. **Convenção 98.** Available at: <http://www.oitbrasil.org.br/node/465>. Retrieved: August 2016.

ORGANIZAÇÃO DAS NAÇÕES UNIDAS (ONU). **Declaração Universal dos Direitos Humanos.** Available at: <http://www.dudh.org.br/wp-content/uploads/2014/12/dudh.pdf>. Retrieved: August 2016.

PICANÇO, Victor. **Pejotização do trabalhador:** a ilegalidade da contratação de trabalhadores como pessoa jurídica. In: *Âmbito Jurídico*, Rio Grande, XVI, n. 111, abr 2013. Available at: <http://www.ambito-juridico.com.br/site/?n_link=revista_artigos_leitura&artigo_id=12743>. Retrieved July 2016.

PINTO, Maria Cecília Alves. **Terceirização de Serviços - Responsabilidade do Tomador.** *Rev. Trib. Reg. Trab.* 3ª Reg., Belo Horizonte, v.39, n.69, p.123-146. Available at: http://www.trt3.jus.br/escola/download/revista/rev_69/Maria_Pinto.pdf>

PNUD. **Agenda 2030,** Available at: <http://www.agenda2030.org.br/>. Retrieved October 2017.

POCHMANN, Marcio. **A transnacionalização da terceirização na contratação do trabalho.** 2013. Available at: [www.cnts.org.br/ public/arquivos/Pesquisa_TG_Pochmann.pdf](http://www.cnts.org.br/public/arquivos/Pesquisa_TG_Pochmann.pdf)> Retrieved Aug 5, 2016.

POLÍTICA PÚBLICA DE SEGURANÇA E SAÚDE DO TRABALHADOR. **Decreto n. 7.602 de 2011**. Available at: [http:// www.previdencia.gov.br/arquivos/office/3_081014-105206-701.pdf](http://www.previdencia.gov.br/arquivos/office/3_081014-105206-701.pdf).

Retrieved: August 2016. SALES, Carla R.L.S; MATHIS, Adriana de Azevedo. **Desemprego e qualificação profissional na região de Carajás-Pa**. Revista Argumentum, Vitória (ES), v. 7, n.1, p. 184-201, jan./jun. 2015.

SENADO FEDERAL. **Lei nº 13.467, de 13 de julho de 2017**. Available at: <http://legis.senado.leg.br/legislacao/DetalhaSigen.action?id=17728053>. Retrieved August 2017.

SOUTO MAIOR, Jorge Luiz; SEVERO, Valdete Souto. Mais uma vez, Ives Gandra Filho rifa direitos fundamentais alheios e a Justiça do Trabalho. Portal Justificando. February 21, 2017. Available at: <http://justificando.cartacapital.com.br/2017/02/21/mais-uma-vez-ivesgandra-filho-rifa-direitos-fundamentais-alheios-e-justica-do-trabalho/>> Retrieved Jul 17, 2017.

SUPREMO TRIBUNAL FEDERAL. **Ação Direta de Inconstitucionalidade 5.209**. Available at <http://s.conjur.com.br/dl/stf-libera-lista-suja-trabalho-escravo.pdf>. Retrieved: August 2016.

TEXEIRA, F. O neoliberalismo em debate. In: TEXEIRA, F (Org) **Neoliberalismo e Restruturação Produtiva**. As novas determinações do mundo do trabalho. São Paulo: Cortez, 1996.

TRIBUNAL REGIONAL DO TRABALHO 8ª REGIÃO. Acórdão nº. RO-0000811-18.2011.5.08.000. TRT 8ª Região. Terceira Turma.

Relatora: Des. Francisca Oliveira Formigosa. 09.11.2011; (Acórdão nº.: RO 1506006820095070011. TRT 7ª Região. Primeira Turma. Relatora:

Des. Rosa de Lourdes Azevedo Bringel. 23.02.2012;Acórdão nº. TSTRR-650-80.2010.5.03.0004. Primeira Turma. Relator: Flávio Portinho Sirangelo. 15.02.2012.

TRIBUNAL SUPERIOR DO TRABALHO. **Súmula 331**. Available at: http://www3.tst.jus.br/jurisprudencia/Sumulas_com_indice/Sumulas_Ind_301_350.html. Retrieved: August 2016.

TRIBUNAL SUPERIOR DO TRABALHO. **OJ 20 da SDC**. Available at: http://www.tst.jus.br/home?p_p_id=15&p_p_lifecycle=0&p_p_state=maximized&p_p_mode=view&_15_struts_action=%2Fjournal%2Fview_article&_15_groupId=10157&_15_articleId=63246&_15_version=1.1. Retrieved: August 2016.

VALE. **Vale no mundo**. Available at: <http://www.vale.com/brasil/PT/aboutvale/across-world/Paginas/default.aspx>. Retrieved: September 2017.

_____. **Vale no Pará**. Available at: <http://www.vale.com/brasil/PT/aboutvale/across-world/Paginas/default.aspx>. Retrieved: September 2017.

_____. **Relatório de Sustentabilidade 2010**. Available at: http://www.vale.com/PT/aboutvale/sustainability/links/LinksDownloadsDocuments/Relat%C3%B3rio_Sustentabilidade_Port_2010.pdf. Retrieved August 2017.

_____. **Relatório de Sustentabilidade 2014**. Available at: <http://www.vale.com/PT/aboutvale/sustainability/links/LinksDownloadsDocuments/relatorio-de-sustentabilidade-2014.pdf>. Retrieved: October 2017.

_____. **Relatório de Sustentabilidade 2015**. Available at: <http://www.vale.com/PT/aboutvale/sustainability/links/LinksDownloadsDocuments/relatorio-de-sustentabilidade-2015.pdf>. Retrieved: October 2017.

WOOD, E. **Democracia contra capitalismo.** La renovacion del materialismo histórico. México: Siglo XXI, 2000.

WORLD BANK. **National accounts data, and OECD National Accounts data files.** Available at: <http://databank.worldbank.org/data/reports.aspx?source=enterprise-surveys>. Retrieved: Mar 1, 2016.

WORLD DATA BANK / **World Development Indicators.** Available at: www.databank.worldbank.org. Retrieved: Oct 1, 2016.

ZIBECHI, Raúl. **Brasil potência:** entre a integração regional e um novo imperialismo. In: Consequência, Rio de Janeiro, 2012.

Flaws and Risks of The “Amazon – Autazes Potassium Project” on the Mura Indigenous People’s Land

*Fernanda Frizzo Bragato*²⁰²

*Jocelyn Getgen Kestembaun*²⁰³

*Greta Cristini*²⁰⁴

*Diana Kearney*²⁰⁵

*Paulo Victor Schroeder*²⁰⁶

Introduction

This paper is a case study that looks into the events taking place as company Brazil Potash Corp. a.k.a. Brasil Potássio Ltda. sought to secure the preliminary permit required for conducting environmental viability studies regarding sylvinite (a source of potash) mining and the construction of roads and a port in the city of Autazes, home to various tracts of land belonging to the Mura indigenous people. The fact the company was granted the permit and began operating in the city without having first discussed the project with the Mura people led the Federal Prosecution Office to file a Public-Interest Civil Action in an effort to revoke the permit granted to the company. According to a study by the World Bank,

indigenous territories hold 80% of the biodiversity still found on the planet²⁰⁷, reason why analyzing the environmental and human impacts from mining projects in such areas requires extra careful consideration.

In the case at hand, operations began under allegedly improperly obtained permits and without the mandatory prior, free, and informed consultation with the impacted indigenous communities. Considering the consultation procedure requires companies to disclose thorough, clear, straightforward information about the impacts from the projects that will be impacting the indigenous peoples, this study is going to look into not only the applicable legislation and the rights guaranteed to these peoples in Brazil but also provide an overview of the general risks involved in setting up similar projects on indigenous land and areas like the one in Autazes.

The following sources and methods were used to conduct this study: a) reading and analysis of the court records related to Public-Interest Civil Action no. 0019192-92.2016.4.01.3200; b) visit to the Soares, Jauary, Paracuhuba, São Felix, and Guapenu communities in the city of Autazes in January 2018; c) information obtained from the Missionary Indigenous Inclusion Council (*Conselho Indigenista Missionário – Northern Brazil*), the Federal Prosecution Office (Federal Prosecutor – 5th Civil Office - PR/AM), and anthropologist Bruno Caporrino; d) review of the

²⁰⁷ Many or most of the world's major centers of biodiversity coincide with areas occupied or controlled by Indigenous Peoples. Traditional indigenous territories encompass up to 22 percent of the world's land surface and they coincide with areas that hold 80 percent of the planet's biodiversity. Also, the greatest diversity of indigenous groups coincides with the world's largest tropical forest wilderness areas in the Americas (including Amazon), Africa, and Asia, and 11 percent of world forest lands are legally owned by Indigenous Peoples and communities. This convergence of biodiversity-significant areas and indigenous territories presents an enormous opportunity to expand biodiversity conservation efforts beyond parks, which tend to benefit from most of the funding for biodiversity conservation. In Claudia Sobrevila. *Role of Indigenous Peoples in Biodiversity Conservation* *fte* Natural but Often Forgotten Partners. Washington, D.C.: THE WORLD BANK, 2008. Available at <https://siteresources.worldbank.org/INTBIODIVERSITY/Resources/RoleofIndigenousPeoplesinBiodiversityConservation.pdf>. Accessed on Jan 11th 2018.

company's documents and public information available online; e) review of legislation and court decisions available online; f) review of online reports and documents about cases of human and environmental impacts caused by transnational mining companies, especially on indigenous land, and potash mining.

1. Case description

In September 2010, company Brazil Potash Corp. a.k.a. Brasil Potásio Ltda. announced it was kickstarting a potash salt mining operation in the city of Autazes, between the Madeira and Amazon rivers, called “Amazon Potash Project – Autazes”²⁰⁸. According to the Federal Prosecution Office, “the project, which comprises the construction of a port, an industrial plant, and a road connecting said port and plant, in addition to a pipeline and power conveyance line, is planned to be set up 2.97 km from the Jauary indigenous land and 6.33 km from the Paracuhuba indigenous line, according to IPAAM (Doc. 4)”.²⁰⁹

The city of Autazes holds several tracts of land where ethnic Mura people live. The tracts closest to the mine's future facilities are Jauary, Paracuhuba, and Soares, although the last-name is yet to be marked off. However, several other tracts of indigenous land such as Guapenu, São Felix, Murutinga, and others surround the future facilities and are home to Mura communities. According to the Federal Prosecution Office, “the city of Autazes encompasses over 20 indigenous tracts of land officially

²⁰⁸ According to Brazilian Public Civil Action no. 0019192-92.2016.4.01.3200. Available at <https://processual.trf1.jus.br/consultaProcessual/processo.php?proc=00191929220164013200&secao=AM&pg=1&enviar=Pesquisar>

²⁰⁹ According to Brazilian Public Civil Action no. 0019192-92.2016.4.01.3200

protected or currently being marked off. There are also another four applications to have other indigenous land marked off”.²¹⁰

The city of Autazes is located 120km southeast of Manaus, the state capital of Amazonas. Two types of landscapes prevail in the Amazon: dry land and floodplains. Autazes is located in one such floodplain that gets periodically overrun by water. Floodplains are areas subject to the ebb and flow of river waters, and the local landscape is constantly changing due to erosion, gravitational mass movements, and sediment deposition. Also, soil fertility is compromised by sheet erosion and farming areas are lost. On the other hand, sediment deposition builds up new areas useful for humans, plants and animals. Therefore, floodplains are subject to antagonistic cyclical processes of construction and destruction brought on by high and low tides.²¹¹

According to Brazil's 2010 Census, the Mura people is over 12.000 strong. Out of that number, 7,769 declared they live outside reservation areas²¹². According to Marta Amoroso²¹³, this people has lived in the area of Baixo Madeira, which comprises the lakes in the Autazes delta, since the 18th century. The Mura make a subsistence living off dry land and floodplain resources. They hunt, fish, gather vegetables, tend to vegetable gardens and orchards, grow manioc, and make their own flour. They refer to themselves as “edge” dwellers. This is a way of living on flood-

210 According to Brazilian Public Civil Action no. 0019192-92.2016.4.01.3200

211 Pinto, Mônica Cortêz. Correlações entre as dinâmicas geomorfológicas e pecuárias na margem esquerda do rio Madeira, município de Autazes (AM). Dissertação (Mestrado em Geociências - Geologia Ambiental) - Universidade Federal do Amazonas. 2016. 130 f. Available at <http://ppggeo.ufam.edu.br/images/assets/Documentos/DissertacaoMonicaCortez.pdf>. Retrieved Mar 16, 2018.

212 IBGE. Censo Demográfico 2010: Características Gerais dos Indígenas - Resultados do Universo. 2010. P. 89.

213 Cited by Bruno Walter Caporrino. Aproximando-se de um Protocolo. Relatório sobre uma preliminar conversa a respeito do direito à consulta prévia, livre, informada e de boa-fé e dos protocolos próprios de consulta. Aldeia Moyray, Povo Mura. Autazes, Amazonas. June 2017

plains that ranges from floating houses on rivers, lakes, and streams to wood and thatch huts in small villages. In their dealings with outsiders, they have taken biracial people, nut gatherers, and rubber tappers into their relationship networks.²¹⁴

In December 2016 at the Amazonas Federal Court, the Federal Prosecution Office (MPF, in Portuguese) filed Public-Interest Civil Action no. 0019192- 92.2016.4.01.3200 against company BRASIL POTÁSSIO LTDA., INSTITUTO DE PROTEÇÃO AMBIENTAL DO ESTADO DO AMAZONAS – IPAAM (the Amazonas state environmental protection institute), DEPARTAMENTO NACIONAL DE PRODUÇÃO MINERAL – DNPM (the national department for mining), and FUNDAÇÃO NACIONAL DO ÍNDIO – FUNAI (the national foundation for indigenous people).

According to the MPF, the company obtained Preliminary Permit no. 54/15 improperly issued by IPAAM and authorizing the company to conduct environmental viability studies regarding sylvinitite (a source of potash) mining and the construction of roads and a port in the city of Autazes. The MPF stated the Environmental Impact Study carried out by IPAAM classes the activity as one of “exceptional” size and points out the potential negative impacts on land and water animals are “significant,” which requires authorization from the federal environmental licensing agency instead of a state permit.

Additionally, the DNPM granted mining survey authorizations that encompass the Jauary and Paracuhuba indigenous land and consequently extend to surrounding areas and other local traditional communities. Even so, no prior, free, and informed consultation with the indigenous and traditional communities consultations were held as required by ILO

²¹⁴ Bruno Walter Caporrino. Aproximando-se de um Protocolo. Relatório sobre uma preliminar conversa a respeito do direito à consulta prévia, livre, informada e de boa-fé e dos protocolos próprios de consulta. Aldeia Moyray, Povo Mura. Autazes, Amazonas. June 2017.

Convention no. 169 when such communities are to be directly impacted by a project. Given the DNPM permit allowed mining surveys to take place even on indigenous Jauary land, the company not only started prospecting throughout the area but also dug into a cemetery within this community. Community members and leaders complain about a lack of information on the project, about leaders getting kickbacks from company officials and local politicians to side with the project, and about being pressed into selling small land lots surrounding the mine.²¹⁵

Following the filing, at a hearing held in March 2017 the parties reached an agreement and the judge presiding over the case set a six-month deadline “for the company to start the consultation process with the Mura indigenous people (and their approximately 32 villages) and traditional riparian communities as per ILO Convention 169.” Additionally, the company was banned from doing anything to influence or sway indigenous leaders.

At a meeting held on February 20 to 22, 2018, at the Murutinga village, the Mura communities living in the area decided to draw up a general consultation protocol to be used both in this and future consultations. A draft protocol has been submitted by anthropologist Bruno Caporrino and is currently being discussed by Mura community members.

2. Mining: operations, risks, and negative impacts

2.1. General aspects of potash mining

215 According to Brazilian Public Civil Action no. 0019192-92.2016.4.01.3200; Bruno Walter Caporrino. *Aproximando-se de um Protocolo*

Today, natural potash deposits across the world are still predominantly extracted in solid form from conventional underground mines, which typically require at least five to seven years to build. Within the Central Amazon Basin being studied (Autazes area), the sylvinite has been dated back to the Lower Permian.²¹⁶

As for the main risks posed by potash mining, the greatest one is the possibility water from underground sources may flood the mine. Potash mines throughout the world have to deal with uncontrolled brine inflow²¹⁷. Flooding of a shallow potash mine with thick deposits (typical of Perm areas) may lead to a sinkhole opening up and making mine recovery nearly impossible.²¹⁸

Adverse environmental impacts may occur at all mining phases: exploration, evaluation, planning, construction, extraction, storage, transport, beneficiation, and waste treatment. These impacts primarily affect water, the air, and soil.

2.1.1. Water

Large volumes of water are usually required by mining and beneficiation activities. Particularly during extraction, “water inflow is a common problem where open pits and underground openings intersect aquifers”²¹⁹. Generally, mining companies pump water from the excavations or from nearby wells to maintain a dry, safe, and efficient

216 The Permian period lasted from 299 to 251 million years ago and was the last period of the Paleozoic era. Available at: <http://www.ucmp.berkeley.edu/permian/permian.php>.

217 United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 24.

218 Whyatt, Jeff, Floyd Varley, *Catastrophic Failures of Underground Evaporite Mines*, Proceedings of the 27th International Conference on Ground Control in Mining, 2001.

219 United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p.19.

operating environment²²⁰, which may lead to the lowering of the surrounding water. Beneficiation operations also consume large quantities of fresh water for processes such as washing²²¹ and flotation²²². This water consumption may lead to a fall in the level of the water table, affecting the surrounding ecosystem.²²³

Water quality may be affected by the release of salt and other contaminants in process water²²⁴. Specifically, excavation activities may contaminate surface water through the release of fines from operationsopen in the soil, dumping²²⁵ and piling up²²⁶ of waste and refuse, as well as from the facilities used for their disposal. Excavations may also release or leak brine and potash ore into surface and ground water²²⁷, along with

220 This process is called “Dewatering”. United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p.56.

221 “Washing” is the removal of waste from a mixture, leaving the water ready in the original solution. Source: <http://www.umich.edu/~chemh215/W13HTML/SSG5/ssg5.4/washing.html>.

222 “In ore beneficiation, flotation is a process in which valuable minerals are separated from worthless material or other valuable minerals by inducing them to gather in and on the surface of a froth layer.” Available at: <http://www.cpchem.com/bl/specchem/en-us/Pages/Introduction-toMineralProcessing.aspx>. United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p.25.

223 United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p.25.

224 “Process water” is water used in the chemical extraction of metals and commonly contains process chemical products. Available at: <http://www.miningfacts.org/Environment/What-are-the-water-quality-concerns-at-mines-/>.

225 “The overburden of waste and uneconomic mineralized rock is required to be removed to mine the useful mineral resource in a surface mining operation. In this process, a dump is formed casting the waste material and dumping it nearby. The dump so formed is known as mine waste dump. Available at: <https://www.iitbhu.ac.in/faculty/min/rajesh-rai/NMEICT-Slope/Pdf/12%20Mine%20Waste%20dumps%20and%20tailing%20dams.pdf>.

226 “Spoil piles are excavated materials consisting of topsoil or subsoils that have been removed and temporarily stored during the construction activity.” Available at: https://www.michigan.gov/documents/deq/deq-wb-nps-sp_250905_7.pdf.

227 This type of leak creates liquid waste. United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*,

the weathering of overburden contaminants susceptible to leaching²²⁸. Contaminants may include clay fines, chemical reagents, sulfates, salt, and magnesium chloride²²⁹. Water may be further contaminated by dust from vehicle traffic²³⁰. Finally, water pollution often needs to be managed for decades, if not centuries, after mine closure²³¹.

2.1.2. Air

Effects on air quality tend to be of a localized nature and are largely related to the generation and emission of dust particulates by blasting, excavation and equipment movement or exhaust gases and particulates from engines²³². Companies generate dust from road traffic, during loading and unloading operations, at conveyor transfer points, and during the stacking of stockpiles and reclamation operations²³³. Dry processing operations may generate other significant quantities of dust during operations such as crushing, grinding, compaction and drying²³⁴. Exhaust

Paris, December 2001, p.33.

228 Stemming from overburden and processing wastes, such leaching may be toxic. United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p.2. For more information: United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p.15.

229 United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p.33.

230 United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p.24.

231 MiningWatch Canada, Mining in Remote Areas - Issues and Impacts, Environmental Mining Council of British Columbia, May, 2001, p. 6.

232 United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p.21.

233 United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p. 22-23.

234 United Nations Environment Programme & International Fertilizer Industry Association, Environmental Aspects of Phosphate and Potash Mining, Paris, December 2001, p. 25.

emissions from vehicle engines, electrical power generation and product dryers may contain greenhouse gases such as carbon dioxide (CO₂) and other gases such as nitrogen oxides (NO_x).²³⁵

2.1.3. Soil

Companies may disturb the land surface and sub-surface by activities such as the extraction of ore, the deposition of overburden, the disposal of beneficiation wastes, and the subsidence (collapse) of the surface²³⁶. These activities could result in wide range of potential impacts on the land, geological structure, topsoil, aquifers and surface drainage systems. Additionally, the removal of vegetation may affect the hydrological cycle, wildlife habitat and biodiversity of the area.²³⁷

The major issue created by underground mining methods²³⁸ is surface subsidence. This is induced by the removal of extensive flat-lying ore deposits, followed by the subsequent collapse of overlying rock during excavation and extraction activities²³⁹. Instead, some minor envi-

²³⁵ United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 26.

²³⁶ Surface subsidence in mining can be defined as the “movement of the surface of the soil as a result of readjustment of overburden due to the collapse and failure of underground operating mine excavation. Surface subsidence features usually take the shape of craters or valleys.” Source: <http://www.dep.state.pa.us/msi/technicalguidetoms.html>. United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 15.

²³⁷ United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 15.

²³⁸ Conventional mechanized underground mining operations are the most widely used method to extract potassium ore. Potash’s plans for Brazil is to “mine 8.5 Mtpa of ROM ore using conventional room and pillar methods” which, as explained in the Introduction, are typical underground mining systems. These underground mining systems are used to obtain potassium ore from deeply buried marine potash deposits.

²³⁹ United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 17.

ronmental effects may be associated with the disposal of rock removed to access the orebody. In some instances, surface subsidence may alter river and stream drainage patterns and disrupt overlying aquifers²⁴⁰. The degree of subsidence depends on factors such as orebody thickness and geometry, the thickness of the overlying rock and the amount of ore recovered²⁴¹. Where subsidence occurs, there is potential for damage to overlying buildings or infrastructure.²⁴²

2.1.4. Waste

Like other mining activities, potash mining generates large amounts of waste.²⁴³ Such waste is primarily sodium chloride (NaCl), often times stored in open locations near the mines and result in artificial mountains called “mine tailings”²⁴⁴. Although companies employ management techniques, such as brine collectors, salt tailings may be dissolved by rainfall and humidity²⁴⁵ and these salts usually escape from collection and reten-

²⁴⁰ United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 18.

²⁴¹ United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 18.

²⁴² To avoid safety risks and property damage, close coordination, communication and a well-defined system for reporting, repairing damage or compensation is therefore required between the company, relevant government bodies and communities.

²⁴³ “The beneficiation of potash produces wastes such as: 1) Tailings consisting largely of impure salt (NaCl) with smaller amounts of other minerals such as anhydrite; 2) Slimes consisting of insoluble fines such as clay and dolomite; 3) Brines containing salt or magnesium chloride.” United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 24.

²⁴⁴ Gorostiza Langa, S., *Potash extraction and historical environmental conflict in the Bages region (Spain)*, 2014, available at https://rua.ua.es/dspace/bitstream/10045/38419/3/Investigaciones_Geograficas_61_01.pdf.

²⁴⁵ Canedo Argüelles, M., Grantham, T.E., Perre e, I., Rieradevall, M., Cespedes-Sanchez, R., Prat, N., *Response of stream invertebrates to short-term salinization: a mesocosm approach*, *Environmental Pollution* n. 166, 2012, pp. 144-151.

tion infrastructures²⁴⁶. Hence, large quantities of these salts end up in streams and rivers close to potash mining areas.²⁴⁷

Given river organisms are adapted to freshwater, increased salt concentrations caused by potash mining waste have the potential to significantly change river ecosystems.²⁴⁸ In general, studies suggest that potash mining has the potential to significantly change the biological structures of nearby rivers and streams.²⁴⁹ Salt concentration changes may rapidly increase the concentrations of bacteria and, ultimately, alter the composition of the invertebrate community.²⁵⁰ As a result, exposure to high levels of contaminants adversely impacts aquatic wildlife.²⁵¹

Additionally, sedimentation can damage or destroy fish habitat, reduce the number of organisms, and bury aquatic vegetation on which fish feed.²⁵² Sedimentation can also clog and damage fish gills and ultimately destroy spawning areas.²⁵³

²⁴⁶ Gorostiza Langa, S., Potash extraction and historical environmental conflict in the Bages region (Spain), 2014, available at https://rua.ua.es/dspace/bitstream/10045/38419/3/Investigaciones_Geograficas_61_01.pdf.

²⁴⁷ Miguel Canedo-Argüelles, Sandra Brucet, Sergi Carrasco, Núria Flor-Arnau, Marc Ordeix, Sergio Ponsa, Eckhard Coring, Effects of potash mining on river ecosystems: An experimental study, *Environmental Pollution* n. 224, 2017, p. 760.

²⁴⁸ Miguel Canedo-Argüelles, Kefford, B.J., Piscart, C., Prat, N., Schafer, R.B., Schulz, C.J., Salinisation of rivers: an urgent ecological issue, *Environmental Pollution* n. 173, 2013, pp. 157-167.

²⁴⁹ Miguel Canedo-Argüelles, Sandra Brucet, Sergi Carrasco, Núria Flor-Arnau, Marc Ordeix, Sergio Ponsa, Eckhard Coring, Effects of potash mining on river ecosystems: An experimental study, *Environmental Pollution* n. 224, 2017, p. 768.

²⁵⁰ Miguel Canedo-Argüelles, Sandra Brucet, Sergi Carrasco, Núria Flor-Arnau, Marc Ordeix, Sergio Ponsa, Eckhard Coring, Effects of potash mining on river ecosystems: An experimental study, *Environmental Pollution* n. 224, 2017, p. 768.

²⁵¹ Miguel Canedo-Argüelles, Sandra Brucet, Sergi Carrasco, Núria Flor-Arnau, Marc Ordeix, Sergio Ponsa, Eckhard Coring, Effects of potash mining on river ecosystems: An experimental study, *Environmental Pollution* n. 224, 2017, p. 768.

²⁵² MiningWatch Canada, Mining in Remote Areas - Issues and Impacts, Environmental Mining Council of British Columbia, May, 2001, p. 6.

²⁵³ MiningWatch Canada, Mining in Remote Areas - Issues and Impacts, Environmental Mining Council of British Columbia, May, 2001, p. 6.

Companies employ a wide variety of waste disposal methods – some of which are extremely harmful to the environment - including: discharge of liquid wastes such as brine, tailings, effluents or clay fines into rivers and oceans;²⁵⁴ stacking sand and salt tailings; retention of wastes such as brines, sand tailings, magnetite tailings, clays and process water in dams or ponds for storage, settling and clarification; backfilling of solid and liquid wastes into mined-out underground openings; deep well injection of brines.²⁵⁵

3.4. Mining and human impacts in Latin America and The World

In Latin America, after a period when the exports of ore mined from the continent were one of the most important sources of foreign capital flowing into the region, the price of metals started dropping in 2015 without the “prosperity” era of exports having meant growth for national companies or significantly contributed towards the diversification of the continent’s economies.²⁵⁶ Instead, metal mining is restricted to limited physical locations and has immediate effects on the people living in those mining areas. Paradoxically, while it boosts economic development, mining causes a host of negative environmental, social, cultural, and human impacts – which are oftentimes neglected.

The Inter-American Commission on Human Rights has found that extraction, exploration, and development projects often impact land and territories historically occupied by indigenous peoples and commu-

254 This may be accompanied by treatment to remove contaminants.

255 United Nations Environment Programme & International Fertilizer Industry Association, *Environmental Aspects of Phosphate and Potash Mining*, Paris, December 2001, p. 28.

256 COMISSÃO ECONÔMICA PARA AMÉRICA LATINA E O CARIBE (CEPAL). *O Investimento Estrangeiro Direto na América Latina e no Caribe*. Nações Unidas, 2016. Available at: < <http://www.cepal.org/ptbr/publicaciones/40215-o-investimento-estrangeiro-direto-america-latina-caribe2016-documento>>. Retrieved: Nov 5, 2017.

nities. Said locations usually hold vast economic potential, albeit one in stark contrast with the lack of political influence that indigenous peoples (many times living in extreme poverty) wield over the other players involved in mining projects.²⁵⁷

While on the one hand mining activities remain important for the economic development strategies of several countries worldwide,²⁵⁸ on the other hand the protection of indigenous rights has been under constantly at risk²⁵⁹ (OCMAL, 2016). In such backdrop, the “Map of Mining Conflicts, Projects and Companies in Latin America” recorded an alarming number: 205 conflicts in Latin America caused by mining activities.²⁶⁰

Map 1. Mining conflicts in Latin America²⁶¹

²⁵⁷ COMISSIÓN INTERAMERICANA DE DERECHOS HUMANOS (CIDH). Pueblos indígenas, comunidades afrodescendientes y recursos naturales: protección de derechos humanos en el contexto de actividades de extracción, explotación y desarrollo. OEA, 2015.

²⁵⁸ COMISSÃO ECONÔMICA PARA AMÉRICA LATINA E O CARIBE (CEPAL). O Investimento Estrangeiro Direto na América Latina e no Caribe. Nações Unidas, 2016. Available at: <http://www.cepal.org/ptbr/publicaciones/40215-o-investimento-estrangeiro-direto-america-latina-caribe2016-documento>.

²⁵⁹ OBSERVATORIO DE CONFLICTOS MINEROS DE AMERICA LATINA (OCMAL). Conflitos Mineros em América Latina: Extracción, Saqueo y Agresión. [S.I.]: OCMAL, 2016.

²⁶⁰ According to data collected since 2007 by OCMAL, Peru is at the top with 39 conflicts recorded, followed by Chile and Mexico with 37 conflicts (each), Argentina, with 37, and Brazil with 20 conflicts.

²⁶¹ Ej Atlas [Environmental Justice Atlas]. Map of mining conflicts in Latin America. Available at: <https://ejatlas.org/featured/mining-latam>.



The orange dots represent conflicts related to mining operations²⁶², many of which involve indigenous peoples and communities²⁶³. In the

²⁶² To illustrate the extent of conflicts between mining companies and indigenous people, it should be noted that across the world activists connected to causes related to mining face the harshest degrees of violence. There were 42 deaths in 2015 alone. (GLOBAL WITNESS, 2016).

²⁶³ OBSERVATORIO DE CONFLICTOS MINEROS DE AMERICA LATINA (OCMAL). Conflictos Mineros em América Latina: Extracción, Saqueo y Agresión. [S.I.]: OCMAL, 2016.

course of the 19th and 20th centuries, mining has increasingly forcing indigenous peoples out of their ancestral without their consent and contributing towards the irreversible destruction not only of their cultures but also of the environment.²⁶⁴

Generally speaking, mining has considerable impact on employability, health, access to food and water, access to land, land conflicts, and social cohesion. All that also has a significant impact on indigenous peoples.

One of the most appealing arguments used by mining companies is that they create jobs, thereby benefitting communities. However, such jobs are short-term because minerals are non-renewable resources and once an ore body is depleted, mines shut down.²⁶⁵ Mines may also shut down temporarily and lay off their workers when metal prices fall in the international market. Thus, mining operations do not necessarily provide long-term economic stability.²⁶⁶ Another issue is that jobs not always fit the community's profile and may be seen as unappealing for a variety of reasons, such as working hours, discrimination, or working conditions.²⁶⁷ Even when they are appealing, many mining jobs require highly skilled or specially trained employees, and if members of nearby

264 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, pp. 49-67.

265 MiningWatch Canada, *Mining in Remote Areas - Issues and Impacts*, Environmental Mining Council of British Columbia, May, 2001, p. 11.

266 MiningWatch Canada, *Mining in Remote Areas - Issues and Impacts*, Environmental Mining Council of British Columbia, May, 2001, p. 11.

267 Susan Wismer, *The Nasty Game: how environmental assessment is failing aboriginal communities in Canada's north*, in *Alternatives*, 22 n.4, October-November, 1996, p. 12 : "The nature of the work, its scheduling into shifts that are often at least two weeks in length, the distance of mine sites from home communities, and the need for a consistent and reliable workforce that does not take time off on a seasonal basis, creates a situation in which the benefits of employment in the mines are often offset by the costs of social and family disruption and loss of opportunities to participate adequately in community life."

communities do not have the required skills, the workforce must come from outside the region.²⁶⁸

In any way, mine work causes a host of physical and mental issues, including cancer and sexually transmitted diseases. The likelihood of developing cancer increases the longer someone has worked in a mine, whether they have worked in more than one mine (that is, where different minerals are extracted), and whether they smoke.²⁶⁹

In potash mines, studies show the levels of exposure to respirable dust, inhalable dust,²⁷⁰ diesel particulate matter (“elemental carbon”), nitrogen monoxide, nitrogen dioxide, and carbon dioxide are very high for all components, and especially in production areas.²⁷¹ Finding a single especially relevant component is not possible, given they are a highly correlated mixture in all workplaces. The studies report that assessment campaigns were held under conditions that can be regarded as state of the art and representative for the underground mining industry.²⁷²

In addition to mining-related physical illnesses, mining also takes a toll on mental health. A 1988 report documents the impact from “fly-in” mining (that is, where workers are taken to remote areas to work and live for a fixed number of days) on a miner’s physical and mental health.

268 MiningWatch Canada, *Mining in Remote Areas - Issues and Impacts*, Environmental Mining Council of British Columbia, May, 2001, p. 11.

269 Canadian Occupational Safety, Panel makes connection between hard-rock mining and cancer, v.32, n. 4, 1994, p. 8.

270 “Inhalable dust is the fraction of airborne material which enters the nose and mouth during breathing and is therefore liable to deposition anywhere in the respiratory tract. (...) Respirable dust is that fraction that penetrates to the deep lung where gas exchange takes place”
Source: https://www.ohlearning.com/Files/Extracted_Files/53/KA09%20V2-0%2022Oct10%20W201%20Section%206%20day%202%20Measurement.ppt.

271 Dahmann, D., Monz, C. & Sönksen, *Exposure assessment in German potash mining*, International Archives of Occupational and Environmental Health, 2007, p. 106.

272 Dahmann, D., Monz, C. & Sönksen, *Exposure assessment in German potash mining*, International Archives of Occupational and Environmental Health, 2007, p. 107.

The study concluded that separation from family and friends and the inability to get away from work sites combine to create stress that may lead to psychological depression and suicide.²⁷³

There are also indirect health risks posed by mining operations: the prevalence of sexually transmitted disease, the loss of croplands and the depletion of water resources which can lead to decreased food supply, malnutrition, and a greater risk of infectious diseases. More specifically, “many of the social problems are caused by the sudden influx of people from other areas or countries to operate the mine. When the companies bring hundreds of single men into local communities, it gives rise to bars, brothels, alcoholism, prostitution,²⁷⁴ and an upsurge in sexually transmitted diseases. An increase in crime is almost unavoidable, including assaults, robberies, and rape. The community’s social fabric breaks down”.²⁷⁵

The health effects can continue long after the end of mining operations, given they may affect people’s access to food and water, as mentioned above.

The movement of communities to accommodate industrial-scale mining operations and the denial of access to sites traditionally used for subsistence farming can have an adverse impact on people’s livelihoods and their right to an adequate standard of living, especially the rights to food and water.²⁷⁶ This is a particular issue for rural communities that

²⁷³ Keith Storey & Mark Shrimpton, “Fly-In” Mining and Northern Development Policy: The Impacts of Long-Distance Commuting in the Canadian Mining Sector, Impact Assessment, 6 n. 2, pp. 127-136

²⁷⁴ Carlos Zorrilla, Protecting your community from mining and other extractive operations, A Guide for Resistance, 2nd edition, 2016, March 17, 2017, p. 10.

²⁷⁵ Carlos Zorrilla, Protecting your community from mining and other extractive operations, A Guide for Resistance, 2nd edition, 2016, March 17, 2017, p. 9.

²⁷⁶ UN Committee on Economic, Social and Cultural Rights, General Comment n. 15, paras 1 and 6: “General Comment No. 12 (1999): The right to adequate food (art. 11)”, UN Doc E/C.12/1999/5, May, 12, 1999, paras. 1 and 4

rely on subsistence farming and need adequate land and water to produce the food on which their families and livelihoods depend.²⁷⁷ Additionally, when hazardous chemicals that are used in the gold recovery process leak into rivers, groundwater and soil, this can have potentially severe impacts on local communities, aquatic species and livestock.²⁷⁸ Mining operations can therefore have an adverse impact on the right to water, either by affecting the water supply to local communities or by polluting local rivers and groundwater. Where pollution of the local rivers, groundwater and soil affects aquatic species and livestock, this can also have an adverse impact on the right to food.

Large-scale mining requires enormous amounts of water, and often depletes, diverts, or poisons water supplies in the area, undermining livestock grazing and farming ²⁷⁹ and compromising people's access to food and drinking water. In the last few years, there have been numerous conflicts over access to drinking and irrigation water²⁸⁰. Heavy metals, transported through rivers and underground water, can easily poison

²⁷⁷ Amnesty International, "The Rights to Work and to an Adequate Standard of Living", Mining and human rights in Senegal. Closing the gaps in protection, May 2014, p. 30. See also <https://www.worldwildlife.org/places/amazon>.

²⁷⁸ Amnesty International, *Injustice Incorporated: Corporate Abuses and the Human Right to Remedy* (2014), Amnesty International Index: POL 30/001/2014, pp. 65-79.

²⁷⁹ The Amazon communities do not cultivate fruits and vegetables to any large degree, instead they rely on hunting and gathering. "Considering the forests' plentiful wildlife, (...) everything from fish, birds, wild boars, even insects and bugs are at hunters' disposal." As for fish, the paiche, the pirarucu, the tambaqui, the jaraqui and the surubim the main source of protein in the Amazonian diet. As for meat, "In Brazil, maniçoba, is a dish made from the leaves of the manioc plant (which need to be simmered for seven days to remove poisonous hydrocyanic acid) combined with various pieces of bacon, sausage and other types of salted pork. Perhaps the most famous dish of the Brazilian Amazon is the distinctive pato no tucupi (duck served in exotic-tasting tucupi sauce)". Source: <https://www.rainforestcruises.com/jungle-blog/what-do-people-eat-in-the-amazon>.

²⁸⁰ For more information in mining impacts and successful resistances, see Appendix C, Carlos Zorrilla, *Protecting your community from mining and other extractive operations, A Guide for Resistance*, 2nd edition, 2016, March 17, 2017, p. 44.

drinking water, crops, seafood and fishing, not only nearby but also hundreds of kilometers away.²⁸¹

Although governments are allowed to acquire land on account of “public interest” and evict people, under international human rights covenants the states must ensure the protections of due process, consult with those affected, give them an opportunity to suggest alternatives to the eviction, ensure that adequate alternative housing, resettlement or access to productive land is available, and provide compensation and legal aid²⁸². Failure to ensure these safeguards may result in forced evictions. The UN Committee on Economic, Social and Cultural Rights defines forced eviction as “the permanent or temporary removal against their will of individuals, families and/or communities from the homes and/or land which they occupy, without the provision of, and access to, appropriate forms of legal or other protection.”²⁸³ Under international human rights covenants, evictions may be carried out solely as a last resort when all feasible alternatives to the eviction have been explored and the proper procedural protections are in place, such as free, prior, informed consent protocols and consultations with the affected communities. Governments must also ensure no one is rendered homeless or vulnerable to the violation of other human rights as a result of an eviction.

²⁸¹ Carlos Zorrilla, *Protecting your community from mining and other extractive operations*, A Guide for Resistance, 2nd edition, 2016, March 17, 2017, p. 9.

²⁸² UN Committee on Economic, Social and Cultural Rights: “General Comment 4: The right to adequate housing (Art. 11 (1) of the Covenant)” (13 December 1991) UN Doc E/1992/23; “General Comment 7: The right to adequate housing (art. 11.1 of the Covenant): forced evictions” (20 May 1997) UN Doc E/1998/22, annex IV (CESCR, General Comment 7), each available at: tbinternet.ohchr.org/_layouts/treatybodyexternal/TBSearch.aspx?TreatyID=9&DocTypeID=11.

²⁸³ UN Committee on Economic, Social and Cultural Rights, General Comment n. 7: The right to adequate housing (Article 11.1 of the Covenant on Economic, Social and Cultural Rights) - forced evictions, (Sixteenth session, 20 May 1997), UN Doc. E/1998/22, Annex IV, para. 3.

As explained above, industrial mining operations require vast amounts of land and resources. In general, rural communities that live on land to which mining licenses or concessions apply have no security of tenure and are vulnerable to being forcibly evicted from their land to make way for industrial mining operations. For indigenous peoples, who are deeply connected to their land, moving away may spell the death of their cultures. Additionally, “land trafficking may occur when an extractive company offers to buy land in order to obtain access to its concessions, or as a strategy to win over potential opponents. This also leads to the disintegration of communities, because once their land is sold, the former owners usually leave the area”.²⁸⁴

Communities and indigenous groups usually have ways of coping with social or natural disturbances or stress. These coping mechanisms include group solidarity, trust of one’s leaders and neighbors, unwritten social rules, strong family ties, cultural identity, and strong, committed leaders able to guide the community.²⁸⁵ However, companies may deliberately try to weaken a community and its ability to organize effectively against them.²⁸⁶ “A company may attempt to create divisions by spreading false information about the project, buying off certain community members with gifts and well-paid special jobs, discrediting the leaders or organizations that question the mining project, or co-opting and/or intimidating leaders into supporting the project”.²⁸⁷

284 Carlos Zorrilla, *Protecting your community from mining and other extractive operations, A Guide for Resistance*, 2nd edition, 2016, March 17, 2017, p. 9.

285 Carlos Zorrilla et al., *Protecting Your Community Against Mining Companies and Other Extractive Industries, A guide for Community Organizers*, 2009, p. 5.

286 Carlos Zorrilla et al., *Protecting Your Community Against Mining Companies and Other Extractive Industries, A guide for Community Organizers*, 2009, p. 5.

287 Carlos Zorrilla, *Protecting your community from mining and other extractive operations, A Guide for Resistance*, 2nd edition, 2016, March 17, 2017, p. 9.

If companies face stiff opposition from the community, they may resort to “underhanded measures, such as paying local people to falsely accuse resistance leaders of committing crimes”. In some cases, companies employ thugs or paramilitary forces to intimidate, threaten, injure or even kill people. The fact that a company is owned partly or wholly by the state may also be a potentially dangerous factor when government structures are corrupt or lack democratic legitimacy. These States may use their security apparatus and even the army against the population.

3. The mining company: identification and operations

3.2. Identification of company Brasil Potássio Ltda.

Company Brazil Potash Corp., a.k.a. Potássio do Brasil Ltda., belongs to Canadian investment bank Forbes & Manhattan (F&M).¹¹⁹ F&M is a leading private merchant bank²⁸⁸ with a global focus on the resource-based sector, Technology, Telecommunications and on-line gaming. F&M is headquartered in Toronto, Ontario, Canada with offices, operations and assets across the globe”.²⁸⁹

²⁸⁸ According to the company Capital Merchant Bank’s official website, “Merchant Banking is the process of acting as Principal and/or Agent in project financing, mergers or acquisitions, and/or advising clients in the “structuring” of the funding needed for their project, and/or assisting them in their negotiations for the realization of a project”. Available at <http://www.capitalmbk.com.br/a/page.php?c=14>. Retrieved Jan 10, 2018.

²⁸⁹ “Forbes & Manhattan is a leading private merchant bank with a global focus on the resource-based sector, Technology, Telecommunications and on-line gaming. F&M is headquartered in Toronto, Ontario, Canada with offices, operations and assets across the globe”. Available at <http://forbesmanhattan.com>. Retrieved Jan 10, 2018.

 <p>Brazil Potash</p> <p>USD 460 million</p> <p>Advanced stage development potash project in Irati with Feasibility Study and Preliminary License</p> <p>Forbes&Manhattan</p> <p>Ongoing</p>	 <p>Belo Sun</p> <p>Mkt Cap – CAD 460 million</p> <p>Gold mine being developed in Para State. Feasibility study completed and current mineral resource of 7.6 Moz</p> <p>Forbes&Manhattan</p> <p>Ongoing</p>	 <p>Irati Energy</p> <p>Mkt Cap – CAD 95 million</p> <p>Oil shale company with projects located in South Brazil. 671 menob of best estimate resource and PEA completed</p> <p>Forbes&Manhattan</p> <p>Ongoing</p>	 <p>Aguia Resources</p> <p>Mkt Cap – CAD 45 million</p> <p>Phosphate mine being developed in Rio Grande do Sul with PEA recently completed</p> <p>Forbes&Manhattan</p> <p>Ongoing</p>	 <p>Sulliden Gold Corp.</p> <p>Rio Alto & Sulliden Merger \$66M on closing</p> <p>F&M acquired Sulliden in March 2009 and resolved long-standing disputes regarding title. Current resource of 3.4 Moz Au (Ag co prod)</p> <p>Forbes&Manhattan</p> <p>Sold 2014</p>	 <p>Desert Sun Mining</p> <p>Sold for USD 750 million</p> <p>Acquired a controlling position in Desert Sun in 2002. Developed Jordan mine to near production and sold 4 years later for \$750m</p> <p>Forbes&Manhattan</p> <p>Sold 2006</p>
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Across the world, F&M's portfolio includes several companies operating in the mining, agriculture, energy, financial, and technology/online gaming industries and doing business in Canada, Brazil, the Dominican Republic, Colombia, the Philippines, Namibia, South Africa, Spain, Romania, and Ukraine.²⁹⁰ According to a document for investors, F&M has been building and operating mines in Brazil since 2002. Today, the company controls four mining, agricultural, and energy projects in the country: Brazil Potash, Belo Sun, Irati, and Aguia.²⁹¹

3.5. Forbes & Manhattan (F&M) operations in Brazil and The World

In a report covering the period from August 2012 to August 2014, RepRisk ESG Business Intelligence²⁹² revealed the 10 most controversial

²⁹⁰ Available at <http://www.forbesmanhattan.com/English/portfolio/fm-portfolio/fm-groupat-a-glance/default.aspx>. Retrieved Jan 10, 2018.

²⁹¹ Brazil Potash. Extract. Nourish. Flourish. 2017. P. 21. Available at <https://www.brazilpotash.com/investors/>. Retrieved Jan 10, 2018.

mining projects in the world. The report “analyzes documented negative incidents, criticism and controversies related to the 10 mining projects that received the highest RepRisk Index (RRI). The RRI is RepRisk’s proprietary algorithm that captures criticism and quantifies a project’s exposure to controversial ESG issues”.²⁹³ One such project is the South African “Aviemoore Anthracite Coal Project” mine operated by F&M. According to the report, on October 31, 2012, two workers at the Magdalena and Aviemoore mines in KwaZulu-Natal, South Africa, were allegedly shot dead by the company’s security personnel after workers had been on strike for two weeks demanding higher wages. On the day of the shooting, the security guards had allegedly chased around 100 strikers into the nearby bushes. The day after the shootings, police used tear gas to disperse 200 protesters who had blocked a main road near the mines.²⁹⁴ This event was widely shared by the international media.²⁹⁵

Yamana Gold, a gold mine in operation in the city of Jacobina, state of Bahia, is also run by F&M.²⁹⁶ In the case of this project, the Pastoral Commission of the Land reports the forced eviction of 112 families from their homes.²⁹⁷ In April 2017, after an inspection, the Bahia State Prosecution Office (MPE) detected liquid waste from gold mining in the rural area of Jacobina “in locations close to homes, small farms, and public squares and where rivers run through to fill the reservoirs that supply drinking water to the city.” In the case of the Itapicuruzinho river, whose samples would be later analyzed by EMBASA, the residues were visible and the water looked “yellowish, muddy” on the riverbed. The MPE recommended the company to stop supplying water from sources affected by mining.²⁹⁸

²⁹⁷ Available at <http://cptba.org.br/2011/09/30/mineracao-yamana-gold-expulsa-familias-em-jacobina/>. . Retrieved Jan 10, 2018.

²⁹⁸ Available at <http://agenciabrasil.ebc.com.br/geral/noticia/2017-04/bahia-apos-denuncia-de-vazamento-de-residuos-empresa-avalia-qualidade-da-agua>. . Retrieved Jan 10, 2018.

Belo Sun is another mine operated by F&B. According to the Instituto Socioambiental, it is poised to become the largest open-pit mine in Brazil and set to retrieve, in case it is implemented, about 60 metric tons of gold in 12 years. Once the mine is shut down, it is going to leave behind two massive piles of chemically active sterile matter which together will cover 346 hectares and contain 504 million metric tons of rocks, without no plans for their removal²⁹⁹. In November 2017, a seminar at Universidade Federal do Pará in Belém, which had been convened to look into the social-environmental impacts from the Canadian mining company's project, was called off because of threats and acts of violence committed by the Mayor, Dirceu Biancardi (from the PSDB party), and a group of supporters brought in from the city of Senador José Porfírio, where the mining company plans to set up shop. According to news reports, Biancardi, an advocate for the mining company, walked into the event opened to the public but his supporters locked the auditorium and shouted the professors down.^{300 301 302} According to the Federal Prosecution Office, on December 6, 2017, the Federal Regional Court of the 1st Region (TRF-1) revoked the construction permit the Canadian mining company had obtained for Belo Sun. The three appellate judges from the 6th Panel later unanimously upheld the decision to put the construction permit for mining company Belo Sun off until it complies with laws on indigenous rights. Such laws require the company to conduct environmental impact studies and hold a process of free, prior, informed consultation with the indigenous communities

299 Available at: <https://www.socioambiental.org/pt-br/noticias-socioambientais/justica-derruba-licenca-de-belo-sun>

300 Available at: <https://g1.globo.com/pa/para/noticia/evento-que-debatia-impactos-ambientais-de-projeto-de-extracao-de-ouro-vira-caso-de-policia-em-belem.ghtml>

301 Available at: <http://amazoniareal.com.br/prefeito-que-defende-mineradora-belo-sun-ameaca-professores-em-seminario-da-ufpa/>

302 Available at: <http://agenciabrasil.ebc.com.br/geral/noticia/2017-11/pesquisadores-denunciam-ameaca-por-criticas-projeto-de-mineracao-no-xingu>

impacted as described in each indigenous people's consultation protocol before the mine is built in Volta Grande do Xingu (PA).³⁰³

3.6. Canada and mining

Canada has a long mining tradition and the country is a worldwide leader in the industry.³⁰⁴ There are more mining companies headquartered in Canada than in any other country in the world. Also, 41% of the largest mining companies operating in Latin America are Canadian³⁰⁵.

According to Sacher,³⁰⁶ Canadian laws regulating mining activities are utterly lax and government officials provide the industry with steadfast backing in an effort to roll out their model beyond the country's borders.³⁰⁷ Additionally, Canada has not ratified the United Nations

303 Available at: <http://www.mpf.mp.br/regiao1/sala-de-imprensa/noticias-r1/trfi-ordena-consulta-previa-a-indigenas-afetados-pela-mineradora-belo-sun-e-mantem-suspensao-do-licenciamento>

304 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, pp. 49-67.

305 Imai, Shin and Gardner, Leah and Weinberger, Sarah, The 'Canada Brand': Violence and Canadian Mining Companies in Latin America (December 1, 2017). Osgoode Legal Studies Research Paper No. 17/2017. Available at SSRN: <https://ssrn.com/abstract=2886584> or <http://dx.doi.org/10.2139/ssrn.2886584>. Retrieved Jan 10, 2018.

306 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, pp. 49-67.

307 "The Canadian government continues to promote the "Canada Brand" by relying on voluntary, non-enforceable Corporate Social Responsibility (CSR) codes to measure company conduct. The two main government offices responsible for CSR are the Office of the Extractive Sector Corporate Social Responsibility Counsellor (CSR Counsellor) and the National Contact Point (NCP) under the Organization of Economic Cooperation and Development (OECD). Neither office conducts investigations, nor do they have the power to sanction companies directly or compensate victims. Their only power is to recommend the withdrawal of Canadian government financial and embassy support. There is no indication that there is any systematic review of company behaviour nor any publicly available information to indicate that the current CSR Counsellor has responded to reports of violence or considered withdrawing Canadian embassy support." Imai, Shin and Gardner, Leah and Weinberger, Sarah, The 'Canada Brand': Violence and Canadian Mining Companies in Latin America (December 1, 2017). Osgoode Legal Studies Research Paper No. 17/2017. Available at SSRN: <https://ssrn.com/abstract=2886584> or <http://dx.doi.org/10.2139/ssrn.2886584>. Retrieved Jan 10, 2018.

Declaration on the Rights of Indigenous Peoples or the ILO Convention 169.³⁰⁸ At the Toronto Stock Exchange, hundreds of multinational companies find the perfect platform for monitoring mining projects across the world³⁰⁹. Although a large number of these projects are free to cause what Sacher calls great-magnitude social-economic externalities, the multinational companies enjoy political³¹⁰, financial and moral³¹¹ support from the Canadian government.

The country has been internationally criticized for failing to supervise the activities of its mining companies. According to “The ‘Canada Brand’: Violence and Canadian Mining Companies in Latin America” report, there have been countless acts of violence associated with Canadian mining projects and involving different types of people.

Violence linked to Canadian mining projects spans a broad geographic range. Of the 14 countries that we studied, deaths occurred in 11; injuries were suffered in 13; and legal complaints, warrants, arrests and detentions were issued in 12. Physical violence was by far most prevalent in Guatemala, which accounted for 27.3% of deaths, 50% of disappearances, 22% of injuries, and 73.3% of instances of sexual violence. By contrast, criminalization and legal complaints were most prevalent in Mexico, which accounted for 42.3% of warrants and legal complaints, and 13.2% of arrests,

308 See the ILO Convention 169 ratification status at: http://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:11300:0::NO::P11300_INSTRUMENT_ID:312314

309 Additionally, under TMX rules companies are not required to disclose information which is not in the interest of stockholders. In Toronto, there have been speculations about mining concessions that have been acquired or which are operated at the cost of untellable devastation. Still, those companies are not held to account. In: William Sacher. *El modelol minero canadiense: saqueo e impunidad institucionalizados*. Acta Sociológica núm. 54, enero-abril de 2010, p. 59.

310 William Sacher. *El modelol minero canadiense: saqueo e impunidad institucionalizados*. Acta Sociológica núm. 54, enero-abril de 2010, p. 60.

311 William Sacher. *El modelol minero canadiense: saqueo e impunidad institucionalizados*. Acta Sociológica núm. 54, enero-abril de 2010, p. 60.

detentions, and charges. It should be noted that Mexico was home to the highest number of mining projects (6) linked to reported violence.³¹²

According to the report, community members opposed to mining and human rights defenders are often targeted victims of violence.³¹³ The report also says that sexual violence is generally under reported. As for protests, the report points out they were common contexts in which violence and criminalization occurred resulting from state and private security force interventions.³¹⁴ The report further mentions that there were many instances in which a company or host state implemented the law in a way that discouraged protest or burdened social leaders opposed to mining with legal proceedings or jail time.³¹⁵

4. Companies' And Governments' Human Rights Responsibilities

4.3. Transnational corporations and barriers against their accountability

Some transnational corporations currently enjoy a power-wielding position over world governments. Walmart, Apple, and Shell are richer than Russia, Belgium, and Sweden. Of the 100 wealthiest governments

312 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, p. 12.

313 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, p. 13.

314 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, p. 17.

315 William Sacher. El modelol minero canadiense: saqueo e impunidad institucionalizados. *Acta Sociológica* núm. 54, enero-abril de 2010, p. 19.

and corporations in the world today, 69 are corporations, many of them mining companies.³¹⁶ The ratio has been abruptly increasing in the last few years.³¹⁷

- 1945: 0 of the 100 top economic entities were corporations; 100 were countries;
- 2013: 47 of the 100 top economic entities were corporations; 53 were countries;
- 2014: 63 of the 100 top economic entities were corporations; 37 were countries;
- 2015: 69 of the 100 top economic entities were corporations; 31 were countries.

In Latin America, transnational mining corporations' operations are oriented to the globalized economic market that extends beyond national borders and where the demand for ore is pressing.³¹⁸ The specific nature of the investment and production process, notably long project durations, extremely high capital requirements and high risk, mean that the vast majority of leading firms are transnational.³¹⁹ A number of re-

316 Global Justice Now. 10 biggest corporations make more money than most countries in the world combined. 2016. Available at <http://www.globaljustice.org.uk/news/2016/sep/12/10-biggest-corporations-make-more-money-most-countries-world-combined>. Retrieved Jan 10, 2018.

317 Global Justice Now. Corporations vs governments revenues: 2015 data. Available at http://www.globaljustice.org.uk/sites/default/files/files/resources/corporations_vs_governments_final.pdf. Retrieved Jan 10, 2018.

318 COMISSIÓN INTERAMERICANA DE DERECHOS HUMANOS (CIDH). Pueblos indígenas, comunidades afrodescendientes y recursos naturales: protección de derechos humanos en el contexto de actividades de extracción, explotación y desarrollo. OEA, 2015.

319 COMISSÃO ECONÔMICA PARA AMÉRICA LATINA E O CARIBE (CEPAL). O Investimento Estrangeiro Direto na América Latina e no Caribe. Nações Unidas, 2016. Available at: < <http://www.cepal.org/ptbr/publicaciones/40215-o-investimento-estrangeiro-direto-america-latina-caribe2016-documento>>. Retrieved Nov 5, 2017.

cord-breaking transactions took place in the metal mining sector between 2000 and 2015. Target companies in eight countries accounted for 92% of this total, with Brazil, Chile, Peru and Mexico clearly leading destinations for mergers and acquisitions. On the other hand, the four main purchasers originated in Canada, China, the United States, and the United Kingdom.³²⁰

At the same time transnational corporations create jobs and stir the economy in host countries, many of these companies have been implicated in grave and systematic human rights violations and environmental damage across the world, as seen above. Studies have increasingly shown that, despite them being found guilty for the damage,³²¹ those affected by it hardly ever get to hold them accountable and be properly compensated. This is especially so when abuses are committed outside the country where corporations are headquartered and by their subsidia. In such backdrop, victims face serious obstacles to access justice both in their countries and the companies' countries of origin.³²²

The “corporate veil”, or “separate legal personality”, doctrine is a major barrier to holding parent companies legally accountable for abuses committed by their subsidiaries. This doctrine implies that the liabilities of one member of a corporate group will not automatically be

320 COMISSÃO ECONÔMICA PARA AMÉRICA LATINA E O CARIBE (CEPAL). O Investimento Estrangeiro Direto na América Latina e no Caribe. Nações Unidas, 2016. Available at: < <http://www.cepal.org/ptbr/publicaciones/40215-0-investimento-estrangeiro-direto-america-latina-caribe2016-documento>>. Retrieved Nov 5, 2017.

321 Olivier De Schutter. Rights in action. In: International Federation for Human Right. (FIDH). Corporate Accountability for Human Rights Abuses. A Guide for Victims and NGOs on Recourse Mechanisms. 3rd ed. Paris: FIDH, 2016. P. 7. Available at https://www.fidh.org/IMG/pdf/corporate_accountability_guide_version_web.pdf. Retrieved Jan 11, 2018.

322 Amnesty International. Creating a paradigm shift: Legal solutions to improve access to remedy for corporate human rights abuse. 2017. p. 3. Available at https://business-humanrights.org/sites/default/files/documents/AI_BHRRRC_Elaborating_Solutions_Report_Template_1%20Sep%202017.pdf. Retrieved Jan 11, 2018.

imputed to another merely because one holds shares in the other, given each separately incorporated member of a corporate group is considered to be a distinct legal entity.³²³

Despite the variety of transnational corporations' organization structures, these companies' operations hinge on the legal independence between their subsidiaries and their administrative ties to a controlling center located in another country.³²⁴ Corporations have let a complex management network to be viable and given legal protection to the top hierarchical tiers, which have allowed the emergence of economic organizations the size of which had never been seen before.³²⁵

Additionally, when it comes to mega corporate projects, host countries' interest in drawing economic investments into them makes it easier for parent companies to exert political pressure on underdeveloped countries' institutions, including legal ones, in an effort to shield themselves from legal sanctions.³²⁶

The spread-out nature of these companies and the fact that so far they have been under the jurisdiction of international law merely as subjects of rights (legal persons governed by private international law) make it harder to hold them accountable for damage done by their oper-

323 Amnesty International. Creating a paradigm shift: Legal solutions to improve access to remedy for corporate human rights abuse. 2017. P. 7. Available at https://business-humanrights.org/sites/default/files/documents/AI_BHRRC_Elaborating_Solutions_Report_Template_1%20Sep%202017.pdf. Retrieved Jan 11, 2018.

324 ZUBIZARRETA. Juan Hernández. Las empresas transnacionales frente a los derechos humanos: historia de una asimetría normativa. De la responsabilidad social corporativa a las redes contrahegemónicas transnacionales. Madrid: OMAL, 2009.

325 HOMA - CENTRO DE DIREITOS HUMANOS E EMPRESAS. Novos elementos para o tratado de empresas e direitos humanos da ONU. Juiz de Fora: HOMA, 2017.

326 International Federation for Human Rights (FIDH). Corporate Accountability for Human Rights Abuses. A Guide for Victims and NGOs on Recourse Mechanisms. 3rd edition, 2016. P. 7. Available at https://www.fidh.org/IMG/pdf/corporate_accountability_guide_version_web.pdf. Retrieved Jan 11, 2018.

ations to local people and communities. Private international law is lax with respect to the impunity of parent companies, even when they have violated human rights “with full knowledge of, or at least without ignoring, the conditions under which they are carried out”.³²⁷

Objectively, Amnesty International has listed three critical barriers to remedy in cases of human rights abuses involving multinational companies. The last two may be read as an offshoot of the first:

1. When faced with legal action against human rights violations, parents are still able to hide behind the corporate veil to shirk their responsibility.
2. The forum non conveniens doctrine is still commonly invoked and applied in common law jurisdictions such as Canada and the US, thereby putting off the resolution of legal claims and oftentimes leading said claims to be denied.
3. Few companies today disclose significant information on the actual and potential human rights-related risks and impacts³²⁸.

Transnational corporations’ legal structure enables them to achieve in Latin American countries what they could not do in their countries of origin, in order to maximize profits and avoid liability.³²⁹

³²⁷ International Federation for Human Rights (FIDH). Corporate Accountability for Human Rights Abuses. A Guide for Victims and NGOs on Recourse Mechanisms. 3rd edition, 2016. P. 270. Available at https://www.fidh.org/IMG/pdf/corporate_accountability_guide_version_web.pdf. Retrieved Jan 11, 2018.

³²⁸ Amnesty International. Injustice incorporated: Corporate abuses and the human right to remedy (Index: POL30/001/2014), 2014. Available at: <https://www.amnesty.org/en/documents/pol30/001/2014/en/>. Retrieved Jan 11, 2018.

³²⁹ International Federation for Human Rights (FIDH). Corporate Accountability for Human Rights Abuses. A Guide for Victims and NGOs on Recourse Mechanisms. 3rd edition, 2016. Available at https://www.fidh.org/IMG/pdf/corporate_accountability_guide_version_web.pdf. Retrieved Jan 11, 2018.

3.7. Brazil's international accountability for commercial mining activity impacts on the Mura People

As a UN and OAS member state and signatory of most international treaties on human rights, Brazil has assumed general obligations to respect, protect, and ensure the human rights provided for in international law.³³⁰ Article 2, 1 of the International Covenant on Civil and Political Rights states that such obligations are to be fulfilled “without distinction of any kind, such as race, color, sex, language, religion, political or other opinion, national or social origin, property, birth or other status.”.

The State's obligation to respect means it must abstain from interfering with, preventing, or restricting the exercise of such rights by individuals. Under its obligation to protect, the State must protect individuals and groups against violations of their rights by others, including private actors. The obligation to ensure or implement requires the State to facilitate the exercise of these rights by all.³³¹

Although under international instruments State Parties are only required to fulfill their international obligations, the States must protect people not only against violations by state agents but also from acts committed by individuals or entities - including, therefore, transnational corporations.

The State's failure to fulfill its obligation to protect people and groups from damage caused abroad by the operations of their transnational corporations, especially mining companies, has been pointed out in the analysis of periodic reports submitted by Canada to two

³³⁰ Ministério Público Federal. Manual prático de direitos humanos internacionais. Sven Peterke (Coordenador). Brasília: Escola Superior do Ministério Público da União, 2009. P. 153 e ss.

³³¹ Ministério Público Federal. Manual prático de direitos humanos internacionais. Sven Peterke (Coordenador). Brasília: Escola Superior do Ministério Público da União, 2009.

Committees that make up the universal protection system (UN): the Committee on the Elimination of Racial Discrimination and the Human Rights Committee.³³²

“[...] the Committee encourages the State Party to take appropriate legislative or administrative measures to prevent acts of transnational corporations registered in Canada which negatively impact on the enjoyment of rights of indigenous peoples in territories outside Canada. In particular, the Committee recommends that the State Party explore ways to hold transnational corporations registered in Canada accountable. The Committee requests the State Party to include in its next periodic report information on the effects of activities of transnational corporations registered in Canada on indigenous peoples abroad and on any measures taken in this regard”. (Committee on the Elimination of Racial Discrimination (CERD) – Concluding observations on the report submitted by Canada).³³³

“While appreciating information provided, the Committee is concerned about allegations of human rights abuses by Canadian companies operating abroad, in particular mining corporations and about the inaccessibility to remedies by victims of such violations. The Committee regrets the absence of an effective independent mechanism with powers to investigate complaints alleging abuses by such corporations that adversely affect the enjoyment of the human rights of victims, and of a legal framework that would facilitate such complaints (art. 2).

The State party should: a) enhance the effectiveness of existing mechanisms to ensure that all Canadian corpo-

³³² International Federation for Human Rights (FIDH). Corporate Accountability for Human Rights Abuses. A Guide for Victims and NGOs on Recourse Mechanisms. 3rd edition, 2016. Available at https://www.fidh.org/IMG/pdf/corporate_accountability_guide_version_web.pdf. Retrieved Jan 11, 2018. P. 34, 35.

³³³ CERD, Concluding observations: Canada, 25 May 2007, U.N. Doc. CERD/C/CAN/18. Available at [http://www.refworld.org/publisher,CERD,,CAN,,o.html](http://www.refworld.org/publisher/CERD,,CAN,,o.html)

rations, in particular mining corporations, under its jurisdiction respect human rights standards when operating abroad; b) consider establishing an independent mechanism with powers to investigate human rights abuses by such corporations abroad; c) and develop a legal framework that affords legal remedies to people who have been victims of activities of such corporations operating abroad”. (Human Rights Committee - Concluding observations on the report submitted by Canada).³³⁴

In turn, the next case is a complaint filed with the UN Human Rights Committee by an indigenous woman against her own State, Peru, host of a transnational corporation. Her complaint was about the lack of prior consultation to the community to which the author belonged and the subsequent setup of economic activities that compromised their subsistence and traditional ways of life. As a member of the community, the author was prevented from enjoying the right ensured in article 27 of the ICCPR:

“Object: Reduction of water supply to indigenous pastures [...] In the present case, the Committee observes that neither the author nor the community to which she belongs was consulted at any time by the State party concerning the construction of the wells. Moreover, the State did not require studies to be undertaken by a competent independent body in order to determine the impact that the construction of the wells would have on traditional economic activity, nor did it take measures to minimize the negative consequences and repair the harm done. The Committee also observes that the author has been unable to continue benefiting from her traditional economic activity owing to the drying out of

334 CCPR, Concluding observations: Canada, July 2015. Available at: <http://docstore.ohchr.org/SelfServices/FilesHandler.ashx?enc=6QkG1d%2FPPrICAqhKb7yhskswUHeinBHTSwwEsgdx-QHJBoKwgsSojmHCTV%2FFsa7OKzzgyna94OOqLeAavwpMzCD5o TanJ2C2rbU%2Fokxdos%2BXCyn4OFm3xDYg3CouE4uXS>

the land and loss of her livestock. The Committee therefore considers that the State's action has substantively compromised the way of life and culture of the author, as a member of her community. The Committee concludes that the activities carried out by the State party violate the right of the author to enjoy her own culture together with the other members of her group, in accordance with article 27 of the CPR Covenant.”³³⁵ (Human Rights Committee – *Ángela Poma Poma v. Peru*).

By allowing and/or supporting economic projects being set up on indigenous land or its surrounding areas without prior consultation with the affected communities; by allowing and sponsoring economic activities that are harmful to the environment, subsistence, and traditional ways of life; by abstaining from holding private agents to account and punishing them for the damage caused and failure to compensate victims, States must be internationally held accountable for breaching their duty to respect, protect, and ensure the human rights which they had voluntarily committed themselves to observing.

3.8. Responsibility to protect against atrocity crimes

In addition to the general obligations set in the international human rights framework at the 2005 World Summit, UN Member States assumed the responsibility to protect (R2P) their populations against atrocity crimes, namely genocide (Convention on the Prevention and Punishment of the Crime of Genocide, 1948), war crimes (Rome Statute), crimes against humanity (Rome Statute), and ethnic cleansing. Likewise, the international community pledged to hold and support

³³⁵ CCPR, *Ángela Poma Poma v. Peru*, Communication No. 1457/2006, 24 April 2009. Available at: http://www.worldcourts.com/hrc/eng/decisions/2009.03.27_Poma_Poma_v_Peru.htm

States to exercise this responsibility in case they fail to do so. This commitment is articulated in paragraphs 138 and 139 of the 2005 World Summit outcome, at the 60th Session of the UN General Assembly.³³⁶

According to Rosenberg³³⁷, “The 2005 Outcome Document is the most authoritative statement on R2P”. According to UN Secretary-General Ban Ki-Moon,³³⁸ who in 2009 issued a report that sums up and outlines the strategy to advance R2P based on three pillars. Pillar one is the enduring responsibility of State to protect its populations; pillar two is the commitment of the international community to assist States in meeting their obligations to prevent and protect; pillar three is the responsibility of Member States to respond collectively in a timely and decisive manner via pacific measures and, if need be, other stronger measures, in a manner consistent with international law. Pillars one and two are crucial elements for the prevention of mass atrocity crimes.

The legal grounds for the States’ responsibility to prevent atrocity crimes (pillar 1 of R2P) rests upon the positive obligations under international human rights law to prevent state and non-state actors from infringing up on another person’s human rights. This obligation requires states to take reasonable measures to prevent the violation from occurring and is based upon the notion of due diligence, which has now been

336 Resolution adopted by the General Assembly on 16 September 2005 [without reference to a Main Committee (A/60/L.1)] 60/1. 2005 World Summit Outcome. Available at [http:// www.un.org/en/development/desa/population/migration/generalassembly/docs/globalcompact/A_RES_60_1.pdf](http://www.un.org/en/development/desa/population/migration/generalassembly/docs/globalcompact/A_RES_60_1.pdf).

337 ROSENBERG, Sheri P. Responsibility to Protect: A Framework for Prevention. Global Responsibility to Protect 09/2009; 1(4):442-477. DOI: 10.1163/187598509X12505800144837.

338 KI-MOON, Ban. Implementing the Responsibility to Protect. A/63/677, 12 jan. 2009. Available at <http://www.un.org/en/ga/search/view_doc.asp?symbol=A/63/677

expressly incorporated into the responsibility to prevent genocide by non-state actors, within and outside of a state's borders.³³⁹

Because indigenous peoples are ethnic groups, they are potential victims of the crime of genocide, such as defined by the Genocide Convention ratified by Brazil,³⁴⁰ and may also be victims of crimes against humanity. Whenever risk factors likely to cause their total or partial physical destruction are present, the State's responsibility increases as it is under the obligation to adopt effective preventative measures capable of warding off the damage.

However, in the case of international crimes provided for in the Rome Statute ratified by Brazil,³⁴¹ they may be investigated, prosecuted, and punished by the International Criminal Court when, according to art. 17, the State which has jurisdiction over them is unwilling or unable genuinely to carry out the investigation or prosecution.

5. The political scene for Indigenous People's in Brazil

339 ROSENBERG, Sheri P. Responsibility to Protect: A Framework for Prevention. *Global Responsibility to Protect* 09/2009; 1(4):442-477. DOI: 10.1163/187598509X12505800144837.

340 In the present Convention, genocide means any of the following acts committed with intent to destroy, in whole or in part, a national, ethnical, racial or religious group, as such: a) killing members of the group; b) causing serious bodily or mental harm to members of the group; c) deliberately inflicting on the group conditions of life calculated to bring about its physical destruction in whole or in part; d) imposing measures intended to prevent births within the group; e) forcibly transferring children of the group to another group. (DECRETO N° 30.822, DE 6 DE MAIO DE 1952. Promulgates the Convention on the Prevention and Punishment of the Crime of Genocide, adopted in Paris on December 11, 1948, at the 3rd Session of the UN General Assembly). Available at <http://www2.camara.leg.br/legin/fed/decret/1950-1959/decreto-30822-6-maio-1952-339476-publicacaooriginal-1-pe.html>

³⁴¹ DECRETO Nº 4.388, DE 25 DE SETEMBRO DE 2002. Promulgates the Rome Statute of the International Criminal Court. Available at http://www.planalto.gov.br/ccivil_03/decreto/2002/d4388.htm?TSPD_101_Ro=a5c29b587612199106ed4fcd8521868os8yoooooooooooooooooooo9c1a15c9ffffooooooooooooooooooooooooooooooooo5ab3b98ooo0a863e785

The Brazilian political scene has proved somewhat reluctant when it comes to complying with ILO Convention 169 and the UN and OAS Declarations for indigenous peoples.

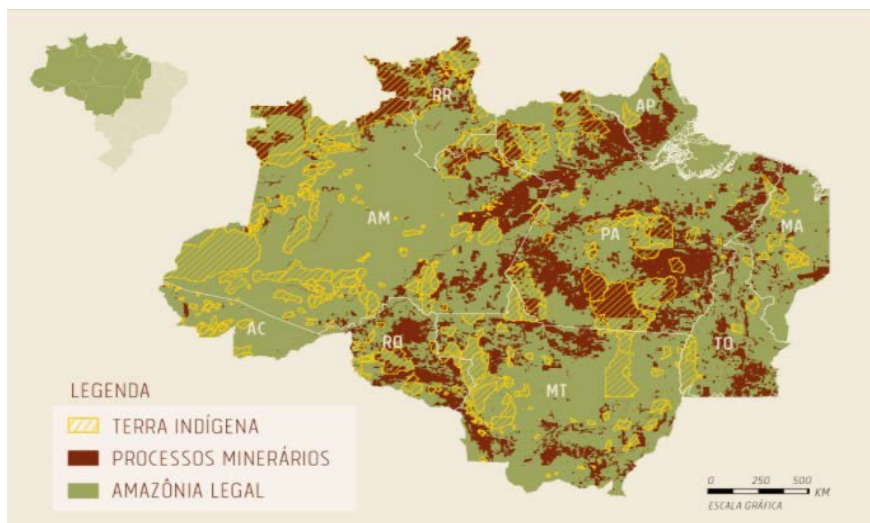
In the Legal Amazon, for example, there are on average three mining survey applications for every indigenous tract of land (involving the mining of gold, diamonds, lead, cassiterite, copper, and tin)³⁴². The data is alarming. For instance, the mining register allows for several applications to be filed on the same area, which leads to an overlap of interests. The map below illustrates the issue. The yellow diagonal lines represent indigenous land, while brown areas show mining submissions:³⁴³

MAP 2. Mining submissions on indigenous land in the Legal Amazon³⁴⁴

342 BRESSANE, Caco; BARROS, Ciro; BARCELOS, Iuri. Em terra de índio, a mineração bate à porta. Agência de reportagem e jornalismo investigativo – Pública, São Paulo, p. [S.I.], 2016. Available at: <<https://apublica.org/2016/06/em-terra-de-indio-a-mineracao-bate-a-porta-2/>>. Retrieved Dec 15, 2017.

343 INSTITUTO SOCIOAMBIENTAL (ISA). Mineração em Terras Indígenas na Amazônia brasileira em 2013. ROLLA, Alicia; RICARDO, Fany (Org.). ISA, São Paulo: 2013.

344 PUBLICA - AGÊNCIA DE REPORTAGEM E JORNALISMO INVESTIGATIVO. Em terra de índio, a mineração bate à porta. São Paulo. Mapa. Available at: <<https://apublica.org/2016/06/em-terra-de-indio-a-mineracao-bate-a-porta-2/>>. Retrieved Dec 15, 2017.



In 2016, the Due Process of Law Foundation – DPLF, released its “Right to Consultation and Consent of Indigenous People, Maroons and Traditional Communities” document, which looks into the main legislative bills being discussed in Brazil which directly affect indigenous and tribal groups but disregard the need for prior, free, informed consent.³⁴⁵ Three such bills specifically refer to mining and fail to abide by the prior consultation requirements set by Convention 169 and the UN Declaration on the Rights of Indigenous Peoples.

³⁴⁵ They are: Constitutional Amendment Bill no. 76 of 2011 – on indigenous people sharing in the profits from the commercial use of water resources in their land; Bill no. 1610/1996 – about mining on indigenous lands; Constitutional Amendment Bill no. 215/2000 – about the procedure to mark off and recognize indigenous lands, and putting legislators in charge of marking off indigenous lands; Constitutional Amendment Bill no. 71/2011 – changes the rules for marking off indigenous lands; Bill no. 227/2012 – about the use of natural resources in indigenous lands; Bill no. 5807/2013 – about mining in indigenous lands; Bill no. 1215/2015 – about the recognition and marking off of indigenous lands. GARZÓN, Biviany Rojas, YAMADA, Erika M., OLIVEIRA, Rodrigo. *Direito à consulta e consentimento de povos indígenas, quilombolas e comunidades*. São Paulo: Rede de Cooperação Amazônica – RCA; Washington, DC – Due process of Law Foundation, 2016.

Additionally, Bill no. 1610³⁴⁶ currently in the House provides that “after having been consulted with and understanding what a project is about, indigenous people will not have the right to say “no” to mining. They will have to submit to the interests of mining companies and the Government,” said rapporteur Édio Lopes.³⁴⁷ In other words, once enacted into law, said law is going to turn prior, free, informed consultation into a tool for legitimizing mining projects.³⁴⁸ Further illustrating the power imbalance between transnational corporations and traditional communities, the alternate draft for the New Mining Code submitted by members of the House and setting rules for the industry was put together by a private law firm whose clients include companies like VALE S.A. and BHP Billiton (companies which, among other projects at odds with indigenous rights, are the owners of company Samarco Mineração S.A., directly involved in the Mariana catastrophe).³⁴⁹

In March 2016, the UN Special Rapporteur on the rights of indigenous peoples, Victoria Tauli-Corpuz, visited Brazil and found that, today, indigenous peoples face more profound risks than at any time since the adoption of the Constitution in 1988³⁵⁰. Several factors have been adding

346 Available at: <http://www.camara.gov.br/proposicoesWeb/fichadetramitacao?idProposicao=16969>

347 MAIOR, Ana Paula Caldeira Souto; VALLE, Raul Silva Telles. Mineração em terra indígenas: impasses e problemas. In: ROLLA, Alicia; RICARDO, Fany (Org.). Mineração em Terras Indígenas na Amazônia brasileira em 2013. ISA, São Paulo: 2013.

348 MAIOR, Ana Paula Caldeira Souto; VALLE, Raul Silva Telles. Mineração em terra indígenas: impasses e problemas. In: ROLLA, Alicia; RICARDO, Fany (Org.). Mineração em Terras Indígenas na Amazônia brasileira em 2013. ISA, São Paulo: 2013.

349 BBC. Novo código de mineração é escrito em computador de advogado de mineradoras. 2015. Available at: <http://www.bbc.com/portuguese/noticias/2015/12/151202_escritorio_mineradoras_codigo_mineracao_rs>. Retrieved Nov 25, 2017

350 The practices pointed out in the report and which threaten indigenous communities in Brazil include: reprisals after indigenous peoples reoccupy ancestral lands; lack of prior consultation with indigenous peoples about public policies that directly impact their communities; killings; bullet wounds; arbitrary arrests; torture and criminalization of indigenous leaders. UNITED NATIONS (UN). Human Rights Council. Report of the Special Rapporteur on the rights of

to an already worrying regression in the protection of indigenous peoples' rights, including a political-legislative environment allowing corporate interests that sponsor megaprojects to easily trump indigenous rights³⁵¹. Indigenous peoples reported threats to their very existence in the context of large-scale development projects and friction mostly with transnational mining companies. An example of such friction is the magnitude of the Barragem Fundão (a tailings dam) collapse in Mariana – MG, which has deeply impacted the social organization of the Krenak indigenous people.³⁵²

Conclusions

Under the terms of a court-supervised agreement that ensured the Mura's right to a prior, free, informed consultation, they will have the opportunity to have their say about the mining project which company Brasil Potássio Ltda. Plans to build in an area surrounding their land. Although the company has already caused some damage such as digging into an indigenous cemetery and disruptions in the communities by trying to buy off leaders, the fact that there is still time to conduct the consultation process may prevent greater and oftentimes irreversible damage from being done, such as the total or partial destruction of the Mura's means of subsistence and forms of social organization.

indigenous peoples on her mission to Brazil. Geneva, 2016. Report. Available at: <http://unsr.vtaulicorpuz.org/site/index.php/es/documentos/country-reports/154-report-brazil-2016>.

351 UNITED NATIONS (UN). Human Rights Council. Report of the Special Rapporteur on the rights of indigenous peoples on her mission to Brazil. Geneva, 2016. Report

352 CLÍNICA DE DIREITOS HUMANOS DA UNIVERSIDADE FEDERAL DE MINAS GERAIS (CDH/UFGM). Direito das populações afetadas pelo rompimento da barragem de fundão: Povo Krenak. Belo Horizonte, 2017. Relatório. Available at: http://www.greenpeace.org.br/hubfs/Campanhas/Agua_Para_Quem/documentos/relatorio_greenpeace-cdh_krenak.pdf

To sum up, this study looked into factors that must be considered during a process of consultation about mining projects like the one intended to be set up in the city of Autazes, in the Amazon.

With respect to the companies' operations, two facts stand out: that Brasil Potássio Ltda. is the subsidiary of a Canadian transnational corporation and how hard it is to get parent companies held accountable for damage they have caused outside their countries of origin. In a scenario where holding transnational corporations accountable is so difficult that the odds of some future redress are stacked against the affected people, it is ever more important that authorities in host countries have preventative and protective measures in place to prevent damage. Yet governments, which have the obligation to protect not only the rights of indigenous people but also the environment, tend to side with companies and encourage them to set up operations regardless of the risks.

This case illustrates the assertion above. The Public-Interest Civil Action filed in an effort to ensure the Mura are heard lists countless procedural breaches related to the permits granted by government agencies. Additionally, Brazil's current political scene is detrimental to indigenous people. They face having some of their rights taken away, including those ensuring greater protection against mining on their land.

As described in the course of this study, vast is the environmental and human damage done by mining companies, and greater than the occasional economic advantages brought to local communities. All risks and potential damage must be studied in detail, considering that the solutions for their mitigation and redress may make an economic venture less appealing. In this particular case our attention is drawn to the potash mining risks in a floodplain area such as Autazes, which is subject to an ebb and flow system. These risks there are greater because salt is the main waste from such mining and something that is difficult to con-

tain. The Autazes area is extremely waterlogged and salt leaks, with the consequent salinization of water, may be a determining factor in making local groups' community life impossible to continue there.

This is a clear, objective risk that threatens the Mura's existence as ethnically distinct communities, given it would force those communities to leave and lose their traditional land. That alone brings the State the unshakable responsibility to protect these communities from the risk of extinction, which would be an atrocity crime as defined by the Rome Statute and punishable by the International Criminal Court.

Turmalina Paraíba Case: Analysis of Legal Developments and Human Rights Violations

*Maria Luiza Pereira de Alencar Mayer Feitosa*³⁵³

*Adriana de Medeiros Gabínio*³⁵⁴

*Antônio Alves de Vasconcelos Filho*³⁵⁵

*Gilmara Benevides Costa Soares Damasceno*³⁵⁶

*José Irivaldo Alves Oliveira Silva*³⁵⁷

*Igor Caio Alves de Miranda*³⁵⁸

*Juvêncio Almeida Costa Neto*³⁵⁹

*Luciana Vilar de Asis*³⁶⁰

*Ylana Zálfe de Farias Lima*³⁶¹

Introduction

The PPGCJ-UFPB team chose to study the case known as *Turmalina Paraíba* (paraíba tourmaline), a rare gemstone discovered in the State of Paraíba, northeastern Brazil, an area of semi-arid climate, very poor, located in the region of Seridó Ocidental Paraibano, 316 km from the city of João Pessoa, the state's capital. The case is about the police investigation and court inquiry looking into wrongdoings committed in the illegal mining of this mineral. Paraíba is a rare bluish green variety of tourmaline and highly coveted in the international jewelry market, especially after having been deemed extremely scarce by the Gemological Institute

of America (GIA). As a result, its prices have climbed rapidly. Today, the so-called “paraíba tourmaline,” named after the Brazilian state where it was found, is fashioned for select wealthy customers by jewelers operating in Brazil, such as Amsterdam Sauer and H. Stern, and abroad, like Dior and Tiffany & Co. UK.

Considered an exotic product, the gem’s carat (0.2 grams) is estimated to be worth USD 30,000 on average but may reach USD 100,000 depending on the stone’s features, according to an information filed by the Federal Prosecution Office (MPF, in Portuguese). In 2014 and along with the Brazilian Federal Police, the MPF launched a probe they called *Operação Sete Chaves*, Police Investigation no. 0000451-81.2014.04.05.8205, to look into environmental crimes reported as substantive joinder of offenses; illegal mining operations reported as formal joinder of offenses; and money laundering, all of them repeated crimes. The information – no. 0800142-85.2018.4.05.8205 – is being processed by the 14th Federal Court of the Paraíba Federal Court System (JFPB). The conspiracy involves cases of illegal gemstone trade, bank accounts used for money laundering, tax fraud on the export of goods, and other wrongdoings.

This mineral’s mining conditions and the entire network of offenses surrounding it point to human rights violations that encompass environmental crimes in an area acutely affected by droughts and leading to severe social impacts; labor law violations, such as illegal mining using forced labor, while giving nothing back to society from the wealth extracted from the ground, and workers exploited under extreme heat for working days lasting 12 hours or more in 80 meter deep pits; crimes against the human right to development, including tax and customs duty fraud, and others.

1. Description of the problem

Operação Sete Chaves resulted from investigative work done by the Paraíba Federal Prosecution Office (MPF/PB) and the Federal Police (PF) that in May 2015 dismantled the criminal organization which was mining Paraíba tourmaline without authorization or environmental permits in an area registered to company Parazul Mineração, Comércio e Exportação Ltda, located in the district of São José da Batalha, city of Salgadinho/PB.

In fact, the investigation had begun in 2013 when the Federal Police found that this mining company's owners had swiped raw materials belonging to the federal government by mining Paraíba tourmaline without authorization from the then-National Department for Mining (DNPM) or the Ministry of Mines and Energy (MINISTÉRIO PÚBLICO FEDERAL, 2015, p.4).

Per reports, this group also conducted land surveys, digs, and extraction of natural resources without permits from the relevant bodies or license from the proper environmental agency. These continuous crimes allegedly began in the late 1980s and took place in plain sight, never once reported to the police, investigated or prosecuted.

Mining generates resources that must be shared between the federated states, cities, and other federal administration bodies in the form of financial compensation for the exploration of ore bodies “at the rate of up to 3% of the net income from the sale of mineral products, obtained after the last phase of the beneficiation process and before their industrial transformation” (MOSCOGLIATO, 2000, p. 10).

Hence, the Federal Prosecution Office launched in the State of Paraíba its so-called “*Operação Sete Chaves*” to investigate the illegal mining and illicit international trade of tourmaline gems run by a criminal orga-

nization whose members included mining company owners, politicians, and Brazilian and international tradesmen.

Internationally, the group operated by simulating trade deals between companies *Mineradora Terra Branca* and *Liberty Gems*. The gems were said to be common tourmaline and exported at a price ranging from 1% to 10% of their actual value. Upon reaching their final destination, they were then sold for their real price. The investigations made it clear that *Liberty Gems* and *Js Gems* are also shell companies registered to the same address as *Mineradora Terra Branca* in Parelhas/RN.

2. Human rights issues disregarded by law enforcement

Illegal mining pays no taxes. Therefore, the area from which the gems are taken gets nothing in return. Data provided by the Brazilian Institute of Geography and Statistics (IBGE) shows that in the city of Salgadinho/PB, district of São José da Batalha, 65.7% of homes are located in rural areas. Of the city's 3,508 residents (2010 IBGE Census), 815 are aged 15 years or older and are still unable to read or write.

According to said data, we realize that the gemstones which were supposed to bring development to the area from which they were taken have in fact lent themselves only to filling the pockets of those who illegally mined them and then gave nothing back to the populations of São José da Batalha and Salgadinho.

In this case, the only charges brought were related to the theft of raw material belonging to the federal government, profiting from the unlawful mining of tourmaline without an environmental license, con-

spiracy, illegal use of firearms, and transnational organized crime. It just so happens that the grave violations of human, collective, and individual rights were not within the purview of the investigations. Upon choosing to study this case, the UFPB team pored over the social, anthropological, and sociological issues in the affected area; the details related to employment relations; environmental aspects, given there was no mention or proof that either the parties involved in the illegal mining of the mineral or the environmental agencies had done anything to rehabilitate the environment in the area where the mine was located.

This paper makes considerations about the need to lift the corporate veil of the offending companies in order to secure enough money to redress the damage. Also, we review the literature and analyze the weak or ineffective regulation of mining grounds. The fact is that unlawful mining of raw material belonging to the federal government tends to lead to the gradual depletion not only of mineral assets but also the funds required to ensure the human right to development. Finally, we discuss the transnational crimes and their developments, namely fraud for the failure to pay financial compensation. After all, it impacts on the amount of funds available for infrastructure works, on environmental quality, healthcare, law enforcement, and the affected population's education, thereby depriving them from their right to development.

Therefore, the main goal of this case study is to examine in detail the legal, social, and human issues that are usually left aside by criminal investigations. These focus on finding perpetrators but do not foster a discussion about the violations of human rights or flaws in the constitutional framework.

3. Analysis 1. The Local Social Indicators And Their Relationship With “paraiba Tourmaline” Mining³⁶²

An important question emerging from the case under analysis is whether mining has brought human development for the area where it is carried out, considering the multidimensional scope of the term “development” (FRANCO *et al*, 2012) and its direct relationship with social issues, including respect for fundamental social rights such as people’s right to health, life, freedom, work, and sustainability.

Agenda 21, put together in Rio de Janeiro in 1992, advocates respect for minimum working conditions as they are essential to achieve sustainability. It is widely known that no sustainability plan is ever going to succeed unless there is respect for dignified work standards, a fact which consequently affects human development. We need to evaluate how such a complex activity as mining may positively impact people’s lives, especially in a semi-arid area plagued by low socioeconomic indicators.

This section presents indicators which describe the area where “paraiba tourmaline,” a highly valuable gem in the Brazilian and international markets, is illegally mined. The fact is that the area, or rather the entire federated state, and its population have not been able to benefit from the gem’s royalties. Mining has not translated into positive changes in terms of the local population’s health, work, housing, and education opportunities.

Therefore, the study considered the cities which are under the influence of tourmaline mines, as shown in the map below.

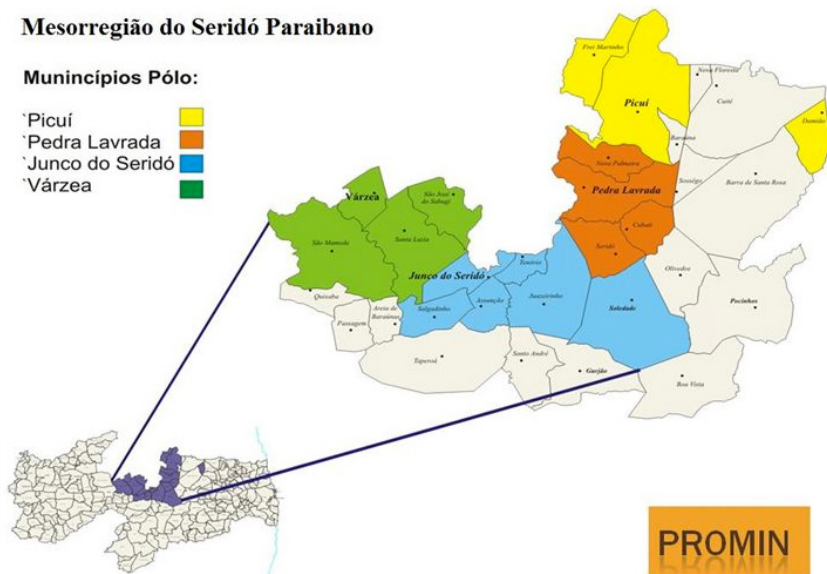
Maps 1 and 2 - Paraiba Tourmaline area of influence

³⁶² Research conducted by José Irivaldo Alves Oliveira Silva.

Mesorregião do Seridó Paraibano

Municípios Pólo:

- Picuí
- Pedra Lavrada
- Junco do Seridó
- Várzea



Some cities in the state stand out for their fierce mining activity, such as Junco do Seridó, Juazeirinho, Tenório, Salgadinho, Boa vista, Picuí, and Santa Luzia, in addition to cities in the neighboring state of Rio Grande do Norte, such as Parelhas and Equador. They are all located in the semi-arid region of northeastern Brazil, and have common features: low HDI, on-and-off water supply, lack of sewage collection and treatment infrastructure, lack of a proper healthcare system, lack of landfills, and other problems. This set of social indicators show the local, state, and federal governments' failure to transform people's lives and their inability to control companies that mine high value-added minerals. Additionally, these cities' administrations are fragile, lack resources, and depend on the Municipal Participation Fund (FPM), which accounts for most of their revenue. Furthermore, their education, health, and human development indicators are below the

state and national average rates. By and large, governmental bodies see Paraíba as a state boasting a wide variety of ores, which yield granite, feldspar, kaolin, bentonite, iron, gold, uranium, quartz, and tourmaline. The last-named has become highly sought-after by companies in the industry.

a) Indicators

CHART 1 – Human Development Index in Paraíba’s top mining towns.

	MHDI	Income MHDI	Longevity MHDI	Education MHDI
Brazil	0.727	0.739	0.816	0.637
Salgadinho	0.563	0.531	0.739	0.454
Juazeirinho	0.567	0.557	0.753	0.435
Picuí	0.608	0.596	0.745	0.506
Assunção	0.609	0.601	0.738	0.510
Junco do Seridó	0.617	0.571	0.715	0.576
Boa Vista	0.649	0.590	0.796	0.592
Santa Luzia	0.682	0.620	0.804	0.636

Source: Human Development Atlas, 2010.

The Municipal Human Development Index (MHDI) - Paraíba was 0.658 in 2010, which places this state within the Average Human Development range (MHDI between 0.600 and 0.699). The aspect contributing the most to the state’s MHDI is Longevity, at 0.783, followed by Income at 0.656, and Education at 0.555. In general, these cities match the pattern of indicators in Paraíba. In terms of the state’s ranking, Salgadinho is placed 172, Juazeirinho 157, Picuí 52, Assunção 49, Junco do Seridó 39, Boa Vista 10, and Santa Luzia 6. Salgadinho’s position in the ranking is noteworthy, as the city is at the heart of tourmaline mining. In nationwide terms, the

city's HDI situation is even worse. Salgadinho ranks 4,984, Juazeirinho 4,903, Picuí 3,957, Assunção 3,927, Junco do Seridó 3,756, Boa Vista 3,136, and Santa Luzia 2,386. In the aforementioned atlas, these figures range between low and average, which is consistent with these cities' service structure, or access to public services. This environment seems to be the perfect breeding ground for unhealthy activities that violate human rights head on, especially those related to labor rights.

It should be noted that these cities' ability to generate income³⁶³ is very low. For instance, the tourmaline mining city of Salgadinho's own-source revenue amounts to BRL 0.02 for every BRL 1.00 it gets from intergovernmental transfers. In other words, the city is highly dependent on state and federal funds. Juazeirinho follows suit with Salgadinho, 0.02 for every 1 real. In turn, Picuí goes up to 0.06 for every real it gets in funds. Santa Luzia has the highest own-source revenue, i.e. 0.07 for every real, and Assunção the lowest, 0.01 for every real transferred. Therefore, circumstances are not promising.

This database does not list Salgadinho's share in the CFEM (*Compensação Financeira pela Exploração de Recursos Minerais*), meaning financial compensation from mining). In 2015, Juazeirinho's amounted to a paltry BRL 71.34, Picuí BRL 13,744.80 and Santa Luzia got BRL 26,284.64. Data was not provided on the others. These numbers negate any spiel touting mining as a source of widespread, effective development.

Another striking rate is the Performance Indicator for Education Spending in Paraíba (IDGPB), drawn up by the Paraíba State Accounting Court (TCEPB), especially in relation to the Infrastructure Inadequacy

363 Available at: <https://meumunicipio.org.br/indicadores-municipio/2513406-Santa-Luzia-PB?exercicio=2015>, data from the Brazilian Ministry Of Finance – National Treasury Department (STN) and IBGE, data on 2015.

Index³⁶⁴, considering data for 2007 to 2011. In Salgadinho, district of São José da Batalha, where tourmaline is mined, this rate is one of the highest in the state. It ranged from 39% to 33% between 2007 and 2011, which shows the number of schools in poor condition. Juazeirinho ranged between 41% and 42%. Picuí, in turn, from 36% to 33%. Junco do Seridó dropped from 36% to 29%. Assunção ranged between 36% to 35%. Santa Luzia from 30.5% to 30.3%, and Boa Vista ranged between 33% to 32%. These low rates lay bare the need to adopt a public agenda dedicated to improving the cities' education infrastructure.

Chart 2 presents these cities' Gross Domestic Product, that is, the amount of wealth generated by them through their activities.

CHART 2 – Mining cities' GDP

City	
Salgadinho	In 2014, its per capita GDP was BRL 5,757.74. Compared to the other cities in the state, it ranked 217 out of 223. Compared to cities across Brazil, it came in at 5154 out of 5570. In 2015, 97.2% of its budget was funded by outside sources. Compared to the other cities in the state, it placed 37 out of 223 and, when compared to cities across Brazil, it ranked 228 out of 5570.
Junco Do Seridó	Its per capita GDP is currently estimated at BRL 7,854.92, which places it at 4,167 and in the state, 71.

364 Refers to the average rate of variables pointing to the existence of infrastructure problems at schools in the city/microregion/mesoregion and in the school network. The variables considered were: whether a school is in a shared building, whether its location is precarious (shed etc.), water supply, sewer, power, trash collection, rooms for the principal and faculty, IT lab, science lab, library, internet, kitchen, whether meals are served, and whether there are re-strooms. Available at: http://idgpb.tce.pb.gov.br/data/notas_tecnicas.pdf

Juazeirinho	In 2014, its per capita GDP was BRL 7,069.88. Compared to the other cities in the state, it ranked 127 out of 223. Compared to cities across Brazil, it came in at 4478 out of 5570. In 2015, 93.9% of its budget was funded by outside sources. Compared to the other cities in the state, it placed 128 out of 223 and, when compared to cities across Brazil, it ranked 1187 out of 5570.
Picuí	In 2014, its per capita GDP was BRL 7,760.49 Compared to the other cities in the state, it ranked 76 out of 223. Compared to cities across Brazil, it came in at 4199 out of 5570. In 2015, 88.3% of its budget was funded by outside sources. Compared to the other cities in the state, it placed 173 out of 223 and, when compared to cities across Brazil, it ranked 2567 out of 5570.
Assunção	In 2014, its per capita GDP was BRL 7,596.12. Compared to the other cities in the state, it ranked 95 out of 223. Compared to cities across Brazil, it came in at 4269 out of 5570. In 2015, 98% of its budget was funded by outside sources. Compared to the other cities in the state, it placed 13 out of 223 and, when compared to cities across Brazil, it ranked 81 out of 5570.
Boa Vista	In 2014, its per capita GDP was BRL 16,200.32. Compared to the other cities in the state, it ranked 8 out of 223. Compared to cities across Brazil, it came in at 2347 out of 5570. In 2015, 89.5% of its budget was funded by outside sources. Compared to the other cities in the state, it placed 164 out of 223 and, when compared to cities across Brazil, it ranked 2296 out of 5570.

Source: IBGE, 2017365

These figures show how economically frail these cities are, and also that the Government fails to come up with regulations capable of fixing, or at least mitigating, these distortions, especially when it comes to transferring advantages in terms of public services to the population. Below, chart 3 presents data on these cities' economic dynamics compared to Paraíba's.

CHART 3 – Mining cities' economic performance

365 Available at: <https://cidades.ibge.gov.br/v4>

City	Economic Dynamics	Per capita GDP	Growth Rate	Individual Participation	Service Participation	Public Service Participation
Paraíba	0.8477	0.8445	0.5704	0.9230	0.9916	0.9090
Salgadinho	0.3245	0.3408	0.4390	0.3185	0.2378	0.2864
Junco d Seridó	0.4710	0.3577	0.6610	0.4053	0.5655	0.3654
Juazeirinho	0.5800	0.3818	0.8982	0.5831	0.6241	0.4129
Picuí	0.4516	0.4040	0.1827	0.5187	0.7242	0.4283
Assunção	0.5209	0.4590	0.9089	0.3793	0.4622	0.3949
Boa Vista	0.8649	0.9985	0.9999	1.0000	0.3266	0.9997
Tenório	0.4262	0.4424	0.7634	0.3300	0.2841	0.3109

Source: PARAÍBA, 2012

Chart 3 further bolsters the assertion that areas with mining potential do not necessarily turn such potential into human development. For instance, the city of Salgadinho, i.e. the seat of tourmaline mining, had the worst economic performance. Also, its per capita GDP was the lowest among these cities. It should be noted as well that these cities' indicators are below those found state-wide. Below, chart 4 shows their quality of life-related numbers.

CHART 4 – Quality of life in mining cities

City	Quality of Life	Child Mortality	Mortality from infectious and parasitic diseases	IDSUS (Public healthcare performance rate)	Proper Sanitation	Murder rate
Paraíba	0.4571	0.4152	0.3764	0.4267	0.8204	0.2467
Salgadinho	0.5653	0.5359	0.4107	0.6220	0.2858	0.9722

Junco Do Seridó	0.5620	0.3676	0.3853	0.6839	0.9646	0.4088
Juazeirinho	0.4743	0.3458	0.3891	0.4390	0.8239	0.3737
Picuí	0.5969	0.4112	0.3526	0.9950	0.9439	0.2818
Assunção	0.5811	0.5566	0.4141	0.8629	0.1000	0.9722
Boa Vista	0.5807	0.4446	0.3633	0.9309	0.1924	0.9722
Tenório	0.4449	0.5816	0.3598	0.8861	0.1011	0.2957

Source: PARAÍBA, 2012

All that raises questions about the relationship between the government and companies, and to what extent their behavior is a source of human rights violation. Chart 4 shows indicators related to quality of life. These figures are not perforce directly related to economic performance given that, as seen from chart 3, these cities' economies are lagging. However, when we look at the numbers related to other aspects, we find that to a certain extent these cities are not the worst but instead even top the rates for the state of Paraíba as a whole. Nevertheless, we should still note the poor coverage of basic sanitation services, a fundamental aspect in most cities, and the high rate of homicides in the tourmaline mining area.

Chart 5 presents the education-related numbers for these cities.

CHART 5 – Schooling rates in mining cities

City	Schooling	K-12 Attendance Rate	ES-JH Attendance Rate	ES-JH Age/Grade Mismatch	Illiteracy Rate	K-12 DI early years	K-12 DI final years

Paraíba	0.5312	0.4302	0.3771	0.5035	0.8077	0.5747	0.4938
Salgadinho	0.2572	0.1330	0.1468	0.4562	0.3134	0.0000	0.4938
Junco do Seridó	0.4738	0.2663	0.1349	0.7527	0.8092	0.5747	0.3053
Juazeirinho	0.4674	0.2758	0.5452	0.3196	0.5956	0.5747	0.4938
Picuí	0.6624	0.8516	0.3787	0.5915	0.6946	0.6237	0.8345
Assunção	0.7301	0.9471	0.9554	0.4632	0.6009	0.6237	0.7903
Boa Vista	0.7507	0.8444	0.7841	0.5265	0.9931	0.9274	0.4285
Tenório	0.4590	0.8659	0.9583	0.2322	0.4058	0.1702	0.1215

Source: PARAÍBA, 2012

Besides checking the quality of education spending, we need to look at education levels. By so doing, once we look at the data, the figures for the city of Salgadinho are disturbing – its schooling level is the lowest of all, attendance at K-12 grades is low, and the same is true for elementary school to junior high. The rate of students falling behind the official age-for-grade is high in these cities, at nearly 100% in Boa Vista and very low in Tenório. In the case of Boa Vista, there is a discrepancy in that the city's illiteracy level is high while its IDEB (Portuguese acronym meaning K-12 development index) related to the early years is quite high, well over the state's. Illiteracy rates are considerably high in these cities. Junco do Seridó, Salgadinho, and Tenório have the lowest IDEBs. Illiteracy rates remain high, and therefore incompatible with the claim that mining drives human development. That is astounding, given that the population at large has no access to the benefits from this activity, which leads us to ask: where is the government?

CHART 6 – Poverty and social equality levels in mining cities

City	Poverty and social equality	Poverty rate	Per capita household income	Ratio 75/25
Paraíba	0.8119	0.9215	0.9882	0.5261

Salgadinho	0.3536	0.2837	0.2616	0.5156
Junco do Seridó	0.5888	0.3857	0.4536	0.9272
Juazeirinho	0.4185	0.3141	0.3747	0.5666
Picuí	0.5755	0.5437	0.6357	0.5471
Assunção	0.6441	0.6249	0.5970	0.7104
Boa Vista	0.8634	0.9106	0.7331	0.9464
Tenório	0.5903	0.4736	0.3802	0.9170

Source: PARAÍBA, 2012

Corroborating the notion that mining cities may not be getting anything from the activity and that putting together a human development agenda is urgent, chart 6 shows that the studied cities are in dire conditions in terms of poverty and equality. The natural result is low human development, and Salgadinho once again stands out as the city with the worst rates of poverty and equality in the state. Boa Vista is the only city whose rates are reasonable.

However, it is important to think about public efficiency based on each city's revenue and how they use it, in that the plans for such use should always focus on human development. Chart 7 presents numbers related to this aspect and considers data such as city revenue, a large portion of which comes from the Municipal Participation Fund (FPM), total per capita income, personnel expenses, which ends up being their Achilles' heel especially because of the spoils system, and investment capability.

City	Public Efficiency	City Revenue	Total per capita income	Personnel expenses	Investment
Paraíba	0.5612	0.9919	0.3051	0.4729	0.4749
Salgadinho	0.4812	0.2357	0.7275	0.4899	0.4719
Junco do Seridó	0.3281	0.2810	0.3094	0.4774	0.2448
Juazeirinho	0.3471	0.4736	0.2320	0.4635	0.2193

Picuí	0.5532	0.7566	0.3658	0.4627	0.6275
Assunção	0.6265	0.3145	0.8274	0.4810	0.8832
Boa Vista	0.5700	0.4789	0.7986	0.4769	0.5256
Tenório	0.4367	0.2485	0.8999	0.4744	0.1239

Source: PARAÍBA, 2012

City income here means the funds they get as their share in the national tax yield, a share that has been getting small by the year. Chart 7 shows these cities' low investment potential and poor public efficiency, a fundamental aspect for ensuring social welfare. It should be noted that nearly 50% of city funds are earmarked for personnel expenses despite the cities' low revenue and low investment capability. The fact is that civil service jobs, usually patronage appointments, are used as barter for votes.

Naturally, these numbers need to be further discussed as they do not necessarily mean that more capital going into the cities would actually improve the quality of management and translate into better education, healthcare, housing, and public services. After all, studies on public management have not proved such a correlation exists. We are not saying that these low indicators derive from the lack of revenue from mining – such revenue might as well be substantial and still fail to foster social progress in the cities. In Paraíba, the most striking fact is that the large amount of resources mined has not meant development for local residents. That is not to say people should not come together to demand that city officials go after the mining companies and tax them, given that such funds are really needed. Another relevant stage is to monitor how these funds are used. A lack of education paired with the absence of other public services may explain why the population seems to tamely accept breaches of the law and other violations of basic human rights, to some extent because they have

resigned themselves to this situation but much more out of an economic dependence and fear.

b) The wreck left by mining companies

The aforementioned data does not show that tourmaline mining companies are systematically monitored by the authorities. Instead, quite the opposite is true. We have found that government agencies fail to properly control not only the mining activity itself but also the work done by miners, even though it is widely known that the mining industry is responsible for the highest number of worker injuries and death in the world.³⁶⁶

In terms of Brazilian laws, we have Decree no. 6270 of November 22, 2007, which promulgated the International Labor Organization's Convention no. 176. This Convention set mining standards and specific procedures needed to protect miners' lives, health, and dignity in these places, which are usually unhealthy, hard to reach, and require special safety measures. Said decree recognizing the ILO convention (BRASIL, 2007) is very clear about the need for employers to adopt technical procedures regarding workers and the workplace as well as to provide miners with protective equipment to prevent accidents, foresee risks, and mitigate them.

Additionally, a 2011 decree introduced Brazil's National Policy on Workplace Health and Safety (PNSST) no. 7622, setting the requirements for a safe workplace that does not endanger workers' lives (BRASIL, 2011). This decree makes it clear that preventing risks, protecting workers' health, and dealing with workplace accidents and post-accident events are issues which are under the purview of several national agencies. In his master's thesis, Rocha (2013) finds that TST (Superior Labor

³⁶⁶ Available at: <http://politike.cartacapital.com.br/mineracao-e-a-maior-responsavel-por-mortes-no-trabalho-ao-redor-do-mundo/>

Court) decisions clearly recognize that miners require special protection and cannot be equated to ordinary workers, considering the former face the tough challenge of working mostly underground, subject to the risks posed by an inhospitable environment.

We should note that a healthy work environment is a fundamental right of miners. For instance, TST and State Labor Courts have decided on different working hours for miners and the other workers, setting the number of six daily hours for the former. (ROCHA, 2013). The Ministry of Labor is an Executive Branch body tasked with monitoring work activities. However, the number of inspections it carries out in the mining industry is bewildering, especially considering the numbers below are official. Making matters worse, the Ministry of Labor reports they have only one workplace health and safety inspector.

Table 1 – Number of inspections carried out in Brazil

Setor Econômico		Ações Fiscais	Trabalhadores Alcançados	Notificações *	Autuações **	Embargos / Interdições	Acidentes Analisados
Agricultura		3.478	281.956	6.395	4.585	75	51
Comércio		13.941	921.922	9.083	9.636	289	149
Construção		12.584	985.133	4.290	24.340	1.570	298
Educação		1.118	149.127	410	432	5	7
Hotéis/Restaurantes		2.945	198.921	1.737	1.967	75	23
Indústria	Ind. Alimentos	2.084	638.376	3.116	4.356	143	111
	Ind. Madeira e Papel	470	56.506	364	892	45	33
	Ind. Metal	2.727	729.094	1.815	4.187	179	115
	Ind. Mineral	1.135	206.781	2.545	2.571	90	54
	Ind. Químicos	1.038	260.478	703	1.559	56	53
	Ind. Têxtil e Couro	932	145.601	308	982	22	16
Indústrias - Outras		763	67.262	701	893	53	20
Instituições Financeiras		633	1.044.109	252	607	5	3
Saúde		1.788	548.562	818	2.080	46	11
Serviços		3.594	1.231.796	1.766	3.156	85	97
Transporte		3.528	808.304	2.146	3.745	82	90
Outras		1.738	415.037	619	1.612	57	25
TOTAL		54.496	8.688.967	37.068	67.600	2.877	1.156

2016

Source: Ministry of Labor, 2016.

These figures are relevant to the extent they show the lack of mining oversight. However, we realize the Ministry is kept mostly in the dark given this industry hardly ever holds or discloses employment-related records.

The topic studied in this paper is therefore important and justifies the analysis of the negative impacts from mining operations, especially their employment-related legal aspects. To that end, looking at the specific case of the Junco do Seridó-PB area, meetings were held with local authorities and members of the Labor Prosecution Office (MPT), and information collected on site from miners.

Research conducted at the MPT, a body reporting to the Federal Prosecution Office which among other things is tasked with investigating potential breaches in the relationship between companies and workers and monitoring potential human rights violations, provided data about the procedures involving mining companies, specifically those extracting “paraíba tourmaline.”

In 2011, Civil Inquest no. 343 was filed, whose initial text reads as follows:

Considering the alleged violations reported in the records of Preparatory Procedure no. 030696.2010.13.002/1, it is claimed that SÃO JOSÉ DA BATALHA/PB MINING COMPANIES located in the city of Salgadinho-PB, **have operated and/or are operating in breach of labor laws regarding unhealthy workplace, activities, and operations, CIPA – Internal Accident Prevention Committee, and PPE and CPE – Personal and Collective Protective Equipment.** (LABOR PROSECUTION OFFICE, 2011, p. 1)

This investigation by the Paraíba MPT led to the signature of a conduct adjustment agreement (*Termo de Ajustamento de Conduta* - TAC)³⁶⁷ on the right to vacation time and pay but which failed to address the issue of personal protective equipment. Working conditions in the various mines in the area of Seridó in Paraíba are widely known, as are the envi-

³⁶⁷ Case related to PARAÍBA TOURMALINE MINERAÇÃO LTDA - TERMO DE AJUSTE DE CONDUTA no. 00015.2014.

ronmental rights violated, considering mining is a highly invasive activity when it comes to the environment and leaves a trail of destruction. Added to that is the absence, or minimal, control over it by the authorities.

c) Paraíba tourmaline mining in Salgadinho: fake compliance with labor laws to ward off inspectors

In the two compliance evaluations carried out by the MPT and Ministry of Labor and Employment in 2013 in the tourmaline mining area in the District of São José da Batalha (Salgadinho/PB), no relevant infractions were found either in the workplace or in terms of labor law breaches. Not even was a notice of violation issued against Parazul, the company mentioned in the *Sete Chaves* Operation and which was illegally mining paraíba tourmaline in the area. As for Tourmaline Mineração Ltda, another company set up in the city, a notice of labor law violation was issued on vacation-related issues.

One may assume the purpose of this ostensible compliance with labor laws was to evade the attention of governmental control agencies, especially because each company had approximately eight employees (quite a low number). In other words, it was a matter of keeping up appearances of labor law compliance to keep inspectors away from other issues.

On the other hand, the costs involved in complying with labor laws are low when compared to the vast amounts made from selling paraíba tourmaline. In this case, however, after the Federal Prosecution Office applied to have operations shut down, paraíba tourmaline mining activities in the District of São José da Batalha stopped.

d) Kaolin extraction in Junco do Seridó: mining compliance and labor violations

Because tourmaline is a high value-added mineral, the extraction of a few gems (by a small number of workers) is already enough to bring in vast amounts of money. The opposite is true for the kaolin mined in the city of Junco do Seridó/PB. In this case, a large amount of the mineral has been extracted to yield very little in return. Therefore, this is a very low value-added mineral whose mining does not draw the attention of the press or governmental control agencies. As a result, employment-related labor laws are regularly violated.

According to data collected for a Master's thesis under the Graduate Geography Program at Universidade Federal da Paraíba, kaolin is mined in Junco do Seridó by approximately 800 workers, 70% of whom have no formal employment relationship as required by law. The tools they use are rudimentary (handmade), and the miners do not wear personal protective equipment (SILVA, 2011, p. 47).

In Junco do Seridó, there is a Cooperative that does not properly fulfill its role, dependent as it is on local economic forces and under their influence. The lack of transparency in COOPERJUNCO's activities makes it difficult to obtain actual data on them. One of the cooperative's directors told us that COOPERJUNCO has approximately 200 members. However, only 20 (twenty) would actually be active.

The local population's economic dependence is a fact found in these two cities. Be it through the mining of Paraíba tourmaline – before the mines were shut down – or kaolin, the least bit of income workers make is seen as worth the risks involved. This fact is documented by several entities in their report to the Inter-American Commission asking it for a hearing:

The strategy mining companies have found to skirt the population's resentment about the negative impacts from mining is a combination of economic dependence, buying off local

political forces, and coming up with bogus positive impacts from their operations in the area (BAHIA *et al.*, 2016, p. 4).

Ultimately, the local population's economic dependence leads to the existence of employment relations outside the law. Also, there is no collaboration between the authorities and the population, meaning working conditions depend on the interests of those who deal with mining in the area.

Another hurdle the MPT came across when trying to monitor working conditions in Junco is the roaming nature of mining operations in the area: a mine is rapidly dug on a site but soon depleted, and a new mine is excavated nearby. Furthermore, mine owners and workers get a heads-up about soon-to-be carried out inspections and take steps to evade them. That fact, along with the lack of collaboration and complaints by workers, who refuse to provide information even when questioned at public hearings, ties the hands of the MPT, even though this Office could move of its own accord in cases it is allowed to by law.

In the case studied, it should be noted that working conditions in the district of São José da Batalha and in Junco do Seridó are different. Although for the most part kaolin is legally mined in Junco, labor laws are entirely violated. This is something that has been going on for decades and the very miners and companies that beneficiate kaolin take it upon themselves to hinder the government's control efforts. In turn, the situation in the city of Salgadinho is the opposite. Labor laws are complied with while mining is illegally carried out. Additionally, workplaces are unsafe and there is very little record-keeping. Hence, we believe laws are complied with when company owners are interested in preventing investigations in the area. Also, there is nothing showing they could be spon-

taneously committed to fostering economic and social development for people in the area or the welfare of miners.

4. Analysis 3. the “paraíba tourmaline” case from an environmental standpoint (the federal police sete chaves operation)

In the information filed by the Federal Prosecution Office against the mining companies involved in the “Paraíba Tourmaline” case, the first environmental law violation mentioned was related to the lack of a valid environmental license for the companies’ operations. It should be noted that environmental licenses are the instruments enabling the authorities to control potentially damaging activities.

There are cases in which such damage is, to some extent, inevitable, and mining is one of them. In these cases of actual damage, “the relevant environmental body is tasked merely with trying to further mitigation, compensation, and rehabilitation” regarding the area (FARIAS, 2015, p. 169). In the case studied, there is no mention or proof that the parties involved in tourmaline mining, or the environmental agencies for that matter, have taken steps towards the environmental rehabilitation of the area where the mine was located. Farias & Ataíde (2017, p. 118) highlight that some projects must obtain an environmental license to operate. The authors also note that any and all activities that make use of environmental resources and are considered by licensing agencies to be actually or potentially polluting must go through the administrative environmental licensing procedure.

In this case, the information filed by the Federal Prosecution Office asserts that company Parazul did not hold the required environmental license, which shows the activity carried out there was illegal. Without a license, we may conclude that the authorities had no control over the mining company's operations or monitored the environmental damage that may have been caused there.

Because mining extracts non-renewable natural resources, as a rule this activity is deemed to have a severe impact on the environment. It is non-sustainable as well. However, despite its essentially detrimental effects on the environment, we must keep it mind that mining is important for our industrial society as it provides raw materials used by several sectors of the economy. Therefore, it is viewed as an essential activity for economic development.

Also in that regard, because mining is considered a strategic activity, under the law mining products are equivalent to governmental assets. As a result, these products may only be extracted upon authorization or concession by the government. The effects mining may have on the environment and the socioeconomic influence from the activity essentially depend on how operations have been planned and are to be carried out (MMA, 2001).

In the specific case of Operation "*Sete Chaves*," the Federal Prosecution Office and the Federal Police worked together to investigate the criminal organization and identify the participants and crimes they committed. The other purpose of the investigation was to, in the end, bring back to Brazil the gemstones illegally shipped to other countries.

The investigation only gained momentum in 2013 when inspectors from the National Department for Mining (DNPM), posing as buyers, found several polished paraíba tourmaline stones on display for sale at the International Fair of Precious Gemstones in Teófilo Otoni (MG). While gathering evidence, the Federal Police was visited by an expert on gem-

stones who lives in the US and told them all about how the criminal organization charged with the illegal mining of paraíba tourmaline operated. Based on such information, the Police got to company Parazul Mineração Comércio e Exportação Ltda., tasked by the criminal group with mining the stones in Paraíba.

Among the violations uncovered by the investigations during Operation *Sete Chaves*, the Federal Prosecution Office found that Parazul Mineração held neither a user permit or a mining decree – documents required for prospecting and mining the rough mineral that yields tourmaline. According to information obtained from the National Department for Mining (DNPM), the only document the company had was an expired prospecting permit.

By definition, sustainable development “takes into account the relationship between the economy and ecology. That means any and all industrial activities based on the exploration of non-renewable natural resources will consequently be ‘unsustainable’”. Given it is widely acknowledged that natural resources are finite, their extraction ultimately endangers the existence of such resources in the future. Hence, “there is no way of disregarding the paradox in some attempts at trying to characterize an activity like mining as sustainable when in fact it is based on extracting limited, non-renewable resources from nature” (SCOTTO, 2017, p. 41). That is why the authorities must step in, as they are responsible for protecting and overseeing activities that damage the environment.

Although the investigation carried out by the federal agencies in charge of Operation “*Sete Chaves*” did not look into the government’s responsibility for failing to oversee the activities run by the criminal group identified in the case, we could not but mention such responsibility. The government’s responsibility in cases such as that of “Paraíba Tourmaline” is clear, especially for the lack of valid licenses, authorizations, and concessions for the

companies, as well as for the absence of any inspections throughout the entire time mining was going on in the Paraíba city.

It must be noted that workers were exploited, licenses were expired, gemstones were extracted and taken to other states, armed security was in place at the mines, and still the authorities failed to act in view of such ostensible violations or exercise its law enforcement powers.

Also on the issue of law enforcement, described as administrative oversight by the authorities, Borges (2007, p. 94/95) says that their role of implementing environmental protection policies encompasses their power/duty to take damage preventing and mitigating steps, whether related to governmental projects or those run by the private sector. Therefore, it is safe to say that the authorities must have mechanisms in place to control operations that damage the environment in order to prevent – or mitigate – the harmful effects which some economic activities cause. The law gives the authorities the means to, coercively even, exert control (coercive power inherent to their administrative law enforcement power). Hence, the authorities cannot shirk their duties. The government's failure to fulfill those duties leads to the need of holding it accountable.

Back to Operation “*Sete Chaves*,” case no. 0000247-03.2015.4.05.8205 prosecuted at the Federal Court of the 5th Region in the state of Paraíba and originating from an information filed by the Federal Prosecution Office, the criminal activities listed in the complaint include theft of raw materials belonging to the government, ore mining without environmental licenses (art. 2 of law no. 8176/91 and art. 55 of Law no. 9605/98), and transnational criminal organization along with the use of firearms (art. 2paragraphs 2, 3 and 4, V, of Law no. 12850/2013). Aside from the crimes listed in the information, the MPF noted that other similar prosecutions may be brought on other crimes that may have been committed by members of the organization.

Although the information mentions other violations are likely to be found after that prosecution case, the environmental damage is clear in cases such as the one we studied. Still, such damage was not included in the charges. The way work was carried out, the equipment used by the organization to mine the gems, the damage caused to the district of São José da Batalha, the employment relations between miners and the companies involved, or the degradation to the mining area, none of that was brought up. In this case, we find several aspects related to mining activities were not dealt with by the Federal Prosecution Office – at least not along with the first charges. Also the environment, admittedly a vital system for an entire community's life, was initially overlooked and left out for future investigations.

5. Analysis 4. lifting the corporate veil doctrine and its use in environmental matters

The offenders' assets could be seized to ensure the damage caused by their illicit activities is redressed. In this section, we discuss how the Operation *Sete Chaves* case encompasses the procedural strategy of corporate veil lifting and how this approach, in this case meant to reach even silent partners, could aid the investigation secure more successful, effective punishment.

At first, the specific bases of procedural effectiveness in environmental matters should be outlined. It should be mentioned that studies about holding environmental offenders accountable by resorting to the environmental protection system may lead to greater procedural effectiveness in environmental matters. In that regard, Superior Court of Appeals Judge Antônio Herman Benjamin highlights that several unique

mechanisms may be used, such as expanding the roll of defendants, considering the idea of joint and several liability, and the peculiar possibility of corporate veil lifting (BENJAMIN, 1998, p.95).

The “anomalous use of the organization system corresponding to the legal person leading to an undesired outcome” (SILVA, 2002, p. 90) is grounds for disregarding the veil under Brazilian law, according to Osmar Vieira. The fraudulent use of a legal person reveals the material importance of piercing, for certain ends, the corporate veil (REQUIÃO, 1969, p. 14). However, we must keep in mind that this is an exceptional tactic, as Rubens Requião teaches us.

The disregard doctrine was created as a response to the use of corporate entity to defraud creditors, evade an existing obligation, circumvent a statute, or protect crime. Hence, as stated by US professor of law Wormser (1912, p. 517-518), the courts will regard the corporate company as an association of live men and women shareholders, and will do justice between real persons. Therefore, the corporate veil is lifted in a scenario where there is relevant social interest, especially in the event of environmental damage.

Under Brazilian law, there are two types of disregard that may be summed up into two theories. The greater theory requires proof of purpose deviation or commingling of assets (STJ, 2004). On the other hand, the lesser theory applies to consumer and environmental law. In these cases, all it takes for the veil to be lifted is for the legal personhood to be standing in the way of damage redress, according to Law 9605, art. 4.

In terms of the environment, corporate veil lifting honors the polluter pays and full or *in integrum* redress principles (STJ, 2012) and seeks to hold the offenders accountable for all impacts from their damaging conduct until the total and absolute *in natura* rehabilitation of the asset harmed. Regarding the environment, accountability may be seen

as a consequence of the search for the healthy development of human capabilities, the cornerstone in the process of individual freedom and self-determination and, therefore, the architect of the hard core of human dignity (SARLET, 1988, p. 53-74).

a) Launch of operation sete chaves and neglect of environmental issues

In the case studied, environmental issues were mostly overlooked. The investigation was restricted to administrative violations in the paraíba tourmaline mining process. This is an important matter that must be highlighted, considering Brazil's Constitution requires those who work in the mining industry to rehabilitate a damaged environment (Art. 225, paragraph 2, CRFB/88).

Generally speaking, mining devastates vegetation areas; significantly changes the shape and features of land surfaces; has an immediate visual impact from alterations to the natural landscape; and increases erosion by weakening the soil in the disturbed area. It also leads to landslides, silting, and obstruction of watercourses (BITAR, 1997, p. 9). Additionally, mining causes impacts, changes, or leaks into the surrounding land. For instance, the activity may damage the foundations of homes, buildings, transmission lines, streets, roads, and other structures close to mines.

In the specific case of paraíba tourmaline, excavations had to be taken relatively deep, 60 to 80 meters, because this mineral is not found near the surface (BRITO, 2013, p. 43). So, tourmaline mines left deep tunnels in the soil which were not duly reclaimed after the mining was completed.

In addition to the environmental and labor issues discussed here, the criminal organization has international tentacles which, in turn, required an examination of how Brazil behaves internationally with re-

spect to money laundering. Art. 7 of Decree no. 5015/2004 – which ratified the Palermo Convention – requires the adoption of “viable measures to detect and monitor the transnational movement of money and negotiable instruments.” However, the ever-multiplying scams to conceal such movement pose a challenge for control authorities and even compromise the efficacy of corporate veil lifting efforts.

On the other hand, the use of companies Liberty Gems and Js Gems reveals a sophisticated network operating through a chain of offshore companies along the way, such as Azizi Enterprises CO. LTD. and Azizi Gems and Minerals CO. They used asset-shielding schemes and resorted to strawmen. Upon getting back into the country, the money just sneaked past the Federal Revenue Service via transaction structuring (SPINELLI, 2003, p. 15) or smurfing – breaking down the amounts of money coming back to the country after having been laundered. The organization also relied on a spread-out chain of processors taking advantage of tax havens.

b) Grounds for using the disregard doctrine to reach silent partners and Federal Revenue Service regulatory instruction no. 1634/2016

The underhanded tactics used by criminal organizations to shield assets usually succeed at escaping the reach of disregard-based prosecutorial attempts at recouping damages (SHAAN, 2015, p. 50-51). They are often, and the case at hand is no exception, tools that enable money laundering schemes.

To tackle such challenges, it is our position that the corporate veil lifting doctrine should be used to reach the silent partners' assets to hold companies accountable regarding environmental damage which they

have tried to escape via asset shielding techniques, as in this case. After all, it is a type of disregard that makes it possible to lift the corporate veil in order to find those who actually profit from a company's operations and, therefore, reach the assets of occasional silent partners (2009, p. 132-133). A silent partner's assets could be seized because he/she is the actual controller (FARIAS, 2011, p. 508), even though the company itself does not show the deleterious hallmarks of purpose deviation or commingling of assets, given there is misconduct meant to conceal the intent to commit fraud (TOMAZETTE, 2007, p. 68).

The case at hand contains elements which justify lifting the corporate veil. Gems extracted by an unauthorized company were taken and "laundered" by another company, belonging to the brother of the mining company's owner. They were mixed with the latter company's legally mined stones (whose quality was absolutely inferior and worth much less in the market) and then shipped for polishing, all together, as though they had come from the same mine. Next, they were sorted out and smuggled out of the country, in a process involving international companies, money laundering, and other crimes.

Bringing the discussion to recently-enacted Brazilian law, Federal Revenue Service Regulatory Instruction no. 1634/2016 provides current, efficient mechanisms for detecting evidence of silent partners and identifying them. Despite the already extant requirement for entities domiciled abroad to have holders of rights in Brazil, such as in the case of offshore companies connected to AZIZI, under a registered CNPJ (art. 4, XV), the Instruction innovates by requiring that the registration information provided to get a CNPJ includes (art. 8) "the chain of ownership, up until the natural persons who are the end-beneficiaries" (our highlight).

In turn, end-beneficiaries (art. 8, paragraph 1) are those who "directly or indirectly own, control, or significantly influence the entity" or yet

“the natural persons on behalf of whom a transaction is carried out.” The significant influence mentioned in paragraph 1 refers to someone that “either directly or indirectly holds more than 25% of the entity’s capital,” or that “either directly or indirectly steers company decisions and has the power to elect most of the entity’s directors, albeit without a majority ownership position.”

Brazilian courts have been lifting the corporate veil to reach silent partners as well and hold them liable (TJ/RS, 1999; TJ/RS, 2004; TJ/RJ, 2006). Another ruling was also based on “lifting the corporate veil and extending liability to silent partners so that creditors may reach the assets of any of said silent partners” (TJ/ES, 2015).

The fight against money laundering is the crux of the Palermo Convention and regulations compelling governments to fulfill their commitment of investigating transactions. Money laundering must be looked into as part of a chain of other crimes and violations taking place in the course of the facts, such as environmental damage. Hence, we maintain that a government’s commitment to solving environmental crime has a clear international trait.

Considerations

Upon analyzing the legal, political, anthropological, and social aspects surrounding the Paraíba Tourmaline case, it is safe to say the illegal mining of rare minerals in the area of São José da Batalha – in the city Salgadinho/PB – involved a wide range of human rights violations. For over 20 years, the lack of formal registration of those in charge of the mines allowed them to evade taxes and hindered the authorities’ technical, environmental, and labor control. The criminal organization – which

was dismantled only in 2014 – was set up in such a way as to make the activity seem legitimate and turn the unlawfully mined products “legal.”

Because the quality of the minerals extracted from the mine in the state of Paraíba was higher than the quality of those mined in the neighboring state, the products from the Paraíba mine were sold at lower prices than those they would command in the international market – their main destination. With that, the people responsible for the illegal mining made vast amounts of money while wrecking the environment and failing to reclaim it. They also showed total disregard for the people living in the Paraíba city, upon denying them direct access to economic development by evading taxes that could fund and maintain public equipment and services that would have benefitted all. There were also questionable employment relations with miners, whose safety in the workplace was neglected, among other issues. In short, the offenders operated against the Brazilian mineral ownership system set by the 1988 Constitution, to the detriment of the federal government.

Specifically with respect to the socially undesired impacts from illegal paraíba tourmaline mining, we found that all cities where the activity is intense are plagued by low HDI rates. These cities have to deal with the irregular supply of public services – such as water distribution, harnessing and treatment, and access to electricity –, a feeble healthcare system, and the absence of proper landfills. Incidentally, the area in which these cities are located is based on family farming. Especially regarding the city of Salgadinho/PB, its HDI ranks among the worst in Brazil. This city is extremely dependent on funds provided by the federal government, despite its potential for becoming economically independent by taxing mines and the sale of rare minerals. These cities’ economic frailty is in stark contrast to the high prices commanded by the gems mined in their area, and the nefarious effects from all this are felt directly by the population.

The labor-related legal issues at the mines located in the area of São José da Batalha also reveal a criminal organization engineered to disguise violations of workers' protection laws and, ultimately, keep government inspectors at bay. In Salgadinho/PB, the only notice of violation issued was related to vacation leave and pay. Workplace safety, occupational accidents, or deaths, for instance, were neither looked into or punished. On the other hand, in the city of Junco do Seridó/PB, where mining focuses on low value-added kaolin, the prevailing violations include absolute disregard for employment regulations and indisputable contempt for the workers' human rights.

While analyzing the violations against environmental laws, we found that companies mining paraíba tourmaline in Salgadinho/PB lacked environmental licenses required to do so. However, a painstaking diagnosis of the information filed by the federal prosecution office allowed us to conclude that crimes related to illegal mining, gemstone smuggling, and the setup of the criminal organization were given greater weight by the investigators. Environmental offenses were largely overlooked in the case: there was no mention to how work was done; the material used to extract the mineral; a detailed description of the damage caused to the environment – or its consequences for the local community. There was also no word as to how offenders should make up for/redress the environmental damage they did.

The criminal organization's method of working was based on taking consecutive asset protection steps, i.e. resorting to money laundering techniques. Therefore, we believe such an investigation could benefit from lifting the corporate veil to reach a company's silent partner. That way, by doing away with the limitations to the offending company's liability, the authorities would be able to identify the actual persons prof-

iting from the operations and also seize the silent partners' assets to pay back debts and compensation for environmental damage. In the case analyzed, it was a matter of identifying and supplanting fraudulent intentions within the complex business context investigated because, as noted above, environmental protection depends on making sure those who are to blame for environmental damage are held to account.

In short, this was the case studied by the UFPB team of researchers. They focused on taking the rough research material and scientifically polishing it through the aspects chosen by the group, which among other things encompassed the human right to development, environmental law, labor law, constitutional law, regulatory law, right to property, law and economics, and international law, all of these tinged with the human rights of the populations affected.

References

ANM. Arrecadação da CFEM por substância. DIPAR – Diretoria de Procedimentos Arrecadatários. Agência Nacional de Mineração, 2018. Available at: <https://sistemas.dnpm.gov.br/arrecadacao/extra/Relatorios/arrecadacao_cfem_substancia.aspx>. Retrieved Apr 29, 2018.

ANSELMO, Márcio Adriano. Lavagem de Dinheiro e Cooperação Jurídica Internacional. São Paulo: Saraiva, 2013.

BAHIA, Alexandre G. M. Franco *et al.* Afetações aos Direitos Humanos devido à Mineração no Brasil. 2016. Available at: <http://www.conectas.org/arquivos/editor/files/informe_audie%CC%82ncia-minerac%CC%A7a%CC%83o%20revisado.pdf> Retrieved Feb 26, 2018

BARROS, Juliana Neves. Mineração e Violações de Direitos: O caso da empresa Kinross em Paracatu (MG). Justiça Global: Rio de Janeiro, 2017. Available at <<http://www.global.org.br/wp-content/uploads/2017/12/Minera%C3%A7%C3%A3o_e_Viola%C3%A7%C3%A3o_de_Direitos_Paracatu.pdf>. Retrieved Mar 1, 2018.

BASTIANETTO, Lorena Machado Rogedo; REZENDE, Élcio Nacur. A desconsideração da personalidade jurídica na convoluta sistemática legal da responsabilidade civil: uma abordagem inovadora à luz do Código de Processo Civil de 2015. Revista de Direito Civil Contemporâneo-[661].

RDCC (Journal of Contemporary Private Law), v. 11, p. 125-141, 2017.

BENJAMIN, Antonio Herman de Vasconcellos e. Responsabilidade Civil pelo Dano Ambiental. Revista de Direito Ambiental. p. 75-141. RDA 9/5. jan.-mar./1998.

BITAR, Omar Yazbek. Avaliação da recuperação de áreas degradadas por mineração na região metropolitana de São Paulo. 1997. 185f. Tese (Doutorado em Engenharia Mineral). Escola Politécnica da Universidade de São Paulo/SP.

BORGES, Guiomar Theodoro. Responsabilidade do Estado por dano ambiental. Revista Amazônia Legal de estudos sócio-jurídico-ambientais. Cuiabá. Ano 1, n. 1, jan/jun 2007, p.94/95.

BRASIL. Constituição Federal de 1988. Promulgated on October 5, 1988. Available at: <<http://www.planalto.gov.br>>. Retrieved Feb 10, 2018.

_____. Decreto nº 5.015, de 12 de março de 2004. Promulgated the UN Convention against Transnational Organized. Available at: http://www.planalto.gov.br/ccivil_03/_ato2004-2006/2004/decreto/d5015.htm>. Retrieved: Feb 10, 2018.

_____. IBGE. O Brasil em síntese. Rio de Janeiro: IBGE, 2017. Available at <https://cidades.ibge.gov.br>.

_____. Instrução normativa da Receita Federal nº 1.634/2016. Regulates the National Register of Juridical Persons (CNPJ). Available at: <<http://normas.receita.fazenda.gov.br>>. Retrieved: Feb 10, 2018.

_____. Instrução Normativa SEFIN Nº 003 de 08 de outubro de 2015 do Município do Rio Branco/AC. Disciplina o rito Do Processo Administrativo De Apuração Das Infrações De Fornecedores – PAAIF e o procedimento para aplicação de sanções administrativas de natureza pecuniária ou restritivas de direitos ao fornecedor, de que trata o Decreto nº 1.127 de 12 de setembro de 2014. Available at: < <http://portalcgmrriobranco.ac.gov.br>> Retrieved: Feb 10, 2018.

_____. **Lei nº 6.938**, de 31 de agosto de 1981. Dispõe sobre a Política Nacional do Meio Ambiente, seus fins e mecanismos de formulação e aplicação, e dá outras providências. Available at: <http://www.planalto.gov.br/ccivil_03/leis/L6938.htm>. Retrieved: Feb 10, 2018.

_____. Presidência da República. Casa Civil. *Decreto nº 6.270, de 22 de novembro de 2007*. Promulga a Convenção nº 176 e a Recomendação nº 183 da Organização Internacional do Trabalho (OIT) sobre Segurança e Saúde nas Minas, adotadas em Genebra, em 22 de junho de 1995, pela 85ª Sessão da Conferência Internacional do Trabalho. Available at: < <http://www2.camara.gov.br/legin/fed/decret/2007/decreto-6270-22-novembro>.>

_____. Presidência da República. Casa Civil. Decreto Nº 7.602, de 7 de novembro de 2011. Dispõe sobre a Política Nacional de Segurança e Saúde no Trabalho - PNSST. Available at: http://www.planalto.gov.br/ccivil_03/_ato2011-2014/2011/decreto/d7602.htm

_____. Superior Tribunal de Justiça. **Recurso Especial nº. 497.447-MT** (2002/0118750-1), rel. orig. Ministro Herman Benjamin. j. 14.08.2012, DJe 09.05.2013. Available at: <<https://ww2.stj.jus.br/processo>>. Retrieved Feb 10, 2018.

_____. Superior Tribunal de Justiça, **REsp nº 279273-SP**, rel. orig. Min. Ari Pargendler, rel. p/ac. Min. Nancy Andrigli, mv., j. 4.12.2003, DJU 29.3.2004. Available at: <<https://ww2.stj.jus.br/processo>>. Retrieved Feb 10, 2018.

_____. Tribunal de Justiça do Rio Grande do Sul. **Apelação Cível nº 70012622171**. Relator: Adão Sérgio do Nascimento Cassiano, 22 nov. 2006. Available at: <www.tjrs.jus.br>. Retrieved: Feb 10, 2018.

_____. TRF4, AG 5027793-49.2015.404.0000, Quarta Turma, Relatora Vivian Josete Pantaleão Caminha, juntado aos autos em 04 set. 2015. Available at: <<http://jurisprudencia.trf4.jus.br>>. Retrieved: Feb 10, 2018.

_____. TJ/SP, 36ª Câmara de Direito Privado. Processo n. 2104873-32.2014.8.26.0000; Relator(a): Maria de Lourdes Lopez Gil, 23 out. 2014. Available at: <www.tjsp.jus.br> Retrieved: Feb 10, 2018.

_____. TJ/ES, Ag. nº 0031391-14.2014.8.08.0024, rel. Des. Amyr Carlos de Souza Filho, 12 de maio de 2015. Available at: <www.tjes.jus.br> Retrieved: Feb 10, 2018.

_____. TJ/RS, Ac. 2ª Câmara Especial Cível, ApCív. 70005749510 – comarca de Tapejara, rel. Desa. Cláudia Maria Hardt, j. 15 abr. 2004 p.1-9; Available at: <www.tjrs.jus.br> Retrieved: Feb 10, 2018.

_____. TJ/RS, ApCív 598586196, 1ª Câmara de Férias Cível, rel. Luiz Felipe Silveira Difini, Julgado em 15 jun. 1999. Available at: <www.tjrs.jus.br> Retrieved Feb 10, 2018.

_____. TJ/RJ - 7ª Câm. Cível; ACi nº 2006.001.04456-RJ, rel. Des. José Geraldo Antonio, j. 28 mar. 2006. Available at: <www.tjrj.jus.br>. Retrieved Feb 10, 2018.

_____. TJ/SC, MS nº. 2013.053581-9, relator: Stanley da Silva Braga, j. 11 jun. 2014; Available at: <<http://app6.tjsc.jus.br>>. Retrieved: Mar 17, 2017.

_____. TJ/GO, 1ª Vara da Fazenda Pública na Comarca de Goiânia/GO, Execução Fiscal, nº: 0453397.80.2007.8.09.0051, juíza de direito Zilmene Gomide da Silva Manzolli, j. 12 set. 2016. Available at: <<http://www.tjgo.jus.br/tjdocs>>. Retrieved: Feb 10, 2018.

_____. TRT/SP, 2ª Vara do Trabalho de Sertãozinho/SP, nº RTO rd-0052000-55.2009.5.15.0054, juiz titular da Vara do Trabalho, Renê Jean Marcho Filho, j. 07 de maio de 2015. Available at: <<https://dejt.jt.jus.br/dejt/f/n/diariocon>>. Retrieved: Feb 10, 2018.

_____. TJ/RO, 2º Vara Cível da Comarca de Cerejeiras/RO, Ação Civil de Improbidade administrativa, nº 0000246-51.2012.8.22.0013, juíza de direito Roberta Cristina Macedo, j. 10 mar. 2014. Available at: <<https://www.tjro.jus.br/novodiario>>. Retrieved: Feb 10, 2018.

_____. TJ/RJ, 6ª Vara do Trabalho de Nova Iguaçu/RJ, nº RTO rd-0010220-21.2014.5.01.0226, juiz do trabalho Marcelo Ribeiro da Silva, 16 fev. 2017. Available at: <<https://dejt.jt.jus.br/dejt/f/n/diariocon>>. Retrieved: Feb 10, 2018.

_____. TJ/SP, 15º Vara Cível da Comarca de São Paulo/SP, Execução de Título Extrajudicial, nº 1003837-18.2015.8.26.0100, juíza de direito Celina Dietrich Trigueiros Teixeira Pinto, j. 18 ago. 2015. Available at: <<https://www.dje.tjsp.jus.br>>. Retrieved: Feb 10, 2018.

_____. TJ/DF, 23ª Vara Cível de Brasília, nº 2015.01.1.053071-6, Embargos de Terceiro, juiz de Direito Substituto Redivaldo Dias Barbosa, 12 ago. 2015. Available at: <<https://tjdf199.tjdft.jus.br/dje/djeletronico>>. Retrieved: Feb 10, 2018.

BRASILEIRO, Adriana. **Brazilian mines produce world's priciest gems under fire**. 2016. Available at: <<https://www.reuters.com/article/us-brazil-tourmaline-mines/brazilian-mines-produce-worlds-priciest-gems-under-fire-idUSKCN0Z3oO5>> Retrieved Oct 30, 2017.

BRITO, Violeta Vieira de. **A Turmalina Paraíba e seus cenários**. 2013. 61f. Monografia (Bacharelado em Geografia). Universidade Federal da Paraíba/PB.

COELHO, F. de S, CROZATTI, J., SILVA, V. C. Para onde vai o dinheiro público? Casos de discrepância entre receita corrente per capita e desenvolvimento municipal no Brasil. Relatório de Pesquisa, USP LESTE, 2015. Available at: <http://each.uspnet.usp.br/imprensa/relatorioreportagem.pdf>.

CONFORTI, Luciana Paula. **A interpretação do conceito de trabalho análogo ao escravo no Brasil: o trabalho digno sob o prisma da subjetividade e a consciência legal dos trabalhadores**. CONPEDI Brasília-DF, em julho/2017, com publicação eletrônica. Available at: <<https://www.anamatra.org.br/files/ConpediFINAL.pdf>> Retrieved Oct 30, 2017.

COMPARATO, Fábio Konder; SALOMÃO FILHO, Calixto. **O poder de controle na sociedade anônima**. Rio de Janeiro: Ed Forense, 2008.

DE SOUZA, Marcelo Gomes. **Direito Mineral e Meio Ambiente**. Belo Horizonte: Del Rey, 1995.

DNPM. **Arrecadação CFEM**. Departamento Nacional de Produção Mineral. Ministério de Minas e Energia. Governo Federal. Available at: <https://sistemas.dnpm.gov.br/arrecadacao/extra/Relatorios/arrecadacao_cfem.aspx>. Retrieved Sep 13, 2017.

FARIAS, Cristiano Chaves. **Direito Civil: Teoria Geral**. 9.ed., Rio de Janeiro: Ed. Lumen Juris, 2011, p. 508.

FARIAS, Talden; ATAÍDE, Pedro Henrique Sousa de. Mineração e Infraestrutura: considerações acerca do licenciamento ambiental. In: SION, Alexandre Oheb (Coord.). **Empreendimentos de infraestrutura e de capital intensivo: desafios jurídicos**. Belo Horizonte: Del Rey, 2017, p. 113/130.

FARIAS, Talden. **A atividade minerária e a obrigação de reparar a área degradada**. RDA, ano 20, vol. 79, jul/set. 2015, p. 157/187.

FEITOSA, Maria Luiza Alencar Mayer. Direito Econômico do Desenvolvimento e Direito Humano ao Desenvolvimento. Limites e Confrontações. In: FEITOSA, Maria Luiza Alencar Mayer *et alii* (org.). **Direitos Humanos de Solidariedade: Avanços e impasses**. Curitiba: Appris, 2013, p. 171-241.

FEITOSA, Maria Luiza Pereira de Alencar Mayer e COSTA NETO, Juvêncio de Almeida. Regime Jurídico do Aproveitamento dos Recursos Minerais. Livro em comemoração aos 30 anos da Constituição Brasileira. No prelo.

FRANCO, Fernanda Cristina de Oliveira; FEITOSA, Maria Luiza P. de Alencar Mayer. Desenvolvimento e direitos humanos. Marcas de inconstitucionalidade no processo Belo Monte. Revista Direito GV, [S.l.], v. 9, n. 1, p. 93-114, jan. 2013. ISSN 2317-6172. Available at:

<<http://bibliotecadigital.fgv.br/ojs/index.php/revdireitogv/article/view/20892/19617>>. Retrieved: Feb 21, 2018.

FRITSCH, Emmanuel, SHIGLEY, James E., ROSSMAN, George R., MERCER, Meredith E., MUHLMEISTER, Sam M., MOON, Mike (1990) Turmalinas Cuprian-Elbaite de Gem-Qualidade de São José Da Batalha, Paraíba, Brasil. In: **Gems & Gemology**, 26 (3). pp. 189-205. ISSN 0016-626X. Available at: <<https://authors.library.caltech.edu/39701/>>. Retrieved Oct 13, 2017.

FURTADO, F., FAUSTINO, C. Mineração e violação de direitos: o projeto Ferro Carajás S11D da Vale S.A. Relatório da Missão de Investigação e Incidência. Açailândia, Available at http://global.org.br/wp-content/uploads/2013/10/relatorio_missao_carajas.pdf.

FURUYA, Masashi. Copper-Bearing Tourmalines from New Deposits in Paraíba State, Brazil. In: **Gems & Gemology**, vol 43, n. 3, 2007. Available at:<<https://www.gia.edu/gems-gemology/fall-2007-copper-bearing-tourmalines-paraiba-brazil-furuya>>. Retrieved Oct 12, 2017.

GAMA, Aliny. **Vice-presidente da Assembleia da PB é suspeito de extração ilegal de pedras preciosas**. Uol. Política, 2015. Available at: <<https://noticias.uol.com.br/politica/ultimas-noticias/2015/05/27/vice-presidente-da-assembleia-da-pb-e-suspeito-de-extracao-de-pedras-preciosas.htm>>. Retrieved Jan 8, 2018.

GUSMÃO, Mônica. **Lições de Direito Empresarial**. 8ª ed., Rio de Janeiro: Editora Lumen Juris, 2009.

JANSEN, Roberta. **Rara turmalina paraíba só é encontrada em cinco minas em todo o planeta, três delas no Brasil**. O Globo. Available at: <<https://oglobo.globo.com/ela/gente/rara-turmalina-paraiba->

so-encontrada-em-cinco-minas-em-todo-planeta-tres-delas-no-brasil-16953562>. Retrieved Apr 29, 2018.

JUSTICE, Global. **Non-state actors and human rights**. Oxford: Oxford University Press, 2005, p. 221-222.

LAURS, Brendan M., ZWAAN, JC, BREEDING, Christopher M., SIMMONS, William B. (Skip), BEATON, Donna, RIJSDIJK, Kenneth F., BEFI, Riccardo, FAUSTER, Alexander U. Copper-Bearing (Paraíba-Type) Tourmaline from Mozambique. In: **Gems & Gemology**, vol 44, n. 1, 2008. Available at: <<https://www.gia.edu/gems-gemology/spring-2008-copper-bearing-tourmaline-mozambique-laurs>> Retrieved Oct 13, 2017.

MELLO, Alessandra. **Deputado mineiro é investigado por propina de 500 mil dólares**. EM. Política, 2015. Available at: <https://www.em.com.br/app/noticia/politica/2015/12/07/interna_politica,714779/deputado-mineiro-e-investigado-por-propina-de-500-mil-dolares.shtml>. Retrieved Jan 8, 2018.

MILANEZ, B., SANTOS, R. S. P. de, PINTO, R. G. Mineração e violações de direitos humanos: uma abordagem construcionista. In Homa Publica: Revista Internacional de Direitos Humanos e Empresas. 1. 130-167, 2016.

MILARÉ, Edis. **Direito do Ambiente**: doutrina, jurisprudência, glossário. 2. Ed. São Paulo: Revista dos Tribunais, 2001.

MINISTÉRIO DO MEIO AMBIENTE. **Manual de Normas e Procedimentos para Licenciamento Ambiental no Setor de Extração Mineral**. Brasília. 2001.

MINISTÉRIO PÚBLICO DO TRABALHO. Inquérito Civil n. 343/2011. Available at: www.prt13.mpt.gov.br.

MPF/PB. Turmalina paraíba: **MPF denuncia 11 pessoas por lavagem de capitais**. Ministério Público Federal na Paraíba. 2015-a. Available at: <<http://www.mpf.mp.br/pb/sala-de-imprensa/noticias-pb/turmalina-paraiba-mpf-denuncia-11-pessoas-por-lavagem-de-capitais>>. Retrieved Apr 29, 2018.

_____. **MPF começou a investigar o tráfico da turmalina Paraíba a partir de denúncias da imprensa**. Ministério Público Federal na Paraíba. Sítio oficial, 2015-b. Available at: <<http://www.prpb.mpf.mp.br/news/1docs/OP7ChavesPressKit.pdf>>. Retrieved Sep 10, 2017.

_____. Denúncia. **Manifestação nº 729/2015-MPF/PRM/PT**, 2015.

MOSCOGLIATO, Marcelo. Exploração de recursos minerais: questão ambiental ou patrimonial? In: **Anais do 4º Congresso Internacional de Direito Ambiental**. São Paulo: IMESP, de 4 a 7 de Julho de 2000.

NERY JÚNIOR, Nelson; ANDRADE NERY, Rosa Maria Barreto Borriello de. O Ministerio público e a responsabilidade civil por dano ambiental. **Justitia**, São Paulo, v. 55, n. 161, jan./mar. 1993, p. 62-63. Available at: <<http://www.justitia.com.br/links/edicao.php?ID=161>>. Retrieved Mar 15, 2017.

ONU. **Agenda 2030 para o Desenvolvimento Sustentável**, 2016. Available at: <<http://www.agenda2030.org.br>>. Retrieved: Feb 10, 2018.

_____. **Objetivos de Desenvolvimento do Milênio**, 2000. Available at: <<https://nacoesunidas.org/tema/odm/>>. Retrieved Feb 10, 2018.

PARAÍBA. Diagnóstico Socioeconômico da Paraíba: unidade e diversidade territorial. João Pessoa: Governo do Estado, 2012.

PETERKE, Sven. Os direitos humanos coletivos e a proteção dos direitos fundamentais da humanidade: avanços e impasses. In: **Direitos humanos**

de solidariedade. FEITOSA, Maria Luiza Alencar Mayer, FRANCO, Fernanda Cristina Oliveira, PETERKE, Sven, VENTURA, Victor Alencar Mayer Feitosa (Orgs). Curitiba: Appris, 2013.

PIOVESAN, Flávia. **Direitos humanos e justiça internacional:** um estudo comparativo dos sistemas regionais, europeu, interamericano e africano. 2ª ed. São Paulo: Saraiva, 2011.

PROGRAMA DAS NAÇÕES UNIDAS PARA O DESENVOLVIMENTO. Atlas de Desenvolvimento Humano. Available at <http://atlasbrasil.org.br/2013/>.

REQUIÃO, Rubens. Abuso de direito e Fraude através da personalidade jurídica. **Revista dos tribunais**, ano 58, volume 410, dezembro de 1969.

ROCHA, Maria de Nazaré Medeiros. O Tribunal Superior do Trabalho e o meio ambiente do trabalho: análise qualitativa da jurisprudência relativa ao trabalho em minas. 2013. 425 f. Dissertação (Mestrado) - Universidade Federal do Pará, Instituto de Ciências Jurídicas, Belém, 2013. Programa de Pós-Graduação em Direito.

RODRIGUES, Marcelo Abelha. **Elementos de direito ambiental.** 2. ed. São Paulo: Ed. RT, 2005.

SAADI, Ricardo Andrade, Camila Colares BEZERRA. A Autoridade Central no Exercício Da Cooperação Jurídica Internacional [...] **In: Brasil. Secretaria Nacional de Justiça. Departamento de Recuperação de Ativos e Cooperação Jurídica Internacional. Manual de cooperação jurídica internacional e recuperação de ativos:** cooperação em matéria penal / Secretaria Nacional de Justiça, Departamento de Recuperação de Ativos e Cooperação Jurídica Internacional (DRCI). – 3. ed. Brasília: Ministério da Justiça, 2014.

SARLET, Ingo Wolfgang. **Dignidade da Pessoa Humana e Direitos Fundamentais na Constituição de 1988**, Imprensa: Porto Alegre, Livr. do Advogado, 2007, p. 53-74.

SEONE, José; TADDEI, Emílio; ALGRANATI, Clara. **Mineria Transnacional y resistências Sociales Em Africa y America Latina: Experiências de resistência y e mobilizacion social frente a las estrategias corporativas de las companhias Vale (Brasil) y Anglo Gold Ashanti (Sudáfrica) en Argentina, Colombia, Peru, Angola y Mozambique. Diálogo de los Pueblos y Grupo de Estudios sobre América Latina y el Caribe (Geal). GEAL: 2011. Available at <<file:///C:/Users/ylira/Downloads/1316466179.DTFLACSO_2011_Taddei.pdf>>** Retrieved Feb 27, 2018.

SCOTTO, Gabriela. Sobre mineração, sustentabilidade e alquimia: algumas reflexões sobre os paradoxos da *mineração sustentável*. **Boletim Petróleo, Royalties e Região**. Campos dos Goytacazes/RJ. Ano XV, nº 58, dez. 2017, p. 40/43.

SHAAN, Gerson Dagord. Tipologias de Blindagem Patrimonial, formas de atuação de “laranjas”, empresas *offshore* e técnica de investigação. **Revista TST**, Brasília, vol. 81, nº4, out/dez 2015.

SILVA, Dilsom Barros da. Aspectos sócio-econômico-ambientais do processo de extração do caulim no município de Junco do Seridó-PB. 101 f. Dissertação (Mestrado em Geografia) – Universidade Federal da Paraíba, João Pessoa, 2011.

SILVA, Osmar Vieira da. **Desconsideração da Personalidade Jurídica: aspectos processuais**. Rio de Janeiro: Renovar, 2002.

SPINELLI, Enory Luiz. **Lavagem de dinheiro: Um problema mundial legislação brasileira**. Rio Grande do Sul: Conselho Regional de Contabilidade do Rio Grande do Sul, 2003.

SVAMPA, Maristela. **Consenso de los commodities, giro ecoterritorialy pensamiento crítico em América Latina**. Consejo Latinoamericano de Ciencias Sociales, Observatorio Social de América Latina (Osal). Año XIII, n. 32, publicación semestral/nov. 2012. Available at: <<http://maristellavampa.net/archivos/ensayo59.pdf>> Retrieved Mar 1, 2018.

SKALWOLD, Elise A., RENFRO, Nathan. Stars are out in Paraíba Tourmaline. *In: Gems & Gemology*, vol. 5, nº 4, 2015. Available at: <<https://www.gia.edu/Gems-Gemology/Winter-2015-Microworld-Stars-Are-Out-Paraiba-Tourmaline>> Retrieved Oct 13, 2017.

TOMAZETTE, Marlon. **Direito Comercial**. 3ª ed., Brasília: Fortium Editora, 2007.

TOURMALINE QUALITY FACTORS. *In: Gems & Gemology*. Available at: <<https://www.gia.edu/tourmaline-quality-factor>> Retrieved Oct 10, 2017.

WORMSER, Maurice. Piercing the Veil of Corporate Entity. 12 Colum. L. Rev. 496 . 1912. p. 517-518. Available at: <<https://www.jstor.org>>. Retrieved: Feb 10, 2018.

Systemic Analysis of a Niobium Company's Sustainability – Araxá (MG)

*Elisabete Maniglia*³⁶⁸

*José Duarte Neto*³⁶⁹

*Paulo César Corrêa Borges*³⁷⁰

*Victor Hugo de Almeida*³⁷¹

*Raquel das Neves Rafael*³⁷²

Introduction

Peripheral and developing countries devastate natural resources, either renewable or not, and displace entire populations who are often-times unarmed and defenseless, to set up mega development projects. These populations have their human rights clearly violated, notably with respect to the principle of human dignity, as the exploitation of workers there goes beyond breaches of labor laws (BORGES, 2015).

In order to analyze mining's impacts in terms of human rights in an effort to detect occasional violations of these rights and/or identify the good practices in place to prevent infringement of rights, a team of researchers from UNESP, Franca Campus/SP, conducted a field study that looked into the sustainability of niobium mining in Araxá (MG).

The study was based on theories and methods shared by the Latin American Graduate Consortium on Human Rights under the project called Policies for the Regulation of Transnational Corporations due to Human Rights Violations in Latin America. As study methods, we reviewed the literature and gathered data via techniques of simple observation and interview. The information was analyzed by means of the deductive method.

The field research comprised a technical visit to *Companhia Brasileira de Metalurgia e Mineração* (CBMM) in Araxá (MG), and another to the City Council to speak with the representatives of the people in that city.

This scientific report addresses: aspects related to the operations and niobium mining in Brazil and other countries; aspects related to niobium exports, imports, and use; the Code of Ethics and Conduct of the studied company; its compliance policy; and aspects related to environmental and workplace issues, among others.

1. Methodology

This multi-method approach is based on the use of several research techniques to understand the examined phenomenon. Initially, we reviewed the literature to understand the environmental, workplace, and production background in the mining industry. Mining industry regulations were also examined. In this phase, we went through published materials such as scientific papers, legislation, international conventions (ILO's, especially), and news articles run by newspapers, magazines, and websites, among others.

We also gathered data via simple observation at the company studied, i.e. CBMM in Araxá (MG). This technique is ideal for obtaining information about aspects of the reality investigated using one's senses (MARCONI; LAKATOS, 2010). We also sought information from representatives and Araxá (MG) city councilors to gather data directly from the leading players in the background investigated, namely CBMM and local legislators (as representatives of the local community).

After the visit to CBMM on October 5, 2017, when managers and workers were observed and interviewed, the team discussed the data gathered by each member. CBMM was chosen to take part in this study because it is the mining company closest to the Human and Social Sciences School at Universidade Estadual Paulista “Júlio de Mesquita Filho” -ranca Campus, the education and research institution to which the researchers belong.

CBMM is located in Araxá (MG), approximately 170 km from the city of Franca (SP), and turns out 80% of the worldwide niobium output. Ninety-eight percent of the mineral's known reserves are in Brazil. The country accounts for more than 90% of the volume traded around the world, followed by Canada and Australia. Araxá (MG) holds reserves expected to last 200 years, at the current rate the mineral is being used (BRANCO, 2016).

CBMM employs approximately 1,800 people. Workers are outsourced only for specific roles such as, for instance, front desk, transport, and armed and unarmed surveillance jobs. Finally, in order to find occasional violations of miners' working conditions in the city of Araxá (MG), we gathered information by searching court decision records on the website of the State Labor Court in the 3rd region³⁷³ (<http://www.trt3.jus.br>), whose jurisdiction includes the aforementioned city, using the following key words: CBMM; *mineração* (mining); *minério* (mineral).

³⁷³ We did not review the decisions by the Superior Labor Court given this court does not reexamine points of fact, under Precedent no. 126 of the Superior Labor Court.

Then, we gathered information by searching documents (GIL, 2014)³⁷⁴ available from *Sistema Mediador*,³⁷⁵ run by the Ministry of Labor (BRASIL, s.d.b), to look into collective bargaining agreements signed in that area by Companhia Brasileira de Metalurgia e Mineração (CBMM). For the search, we typed “CBMM” in the “*Razão Social*” (corporate name) field from the “*Participante*” (party) tab. In the “*Vigência*” (agreement term) from the “*Categoria*” (category) tab, we selected the option “*Todos*” (all). Then, the returned results were analyzed to find collective clauses related to this study’s goal.

Contrary to our original plans, we were unable to gather information about inspections of working conditions in Araxá (MG) mines because the Regional Office of Labor and Employment in Patos de Minas (BRASIL, 2016) and the Labor Prosecution Office, also in Patos de Minas, whose jurisdictions include the area studied (BRASIL, s.d.a), refused to participate.

Finally, the information gathered (from the literature, documents, court decisions, and deriving from simple on site observation) were analyzed using the deductive method in order to arrive at individual conclusions about occasional violations of mining working conditions by CBMM in the area of Araxá (MG), as well as to look into the environmental and workplace practices adopted by said company.

1.1. Ethical procedures related to data gathering via simple observation and interviews at CBMM

374 Although our literature review is consistent with our document review, it should be noted that the former is based on materials already published, while the latter is based on materials which have not been analytically reviewed or which may yet be reviewed according to specific research goals. (GIL, 2014).

375 This is a platform run by the Brazilian Minister of Labor and in which all collective bargaining agreements signed in Brazil must be prepared and recorded.

Ethics-wise, it should be noted that according to art. 1, item II, of the National Health Council's Resolution no. 510 of April 7, 2016, "The following will not be recorded or evaluated by the CEP/CONEP system: (...); II – research using information accessible by the public, under Law no. 12527 of November 18, 2011" (CONSELHO NACIONAL DE SAÚDE, 2016). Such provision exempts information collected from the website of the State Labor Court in the 3rd region and from the Ministry of Labor's *Mediador* platform from being submitted to the Ethics Committee, under Resolution no. 510/2016.

Therefore, this study was submitted to the School of Human and Social Sciences' Ethics Committee solely with respect to data collection via the techniques of simple on-site observation and interviews with company representatives and city councilors.

2. Report on the technical visit and interview at Companhia Brasileira de Metalurgia e Mineração (CBMM)

During the field research, the Group of Researchers at UNESP – School of Human and Social Sciences, Franca Campus/SP, included the following members of the Graduate Law Program's Team of Researchers: 1) Prof. Dra. Elisabete Maniglia, representative to the Consortium and coordinator of the Group at UNESP; 2) Prof. Dr. José Duarte Neto, current coordinator of the Graduate Law Program/UNESP/Franca; 3) Prof. Dr. Paulo César Corrêa Borges; 4) Ms. Raquel das Neves Rafael; and 5) Prof. Dr. Victor Hugo de Almeida, current vice coordinator of the Graduate Law Program/UNESP/Franca.

Founded in 1955, CBMM is a Brazilian privately-held mining company located in Araxá, state of Minas Gerais, where the largest niobium reserves are found. After having invested in niobium technology for decades, CBMM has become the top niobium producer in the world. The company is also the only one operating across the board in this mineral's market.

Regarding the company's current ownership, Grupo Moreira Salles has been the controlling shareholder since 1965, with Brazilian capital and holder of 70% of shares. A Japanese-Korean consortium holds 15% of shares and a consortium of Chinese companies holds the other 15%. Hence, foreign capital accounts for 30% of the company's capital.

It should be noted that the Asian shareholders have limited access to the board of directors and that is why they have no access to the technology developed by the company to make niobium products. Additionally, they do not hold any executive offices in the company. However, although they get to buy niobium at market prices, their ownership interest makes sure CBMM supplies them with the mineral – which is strategic for those countries' manufacturing industry.

The company's making up the Japanese-Korean consortium are: Nippon Steel & Sumitomo Metal Corporation; JFE Steel Corporation; Sojitz Corporation; Japan Oil, Gas and Metals National (JOGMEC); and POSCO and EQ Partners Global PEF.

The Chinese consortium member companies are: CITIC Group Corporation; Baosteel Group Corporation; Anshan Iron & Steel Group Corporation; Taiyuan Iron & Steel Group and TISCO; and Shougang Steel Corporation.

CBMM has four subsidiaries, namely: CBMM TECHNOLOGY SUISSE AS, in Geneva, Switzerland; CBMM ASIA PTE. LT, in Singapore;

CBMM EUROPE BV, in Amsterdam, the Netherlands; and CBMM NORTH AMERICA, in Bridgeville, the US.

In 1972, CBMM signed a contract with state-run company Codemig, formerly Camig, laying out the strategy to maximize the mining of niobium reserves in Araxá. Under such contract, Codemig has a 25% share in the adjusted net profit from the entire niobium operation, including the sale of products from CBMM's mining rights and profits from the subsidiaries subsequently brought in by CBMM.

Such contract derives from the rights granted both to CBMM and the State Government of Minas Gerais on the mining of the pyrochlore reserve in Araxá. Hence, a partnership between them was set up at Codemig's request. This partnership was meant to allow them to jointly profit from the pyrochlore mined.

CBMM and Codemig set up a corporation to be jointly run and whose business decisions required unanimous consent, i.e. Companhia Mineradora do Pirocloro de Araxá (Comipa). CBMM and Codemig then leased their mining rights to this corporation.

The contract was authorized by the State Governor of Minas Gerais to remain in effect for 60 years. Contract provisions allowed it to be terminated upon mutual consent only after 30 years counted from its effective date. In 2002, this 30-year term expired without the parties' saying anything about their interest in terminating it.

Comipa mines pyrochlore ore in equal parts from each reserve and sells exclusively to Codemig at cost, added a 5% profit margin for beneficiation, industrialization, and sales. Beneficiation takes more than 15 phases until the marketable end-product is achieved.

CBMM employs approximately 1,800 people, 70 of them to do the gardening alone. It outsources people solely for some specific jobs such as, for instance, front desk, transport, and (armed and unarmed) surveillance.

2.2. Niobium reserves and output in The World and Brazil

The world's largest niobium reserves are in Brazil, followed by Canada (in the provinces of Quebec and Ontario); Australia (specifically Western Australia); Egypt; the Democratic Republic of the Congo; Greenland, a territory belonging to Denmark; Russia (notably in Siberia and the Republic of Yakutia); Finland; Gabon; Tanzania; and others (DNPM, 2014). Worldwide, Brazil holds 98% of niobium reserves. Production-wise, this mineral's share in the market is 93.7% (DNPM, 2014).

However, CBMM claims it is a myth that Brazil holds the largest reserves given that the main niobium deposits are mostly found in carbonate rock, which is known to exist in 527 localities around the world. However, only 85 have been studied to have their reserves/resources ascertained and rated.

Costly geological studies are required to identify and rate these reserves. For instance, drilling a probe hole costs approximately BRL 70,000.00 (setenta mil reais), and takes technical knowledge, investment capability, and proper management (CBMM, 2017).

In Brazil, minable niobium reserves are located in the states of Minas Gerais, Amazonas, Goiás, and Rondônia. In Minas Gerais, the main reserves are found in Araxá, where there is a minable reserve containing 411,500 metric tons of pyrochlore ore. In Goiás, the main reserves are in Catalão, whose minable reserve holds 106,800 metric tons of pyrochlore ore. In Amazonas, the Pitinga mine's reserve contains 159,700 metric tons of columbite-tantalite ore. Min-

able reserves in Rondônia contain 42,100 metric tons, holding an average of 0.23% to 2.34% niobium oxide (DNPM, 2015).

Minas Gerais is home to 75% of Brazil's reserves; Amazonas, 21%; and Goiás, 3%. In Roraima and Amazonas, there are reserves which are not mined as they are on border areas or indigenous reservations. There are no plans for new mines there (CPRM, 2016).

CBMM and Mineradora Catalão de Goiás account for nearly the entire niobium output in Brazil. Niobium ranks third in the country's mineral exports, following iron and gold. Its increased demand is owed to Brazilian producers, who have been doing their utmost to find new buyers across the world (CPRM, 2016).

Brazil has not sold raw niobium ore or niobium concentrate since the 1970s. The run-of-mine mineral is turned into ferroniobium alloy and products made using the metal. The ferroniobium alloy contains 66% niobium and 30% iron (CPRM, 2016).

CBMM turns out ferroniobium, niobium oxide, vacuum grade niobium alloys, niobium metal, and special niobium compounds. In turn, Mineração Catalão de Goiás supplies only ferroniobium (CBMM, 2017). Because the Araxá mine is open-cast, explosives are not used to extract niobium, only dump trucks and excavators.

2.3. Niobium exports by Brazil

Ferroniobium exports soared 110% in 10 years, from 33 metric tons in 2003 to 70 metric tons in 2012. The worldwide demand increased at a rate of 10% a year, mostly owing to purchases from the Chinese. China realizes the benefits from using niobium in infrastructure works and to build lighter structures that do not deteriorate over time and whose environmental impact is lower (CPRM, 2016).

In 2014, Brazil exported nearly 71 metric tons of ferroniobium alloy containing 47 metric tons of niobium. The tax revenue from exports reached USD 1.7 billion. The main importers were from the Netherlands, at 29%; China, at 22%; Singapore, at 16%; the United States, at 14%; and Japan, at 11% (DNPM, 2015).

CBMM does not export the ore but higher value-added processed products. The company accounts for 80% of such products. Approximately 60 metric tons of minerals are required to obtain one metric ton of niobium (CBMM, 2017).

2.4. Imports and domestic use of niobium in Brazil

Brazil does not import niobium products because the country is self-sufficient to meet the domestic market's needs. The entire domestic demand is supplied by Minas Gerais (CBMM). In 2014, the state sold approximately 10% of its ferroniobium alloy output, containing 65% niobium and 30% iron, to Brazilian metal-making companies located in the states of Minas Gerais, Rio de Janeiro, Rio Grande do Sul, Espírito Santo, and São Paulo (CPRM, 2016).

2.5. CBMM's code of ethics and conduct

Business ethics is inherent to a company's day-to-day operations and, added to what workers do, it is extremely important, given that preventing problems is a bigger challenge than dealing with issues already in existence (AGUILAR, 1996).

A Code of Ethics details ethical, social, and environmental responsibilities, thereby connecting a company to its stakeholders.

Codes of Ethics have been improving over the years to include the following aspects: company mission and vision statements; company

principles and values; general ethical principles; general principles of fairness and equality in the company's relationship with its stakeholders; respect for and conservation of the environment along with sustainability management; rules and standards for the behavior of the company, employees, and chain of production; grievance mechanisms for reporting code violations; and operating and control procedures and standards (IBEN, 2013).

In 2017, CBMM published the basis of its Human Rights Policy, following the example of other companies in its industry, in an effort to comply with international guidelines and standards consolidated in the "Guiding Principles on Business and Human Rights," and implement at the company the UN Protect, Respect and Remedy Framework approved by UN Resolution no. A/HRC/RES/17/4, about human rights and transnational corporations and other business enterprises (ONU, 2011).

From then on, CBMM has had its own Code of Ethics and Conduct (CBMM, s.d.b) in place. This Code describes the fundamental rules and principles meant to steer the professional conduct of everyone working for the company, be they employees or outsourced personnel, both at the company's headquarters and its subsidiaries. Therefore, all of the company's employees and people acting on its behalf must conduct themselves with honesty, respect, ethics, and transparency. In addition to all of the company's workers, these duties also apply to all members of the Board of Directors and interns working at the company's headquarters or any branches, as well as all agents, consultants, distributors, contracted parties, service providers, outsourced personnel, and any other representatives who either directly or indirectly act on behalf of CBMM.

Ethical conduct means conducting oneself with honesty and integrity. It is against CBMM's policy to pay or get kickbacks, or do anything illegal related to corruption, regardless of who is involved or whatever

er the situation may be. Hence, the company has banned the following: contributions, donations, doing favors, sending gifts, payments, or any amounts to any public officials in any way other than as allowed by the rules set in CBMM's Code of Ethics and Conduct.

Workers are expected to show leadership skills to follow the rules set by said Code, notably in terms of complying with the laws, regulations, conventions, and ethical values of the countries with which CBMM does business. The disciplinary sanctions in case of violations of the provisions in CBMM's Code of Ethics and Conduct are: (verbal or written) warning, suspension, or employment contract termination (either for cause or not).

Employees are to be treated impartially. The company does not tolerate any kind of discrimination or bias, be it related to one's ethnicity, gender, sexual orientation, age, beliefs, nationality, political ideology, marital status, health conditions, or physical characteristics.

CBMM bans all sorts of child, forced, degrading, or unfree labor. The same behavior is required from third parties doing business with the company. Considering its employees' and third-party personnel's occupational health and safety an integral part of the company's business, CBMM provides them with the resources necessary for them to do their jobs. The company also has an integrated management system in place.

CBMM does not tolerate any type of harassment either, especially psychological and sexual. Psychological harassment includes exposing someone to a humiliating and embarrassing in the workplace or while that person is working. According to Hirigoyen (2002), it is any and all abusive conduct – behaviors, words, actions, gestures, writings –which

may hurt someone's personality, dignity, or physical or psychological well-being, put their jobs at risk, or tarnish the workplace.

Sexual harassment means to disturb another through pick-up lines, innuendo, asking for sexual favors, unwanted comments, offensive words or conducts, all of them related to sexuality. It is "a behavior that is sexual in nature, undesired by the recipient and which negatively impacts their physical and psychological well-being, their performance and advancement at work, thereby violating their constitutionally-ensured right to work and employment under equal conditions" (DIAS, 2008, p. 12).

The government interacts with CBMM as a financier, partner, and even as a monitoring agent. Because of this interaction, CBMM claims to abide by the rules, such as the Criminal Code, Anti-Corruption Law, Government Procurement Law, and other regulations.

According to its official website, CEIS is a databank run by the Office of the Federal Controller General (*Controladoria Geral da União - CGU*), whose purpose is to provide a comprehensive list of companies and people who have been sanctioned to not take part in government procurement or contract with the government (BRASIL, s.d.c). As for CNEP, according to its official website also run by the CGU, its purpose is to provide a comprehensive list of companies punished under the Anti-Corruption Law, no. 12846/2013 (BRASIL, s.d.d).

CBMM further says they donate to charities, schools, and sports non-profit organizations, in compliance with the current legislation and CBMM's Donation Policy. The company states that such donations are not made in order to get some improper advantage or benefit in return but solely to give back to the community.

2.6. CBMM's Compliance policy

CBMM did not allow the researchers access to the company's Compliance Policy for confidentiality and internal reasons. However, the company said its Compliance Policy requires risks to be assessed when contracting with third parties and that said contracts include provisions banning child and unfree labor.

In a document written by the company and the presentation given to the team of researchers, CBMM claimed to have attended “(...) a public hearing to discuss how to deal with minerals that are strategic for the country and create a new regulatory framework which would enable the development of a chain of production for the industry,” held by the Federal Senate's Committee for Science, Technology, Innovation, Communication and Information Technology in Brasília on June 27, 2013.

According to the company, these corporate strategies at CBMM are based on its motto “Innovate. Respect. Compete,” and in keeping with the UN Protect, Respect and Remedy Framework approved by UN Resolution no. A/HRC/RES/17/4, about human rights and transnational corporations and other business enterprises (ONU, 2011).

It is not enough to have a link available for people to report violations of CBMM's Code of Ethics and Conduct (s.d.a.), as in the case of the company's refusal to provide information about its compliance policy on the pretext it is confidential and restricted to insiders, as mentioned above. Such refusal goes against Principle 31, letters A, B, C of the Guiding Principles on Business and Human Rights (CONNECTAS, 2012), approved by UN Resolution no. A/HRC/RES/17/4, about human rights and transnational corporations and other business enterprises (ONU, 2011).

We believe CBMM is committed to protecting human rights and adequately fulfills its socioenvironmental responsibility via business strate-

gies that follow international standards. However, such strategies may be improved in case the company adopts mechanisms for transparency and interaction with stakeholders and human rights experts. The company should also take on a less preventative stance attached to unnecessary confidentiality, which derives from its concern about business competition intelligence and its goal of hanging on to its established worldwide leadership. Doing so would be in keeping with Principle 18, letters A and B (ONU, 2011), to gauge human rights risks by drawing on internal or independent experts and also having meaningful consultation with potentially impacted groups and other stakeholders, in a manner that is transparent and accessible, including with respect to its compliance policy.

Below are some examples of compliance policies available online:

- 1) FDA-USA: <<https://www.fda.gov/ICECI/ComplianceManuals/CompliancePolicyGuidanceManual/ucm073819.htm>>;
2. Sandlapper Wealth Management, LLC: <<http://sandlapperwealth.com/wp-content/uploads/2015/10/SWM-Compliance-Policies-and-Procedures-Manual-SWM-9-29-15.pdf>>;
3. Eastern Virginia Medical School (“EVMS”) Medical Group: <[http://www.evms.edu/media/departments/medical_group/mg-administration/compliance_policies/Introduction2013.4\[1\].pdf](http://www.evms.edu/media/departments/medical_group/mg-administration/compliance_policies/Introduction2013.4[1].pdf)>;
4. Queensland Government, Department of Mines and Energy, Department of Employment, Economic Development and Innovations (DEEDI): <https://www.dnrm.qld.gov.au/data/assets/pdf_file/0017/240434/compliance-policy.pdf>;

5. The United States Department of Labor, Mine Safety and Health Administration – MSHA: <<http://arlweb.msha.gov/REGS/COMPLIAN/GUIDES/GUIDES.HTM>>;
6. BNP Paribas: <https://group.bnpparibas/uploads/file/csr_sector_policy_mining.pdf>; and,
7. Albert Eistein Sociedade Beneficente Israelita Brasileira: <<http://www.hospitalsantarosa.com.br/simposio/pdf/1.pdf>>.

Still regarding the public reporting of compliance policies, an interesting example comes from Canada, specifically the Province of British Columbia. In a report called “An audit of Compliance and Enforcement of the mining sector” (BELLRINGER, 2016), its recommendations emphasized that reports should be publicly available and contain the results and trends of all mining compliance and enforcement activities:

Reporting

1.16 Public reporting

We recommend that government report publicly the:

- results and trends of all mining compliance and enforcement activities;
- effectiveness of compliance and enforcement activities in reducing risks and protecting the environment; estimated liability and the security held for each mine.

Given how important it is for large mining companies, notably when it comes to world leaders such as CBMM, to have a good compliance policy in place, the transparency and publicity of their processes of assur-

ance and compliance with the law and regulations only increases their internal and external credibility both domestically and abroad.

The relationship between publicly reporting on the mining company's enforcement of its compliance policy and its respect for the material, concrete rights of its stakeholders, other interested parties, and governmental control and monitoring bodies, requires, beyond internal and external credibility and regulatory codes and processes, the construction of an actual compliance culture. The transparency of which is essential for retaining its leadership in the domestic and foreign markets, and even for spearheading progress in this area.

The direct relationship between compliance, transparency, and sustainability is extremely important. On August 1, 2013, Brazil passed Law no. 12846. Also known as the Anti-Corruption Law, it definitively brought the word compliance into the lexicon of Brazilian business leaders. Under this law, businesses may be held liable by administrative and civil courts for acting against Brazilian or foreign governments. Nevertheless, companies that have a properly set up compliance department may be granted a lesser punishment (MARTINEZ, 2016).

The “search for greater transparency, improved processes, and a preventative culture should be an ongoing effort by the management, both in the public and private sectors,” and audits are an important fraud prevention tool; “(...) that is why honesty, transparency, ethics, and compliance have become job-creating factors for auditors” (FABBRI, 2016) in properly set up departments within companies, especially in the more complex ones, such as those operating in the mining industry and, in particular, CBMM.

Likewise, sustainability is a topic tied to compliance policies. Today, being sustainable is no longer a choice but instead one of the pillars holding up any organization's balanced survival and market success. Sustainability relies on a tripod-like arrangement of economic, environmental,

and social issues. It also requires consistent action (NASCIMENTO, 2015), because “Sustainable development is not a problem restricted to ecologically adjusting a social process. Instead, it is a strategy or model for society (...)” (LARUCCIA; YAMADA, 2011).

Corporate-wise, sustainability encompasses a variety of aspects: respect for workers and stakeholders, and fulfilling a company’s social responsibility inside and outside of it. Additionally, sustainable conducts lead to considerable external and global recognition, which positively impacts on business results (NASCIMENTO, 2015).

In view of the foregoing, it is our belief that CBMM’s refusal to produce its in-house compliance policy stems from its mistaken understanding about such a policy and its purpose. That is especially true when it comes to transparency and external credibility both in Brazil and abroad. The company has yet to adhere to important principles that ensure the effectiveness of non-judicial grievance mechanisms, both State-based and non-State-based, which would help it more closely follow the UN Protect, Respect and Remedy Framework approved by UN Resolution no. A/HRC/RES/17/4, about human rights and transnational corporations and other business enterprises (ONU, 2011), in keeping with the company’s strategy to “Innovate. Respect. Compete.”

2.7. Contemporary forms of unfree labor

In 1940, Brazil’s Criminal Code in force at the time generically defined this offense in its “Art. 149. To reduce someone to a condition akin to slavery. Punishment – imprisonment for 2 to 8 years.” As it was necessary to outline the offensive conducts, Law no. 10803 of December 11, 2003, significantly amended that article (BORGES; RAFAEL, 2016) to read as follows:

Art. 149. To reduce someone to a condition akin to slavery, either by subjecting them to forced labor or exhausting working hours, or subjecting them to degrading working conditions, or by any means restraining their freedom of movement on account of debts owed to their employer or their employer's agent: Punishment – imprisonment for 2 to 8 years, and a fine, in addition to the punishment corresponding to the violence.

Paragraph 1. The same punishments apply to those that:

I – prevent workers from using any modes of transportation in order to confine them to the workplace; II – keep ostensible surveillance in the workplace or seize workers' documents or personal items, in order to confine them to the workplace. (BRASIL, 2003).

Considering such criminal labor legal aspects, the field research did not find any human rights violations of the sort, especially reducing someone to a condition akin to slavery. In fact, the researchers did find the company has good labor practices in place, including with respect to outsourced personnel and its suppliers.

Likewise, in an effort to prevent occupational accidents and diseases, CBMM invests in various procedures such as risk assessment and control, investigation into accidents, mandatory use of personal protective equipment by workers, signs on display across the facilities warning about dangerous areas and authorized personnel-only areas. During the technical visit, the team of researchers found that such measures are actually in place, as CMBB had claimed.

According to CBMM, there are monthly health and safety training sessions for workers and service providers. The company also has an Internal Accident Prevention Committee focused on keeping the workplace safe. These efforts have managed to reduce the number of accidents and lost time injuries. The company disclosed that there have been three fatal accidents since it began operating.

During the technical visit, CBMM's representatives said that base wages amounted to BRL 3,800.00 a month. However, an online search (LOVE MONDAYS, 2017) revealed that company operators were taking home BRL 2,695.00 a month, on average.

Furthermore, the company told the researchers that it is responding to 76 lawsuits, albeit none related to contemporary unfree labor. According to CBMM, the lawsuits are about other issues connected to labor rights and demands from former employees or service providers. The company added that it is involved in a total of 700 lawsuits.

2.8. CBMM's relationship with the environment

At the meeting with CBMM's representatives held before the researchers were given a tour of the company, relevant information was disclosed about the company's efforts towards environmental compensation, environmental education, and processes to reduce environmental impacts, as well as CBMM's collaboration with environmental monitoring agencies.

CBMM's representatives said there have been complaints about an alleged water pollution episode. This case is still pending before the court. However, the city of Araxá has also been named as a defendant as it was held to be jointly and severally liable.

During the visit, the company denied all claims its mining operations may have had something to do with the alleged water pollution. CBMM also pointed out there is no forensic evidence whatsoever about the company's involvement.

CBMM made a point of saying it is committed to the environment, its employees and outsourced personnel, and the community, and has established its reputation as a sustainable company. Incidentally, CBMM

claims to be the world's first mining and metal-making company to have become ISO 14001 certified.

ISO 14001 is internationally accepted. The standard specifies requirements for setting up and running an environmental management system. It also helps companies improve resource efficiency so as to reduce the amount of mining waste. Under ISO 14001, companies should look into their operations in relation to environmental issues, such as air, water, and sewage pollution, waste management, soil contamination, climate change, and efficient use of resources (ABNT, 2015).

According to CBMM, its environmental management system focuses on sustainable development practices, compliance with the relevant regulations, environmental performance improvement, optimization of natural resources, and pollution prevention.

The company said they use several methods to reduce the impacts from their operations and protect the health and well-being of workers and the community, in addition to optimizing natural resources. The representatives said the company collects over 4,000 water samples every year, and conducts approximately 27,000 tests to check the quality of the water at the company's plant. Additionally, 25 environmental tests are ISO/IEC 17025 certified.

CBMM added it invests in production process productivity and efficiency to increase its rate of water reuse and reduce its use of new water. The company has already reaped positive results, given that 95% of the water used in its production process is currently reused. CBMM also said it recycles, repurposes or reprocesses more than 30 types of waste to recover niobium from its production process, in addition to managing its waste to reduce environmental impacts.

To do that, there is a 6,000m² (six thousand square meter) yard where waste is sorted into different categories so that renewable and reusable materials may be found.

A 3.2 km long conveyor belt is used to transport the ore between the mine and the concentration plant and eliminate the use of trucks as well as their respective emissions of polluting gases deriving from the burning of fuel. This method of ore transportation not only reduces impacts but also noise levels. Furthermore, it also mitigates the risk of occupational accidents by following the guidelines on the circulation and transportation of people and materials set in items 22.7 and 22.8 of the Ministry of Labor's Regulatory Standard no. 22.

As reported below, in an interview with a city councilor who shall remain anonymous, he said there is woodland that should be protected in an area close to the boundaries between the mine and Grande Hotel. Such area is allegedly under the shared responsibility of CBMM, VALE, and CODEMIG. Some spots there have not been fenced in, which compromises the area's preservation by allowing the circulation of vehicles (dump trucks) and even people through it.

This environmental liability requires the aforementioned companies and the government to reach an understanding, as the issue could be easily resolved by their taking a few simple steps such as putting up fences and a gate to control the traffic of vehicles and protect the woodland.

2.9. CBMM's outreach initiatives

CBMM provides its employees and their families with education-related incentives, including its own nursery school for students between the ages of three months and six years. The school is run by the company's Human Development Center and focuses on the acquisition of

language, thinking, and social skills. For grade school and university students going to private schools, the company may pay up to 80% of their tuition provided they fulfill certain requirements. The company may also grant up to eight minimum monthly salaries to public university students.

Among CBMM's internationally acclaimed practices, it is important to note that the company has helped improve and expand the corporate view on human rights, as shown in the excerpt from the book "Human Rights in the Minerals Industry" (HANDELSMAN, 2002):

CBMM, a Brazilian niobium mining, processing and manufacturing company supports foundations that work with the community in such areas as the treatment and rehabilitation of alcohol and drug addicts, in geriatric and psychiatric care, and supports a community center that provides professional skills and assistance to the community. The school offers vocational training for teenagers and provides basic elementary and secondary education in addition to vocational training for those who missed it as youths.

With respect to environmental education, we should mention the projects the company has carried out since 1992 and which involve about 2000 students every year. The UNESP team of researchers were given a copy of the company's "*Projeto Cientista do Cerrado 2018*" (CBMM, 2017), a local science project set to start in March 2018.

Environmental education projects are run in collaboration with important partners: City Office of Education; Regional School Superintendence in Uberaba – Araxá Hub; Reserva Ecocerrado Brasil (a nature reserve); *Instituto Mineiro de Agropecuária* (an institute dedicated to farming and livestock in Minas Gerais); *Polícia Militar de Meio Ambiente* (environmental police); Tauá Grande Hotel e Termas de Araxá;

Sala Verde / Instituto de Pesquisa e Desenvolvimento Sustentável de Araxá (a research institute); *Fundação Cultural Calmon Barreto* (a cultural foundation); and *Centro Universitário do Planalto de Araxá – UNIARAXÁ*, a university (CBMM, 2017).

CBMM also helps its employees buy their own homes in housing areas belonging to the company or elsewhere. This initiative began in the 1970s given suitable housing was scarce in Araxá back then.

In order to enable more people to become homeowners, in 1990 CBMM and the local workers' union joined forces to launch the "Building Together Project," as reported by the company's representatives during the technical visit. Under this project, the company prepares the plots and sells them at cost. Buyers also get technical support, building materials, and the help from a mutual-aid group for the construction. More than 500 houses have been turned over to families since this incentive project began.

The collaboration between the company and the union looks like a good practice that has yielded positive results. However, the company has tasked the union with choosing the beneficiaries and does not have any kind of say in the matter. The union's clout among workers actually raises a study topic for a separate paper about how independent it really is when it comes to representing workers and their needs. After all, the workers' social empowerment could be jeopardized by the union's power to choose who does and does not benefit from the company's program.

2.10. CBMM and international organizations

There are international efforts bringing mining companies together for them to boost the fulfillment of their social responsibilities, notably by implementing business principles committed to sustainability and

the improvement of policies dedicated to socioenvironmental development and respect for human rights.

During the field research, the team found that CBMM is not a member of the ICMM, International Council on Mining & Minerals, which is “(...) an international organization dedicated to a safe, fair and sustainable mining industry” (ICMM, 2017) and has 25 member companies – since 2002 – in addition to 30 regional mining and commodity associations, including: Vale (since 2017), which also operates in Araxá (MG); Rio Tinto; Anglo American (a niobium mining competitor in Brazil’s center-west region); and others.

3. Interview with an Araxá city councillor (MG)

The interviewed Araxá (MG) city councilor asked to remain anonymous as he feared reprisals from various parties. However, he agreed to tape an interview and answered the questions asked by Professors Elisabete Maniglia, Paulo César Córrea Borges, and Victor Hugo de Almeida, as well as by student Raquel das Neves Rafael, on October 5, 2017, about CBMM and its relationship with the government and the community.

In the interview, the city councilor said CBMM is active in the community. As a positive, he mentioned the company supported and helped fund the construction of the community healthcare clinic. Also, he said CBMM helps keep local shops in business and hires local service providers.

As a lawmaker, he is concerned about the city’s direct dependence on the company. Araxá relies on CBMM to survive, especially since the drop in the city’s revenue (property tax, water bills etc.). He noted that the city’s economic and social dependence is yet to be seen as a major issue

there, and that there have been no efforts to bring other companies into the city. Also, there have been no initiatives or steps towards making the city somewhat “independent” from CBMM and to ensure its social sustainability, including by developing its own economy. He mentioned the case of another city which has been highly dependent on another mining company. Today, that city is experiencing the economic and fiscal impacts from a recent strategic corporate decision to keep only mining operations in said other city and relocate manufacturing operations to Araxá (MG).

The councilor also revealed that, oddly enough, such economic and social dependence on CBMM has led residents to not pay their city taxes and city officials to fail to file for tax foreclosures and seize taxpayers’ assets. As a result, the City Council recently passed a law mandating the collection of these taxes before it becomes time-barred once the statutory five-year limit has elapsed.

The councilor said the company creates many jobs locally, and because of that many people from other cities have been moving to Araxá to work at the company there. However, he pointed out that top management positions are held by people living in other cities. He also mentioned the jobs created by third-party companies used by CBMM, such as a transportation company that has become prominent in the state of Minas Gerais, and surveillance company Ayres.

The researchers asked the councilor whether there are complaints of labor rights violations by these third-party companies. He said that in case there are, the number would be very low. He does not believe there are any, though. He added that such violations would be very unlikely because CBMM requires companies doing business with it to be fully compliant with the law, not only in terms of their workforce but also regarding all mandatory documents they must provide to/obtain from

various government agencies. He pointed out CBMM is very demanding when it comes to compliance with the law.

The researchers asked the councilor whether the company has caused any environmental damage. He said he has never heard about that, but there have been complaints about radiation from the company wafting into the city. However, radiation is naturally found in the Barreiro area because of geological aspects and local features. He said that the company was even the first to take steps to protect the soil coming from dams.

He said families once lived in the Barreiro area but that everyone was forced to move out after the land was condemned. Water there became unsafe to be used over the years.

He said the media has a very positive view about the company because of its outreach initiatives related to healthcare, sports, and culture. He noted, however, that the company has a duty to give back to the community because the niobium it mines in Araxá (MG) belongs to the entire population. He also mentioned there is a monthly local newspaper, with a short print run, that rages against the company. Its editorial line is totally radical, but the newspaper has failed to make a name for itself and lacks credibility in the city.

He discussed his concerns for an area close to Grande Hotel. There is woodland there in between the Hotel and the mine. CBMM, Vale, and Codemig are responsible for its conservation. However, some sections of this area are not fenced in. Hence, there is easy access to the woodland. He said company vehicles drive through there, but that they could put up a fence around the area and a gate to be opened only in case circulating there is required. That way, the risks of any environmental impacts taking place would be much lower.

He further said CBMM holds an annual public hearing at which the company talks about its operations and other things. He spoke at some

length about tourism, saying that some hotels had shut down and the remaining ones are not all that appealing. He said a local park (*Parque do Cristo*) is undergoing renovation work and is expected to reopen to the public soon. The park is going to feature a playground, a running track, and special LED lighting. He also said the downtown area had been freshened up.

He pointed out the city hosts tourists for events on a monthly basis. It also hosts the annual “Mountain Bike Cup,” which brings competitors from 16 countries to town. The Dona Beja Museum has also been renovated. Overall, he believes the city still has some good attractions to offer tourists.

Finally, he revealed CBMM had recently laid off about 200 employees, something that has taken a toll on several families’ livelihoods.

All in all, the city councilor provided a positive evaluation of the relationship between CBMM with the community and local authorities.

4. Newspaper Search

4.1. Mass layoffs

The community’s reliance on CBMM can be significantly appreciated after mass layoffs at two times of crisis the worldwide mining industry went through, that is, in 2009 and again from 2016 to 2017. Back then, the company decided to let employees go and even reached agreements with the respective union on cuts to labor rights.

In 2009, as the company was struggling, CBMM slashed more than 50% of workers’ overtime, hazardous, and unhealthy work pay, halted

production because of surplus output, and reached a deal to prevent mass layoffs. CBMM's Managing Director Antônio Gilberto Ribeiro de Castro gave a special interview to newspaper *Diário de Araxá* and spoke about the world crisis' impact on the company, their expectations and lessons learned. (DIRETOR ADMINISTRATIVO, 2009).

On November 25, 2016, *Diário de Araxá's* online edition featured a press release from CBMM about layoffs and changes at the company.

On November 27, 2016, website “O Tempo” posted a news piece about mass layoffs or retirements of approximately 170 CBMM employees (CRISE CHEGA, 2016), corresponding to 10% of its workforce.

The expense-cutting method became public that month after the Executive Board met in Araxá. The company reacted to plummeting exports to the US and China. The company estimated niobium sales dropped 20% in 2016 on account of a sluggish market and global uncertainties.

On January 20, 2017, website *Jornal Tribuna de Araxá* reported CBMM had let more people go that month and was expected to keep on doing so. Although no exact numbers were given on how many people were fired that latest time (CBMM VOLTA, 2017), the job cuts were part of the mining company's expense-curbing process.

4.2. Cultural support

After a search of materials published by the local media and as per information gleaned at the technical visit, we found CBMM is a significant patron of culture. Newspapers *Clarim* on September 29, 2017, and *Correio de Araxá* on September 30, 2017, published the “CBMM Culture Circuit” (according to printed issues obtained on the day of the technical visit).

The company is also among the official sponsors of the 22nd National Conference of Prosecution Offices held by the National Association

of Prosecutors (CONAMP) and the Minas Gerais Association of Prosecutors (AMMP) in Belo Horizonte on September 27 to 29, 2017 (MG)¹².

5. Basic metal mining industry workers' union – Araxá (MG)

We tried several times to contact the workers' union and obtain information about CBMM's relationship with them. However, all attempts failed.

Our inability to speak with representatives from the workers' union and the lack of answers to our questions compromised our study and prevented us from analyzing into greater detail the relationship between CBMM and said union. Especially given the company's important own-home building program ("Building Together Project"), whose details are even available online in Portuguese and English, leaves it for the union to choose the workers that will benefit from such program.

Hence, the question about how autonomous and independent from CBMM the union is remains.

We found there are only collective bargaining agreements focused on setting pecuniary benefits, mostly bonuses and profit-sharing rates. However, as sources of labor rights, these agreements can be important, effective tools to settle issues related to working conditions and a balanced workplace, and especially regarding workers' mental and physical health (workplace health and safety, harassment prevention policies etc.). In other words, unions have available to them a powerful mechanism to reconcile social and economic interests to keep capitalist in-

terests from prevailing over social rights. A mechanism that is mostly disregarded in the backdrop studied.

CBMM's representatives also said the company has 1800 people on its payroll and is a party to approximately 76 employment complaints. They said the company has brought/is defending 700 lawsuits, 30% of which related to company-own employees and 70% related to outsourced workers. They highlighted the company's legal department is quite active in litigation prevention and counseling.

Furthermore, they said outsourced labor is only brought in for certain jobs, such as front desk, armed surveillance, and construction. They added that compliance with these outsourced workers' labor rights is strictly monitored. They also pointed out that, before contracting with outsourced labor providers, CBMM requires these providers to previously register and prove they are in compliance with labor and tax laws.

A search of the website run by the Regional Labor Court in the 3rd Region returned the following cases brought against outsourced labor providers under contract with CBMM, as shown in Chart 2:

CHART 2. Employment complaints listed on the website of the Regional Labor Court in the 3rd Region and filed against CBMM service providers

Docket no.	Subject / Outsourced labor provider
1502887-76.2016.8.26.0597	Tax Foreclosure / Fagundes & Fagundes Pereira Ltda. – ME
0008450-75.2016.403.6102	Tax Foreclosure / Fagundes & Fagundes Pereira Ltda. – ME
0004787-21.2016.403.6102	Tax Foreclosure / Fagundes & Fagundes Pereira Ltda. – ME
0010573-43.2015.5.03.0048	Employment Complaint / Ayres – Serviços de Vigilância Ltda.

0011030-83.2017.5.03.0048	Employment Complaint / Ayres – Serviços de Vigilância Ltda.
0011033-38.2017.5.03.0048	Employment Complaint / Ayres – Serviços de Vigilância Ltda.
0011768-08.2016.5.03.0048	Employment Complaint / Ayres – Serviços de Vigilância Ltda.

Along with the following employment complaints brought against CBMM:

CHART 3. Employment complaints brought against CBMM, as listed on the website of the Regional Labor Court in the 3rd Region.

Docket no.	Parties
0000314-65.2015.5.03.0048 RO	Rodrigo José Teodoro; Companhia Brasileira de Metalurgia e Mineração – CBMM
0060800-26.2009.5.03.0048 RO	Companhia Brasileira de Metalurgia e Mineração – CBMM; Edu Ardo Simões Paiva
0001545-64.2014.5.03.0048 RO	Companhia Brasileira de Metalurgia e Mineração – CBMM; Julio César Iza
0061300-92.2009.5.03.0048 AP	Lorentz Serviços e Empreendimentos Ltda.; Companhia Brasileira de Metalurgia e Mineração – CBMM; ftiago Humberto de Oliveira

None of the cases above involved complaints about human rights violations or unfree labor issues.

Finally, at the technical visit nothing about such matters was brought up by the company’s representatives given that, as mentioned elsewhere, CBMM strictly monitors labor and tax law compliance by third-party companies, suppliers, and service providers.

6. Final Considerations

Accounting for 80% of the worldwide niobium output, at our interview CBMM estimated niobium reserves to be surface mined in Araxá are expected to last 300 years. However, in 2013, in an interview given to G1 – which pointed out the company had accepted to answer only written questions via e-mail – the company estimated reserves were good for 200 years (MONOPÓLIO, 2013).

According to a US State Department confidential document leaked in 2010 by WikiLeaks (MONOPOLIO, 2013), Brazilian niobium mines were listed as resources and infrastructure deemed strategic and essential for the United States and coveted by several countries. The Araxá (MG) mine holds 75% of Brazil's reserves where the major deposits are, in addition to those located in the states of Amazonas – 21%, and Goiás – 3%.

Mining companies are crucial for economic and social development. Despite their associated environmental liabilities and devastation potential, when they set “good practices” in terms of respect for human rights in their operations, corporate code of ethics and compliance policy, provided these are actually enforced, they bring benefits for countless countries. They make it possible to make tools, appliances, transportation vehicles, electricity conveyance lines, essential construction materials, advanced technology devices, medical equipment, and equipment for the aerospace and nuclear industries, among other benefits.

Upon analyzing the information obtained at a technical visit to *Companhia Mineradora de Metalurgia e Mineração* (CBMM), we found the company complies with Brazilian labor, environmental, and criminal laws. We did not find workers in vulnerable conditions, such as women, children, or immigrants, or people working for CBMM under unfree labor conditions, be it company employees or outsourced personnel. We did not even find reports of alleged violations in that regard. Quite the opposite, even social players without ties to the company highlighted

how important a role it plays in terms of the local economic, cultural, sports, and social development, including by being strict about its suppliers' and service providers' compliance with labor laws.

On the other hand, we did find good labor and environmental practices that could be put in place by other mining companies, such as environmental education courses for employees; mandatory use of personal protective equipment; signage across the company; water reuse; ore reclaiming, recycling, and reprocessing; the company's active participation in the community by funding education and the purchase of homes; and annual public hearings with the population and public officials.

The results obtained by the field research are satisfactory. Considering there are plenty of cases of human rights violations reported by newspapers and websites, especially about workers treated as objects, our researchers did not find any traces of violations of human, labor, or environmental rights or crimes associated thereto by the company.

In 2017, CBMM published its Code of Ethics and Conduct, including an online link for reports and follow-ups. However, the company is still lacking when it comes to transparency about its compliance policy, which is available solely to in-house personnel. Such confidentiality is not in keeping with the principles found in the the UN Protect, Respect and Remedy Framework approved by UN Resolution no. A/HRC/RES/17/4, about human rights and transnational corporations and other business enterprises (ONU, 2011), and contrary to the company's strategy to "Innovate. Respect. Compete."

References

ABNT. **Introdução à ABNT NBR ISO 14001:2015**. Available at: <file:///C:/Users/quel_/Downloads/Introducao14001portPortal.pdf>. Retrieved: Oct 31, 2017.

AGUILAR, Francis J. **A Ética nas Empresas: Maximizando Resultados Através de uma Conduta Ética nos Negócios**. Rio de Janeiro: Jorge Zahad Editor, 1996.

ANTONIETTO, Caio Marcelo Cordeiro; CASTRO, Rafael Guedes. **Criminal Compliance: a política de cumprimento de normas penais e seus impactos na atividade econômica empresarial**. 2014. Available at: <<http://www.publicadireito.com.br/artigos/?cod=a19599d637c08bdc>>. Retrieved: Nov 15, 2017.

ARAÚJO, Ulisses F.; AQUINO, Júlio Groppa. **Os Direitos Humanos na Sala de Aula – A Ética como Tema Transversal**. São Paulo: Moderna, 2002.

BELLRING, Carol. **An audit of Compliance and Enforcement of the mining sector**. Victoria/British Columbia: OAGBC, 2016.

BORGES, Paulo César Corrêa. Panorama da Legislação de Combate ao Trabalho Escravo na América do Sul. In: **Formas Contemporâneas de Trabalho Escravo**. NETPDH. 4. São Paulo: Cultura Acadêmica, 2015.

_____; RAFAEL, Raquel das Neves. **Resultados parciais de pesquisa sobre formas contemporâneas de trabalho escravo, na atividade mineradora do Estado do Mato Grosso do Sul**. IX Reunião Científica: Trabalho Escravo Contemporâneo e Questões correlatas. 2016.

BRANCO, Pércio de Moraes. Nióbio brasileiro. **CPRM**, Serviço Geológico do Brasil, Brasília, DF, 19 out. 2016. Available at: <[http:// www](http://www).

cprm.gov.br/publicue/Redes-Institucionais/Rede-de-Bibliotecas---Rede-de-Bibliotecas---Rede-Ametista/Canal-Escola/Niobio- Brasileiro-2616.html>. Retrieved: Oct 10, 2017.

BRASIL. 4a Audiência Pública Conjunta – CCT e CCTSTTR – Senado Federal, Companhia Brasileira de Metalurgia e Mineração, 27 de junho de 2013, Brasília – DF. Available at: <[http://www.senado.leg.br/comissoes/cctsttr/ap/AP20130627_Tadeu Carneiro. pdf](http://www.senado.leg.br/comissoes/cctsttr/ap/AP20130627_Tadeu_Carneiro.pdf)>. Retrieved: Oct 31, 2017.

_____. Lei nº 10.803, de 11 de dezembro de 2003. Altera o art. 149 do Decreto-Lei no 2.848, de 7 de dezembro de 1940 - Código Penal, para estabelecer penas ao crime nele tipificado e indicar as hipóteses em que se configura condição análoga à de escravo. **Planalto**, Brasília, DF, 7 dez. 1940. Available at: <http://www.planalto.gov.br/ccivil_03/Leis/2003/L10.803.htm>. Retrieved: Mar 26, 2018.

_____. Ministério do Trabalho. Rede em Minas Gerais, Brasília, DF, 26 fev. 2016. Available at: <<http://trabalho.gov.br/rede-de-atendimento/rede-de-atendimento-do-trabalho/rede-mg>>. Retrieved: May 19, 2017.

_____. Ministério Público do Trabalho em Minas Gerais. PTM Pato de Minas, Abrangência, Belo Horizonte, s.d.a. Available at: <[http:// www.prt3.mpt.mp.br/procuradorias/ptm-patos-de-minas/abrangencia-ptm-patos-de-minas](http://www.prt3.mpt.mp.br/procuradorias/ptm-patos-de-minas/abrangencia-ptm-patos-de-minas)>. Retrieved: May 19, 2017.

_____. Portal da Transparência. Cadastro Nacional de Empresas Inidôneas e Suspensas (CEIS). **Ministério da Transparência e Controladoria-Geral da União**, Brasília, DF, s.d.c. Available at:<<http://www.portaldatransparencia.gov.br/ceis>>. Retrieved: Dec 10, 2017.

_____. Portal da Transparência. Cadastro Nacional de Empresas Punidas (CNEP). **Ministério da Transparência e Controladoria-**

Geral da União, Brasília, DF, s.d.d. Available at: <<http://www.portaldatransparencia.gov.br/cnep>>. Retrieved: Dec 10, 2017.

_____. **Sistema Mediador**. Ministério do Trabalho, Brasília, DF, s.d.b. Available at: <<http://www3.mte.gov.br/sistemas/mediador/ConsultarInstColetivo>>. Retrieved: May 19, 2017.

CABETTE, Eduardo Luiz Santos. **Direito Penal: Parte Especial I**. São Paulo: Saraiva, 2012.

CASTRO, Rafael Guedes. **Anticorrupção e Compliance Criminal: Reflexões Iniciais, Desenvolvimento e Perspectivas do Grupo de Estudos das Faculdades da Indústria**. 2015. Available at: <http://app.fiepr.org.br/revistacientifica/index.php/conhecimento_interativo/article/view/194>. Retrieved: Nov 15, 2017.

CBMM. **Briefing**. CBMM e o Estado de Minas Gerais: Uma Parceria de Sucesso. Apresentação no XXII Congresso Nacional do Ministério Público. 2017.

_____. **Canal de ética**. s.d.a. Available at: <<https://www.canalconfidencial.com.br/cbmm/#>>. Retrieved: Oct 30, 2017.

_____. **Código de Ética e Conduta**. s.d.b. Available at: <<http://www.cbmmcompliance.com/files/CodigoDeEticaECondutaDaCBMM.pdf>>. Retrieved: Oct 31, 2017.

_____. **Correia transportadora de minério**. s.d.c. Available at: <<http://www.cbmm.com.br/pt/Paginas/ore-conveyor-belt.aspx>>. Retrieved: Dec 10, 2017.

_____. **Programa de educação ambiental 2018: Cientistas do cerrado.** Araxá: CBMM, 2017.

_____. **Uma Empresa Brasileira Líder Mundial na Tecnologia do Nióbio.** Revista. 2017.

CBMM ENCAMINHA nota aos órgãos de imprensa sobre demissões e mudanças na empresa. Araxá, Diário de Araxá, 25 nov. 2016. Cidade. Available at <<http://www.diariodearaxa.com.br/cbmm-encaminha-nota-aos-orgaos-de-imprensa-sobre-demissoes-e-mudancas-na-empresa/>>. Retrieved: Oct 30, 2017.

CBMM VOLTA a demitir. Araxá, Jornal Tribunal de Araxá, 20 jan. 2017. Available at <<http://www.jornaltribunadearaxa.com.br/news/cbmm-volta-a-demitir/>>. Retrieved: Oct 30, 2017.

CONAMP; AMMP. XXII Congresso Nacional do Ministério Público, realizado nos dias 27 a 29 de setembro de 2017, em Belo Horizonte, Minas Gerais. Available at: <**Error! Hyperlink reference not valid.**>. Retrieved: Oct 31, 2017.

CONNECTAS. **Empresas e direitos humanos: Parâmetros da ONU para proteger, respeitar e reparar.** Relatório final de John Ruggie – Representante Especial do Secretário-Geral. 2012. Available at <[http://www.Conectas_PrincípiosOrientadoresRuggie_mar2012\(1\).pdf](http://www.Conectas_PrincípiosOrientadoresRuggie_mar2012(1).pdf)>. Retrieved: Oct 31, 2017.

CONSELHO NACIONAL DE SAÚDE. **Resolução nº 510, de 7 de abril de 2016.** Brasília, DF, 7 abr. 2016. Available at: <<http://www.conselho.saude.gov.br/resolucoes/2016/Reso510.pdf>>. Retrieved: May 19, 2017.

CPRM. **Nióbio Brasileiro**. Available at: < <http://www.cprm.gov.br/publique/Redes-Institucionais/Rede-de-Bibliotecas---Rede-Ametista/Canal-Escola/Niobio-Brasileiro-2616.html>>. Retrieved: Oct 31, 2017.

CRISE CHEGA ao nióbio e leva CBMM a cortar 170 altos funcionários. Araxá, O Tempo, 27 nov. 2016. Available at: <**Error! Hyperlink reference not valid.**>. Retrieved: Oct 31, 2017.

DIAS, Isabel. Violência contra as mulheres no trabalho: o caso do assédio sexual. **Sociologia, problemas e práticas**, Lisboa, n. 57, p. 11-23, 2008.

DIRETOR ADMINISTRATIVO da CBMM fala sobre os enfrentamentos no período de crise. Araxá, Diário de Araxá, 30 jul. 2009. Economia.

Entrevista a Antônio Gilberto Ribeiro de Castro. Available at: <<http://www.diariodearaxa.com.br/diretor-administrativo-da-cbmm-fala-sobre-os-enfrentamentos-no-periodo-de-crise/>>. Retrieved: Oct 30, 2017.

DNPM. **Sumário Mineral 2014: Nióbio**. Available at: <<http://www.dnpm.gov.br/dnpm/sumarios/niobio-sumario-mineral-2014>>. Retrieved: Oct 30, 2017.

_____. **Sumário Mineral 2015: Nióbio**. Available at: <<http://www.dnpm.gov.br/dnpm/sumarios/sumario-mineral-2015>>. Retrieved: Oct 30, 2017.

FABBRI, Marco Antonio de Carvalho. Transparência e compliance criam empregos no Brasil. **O Estado**, 5 nov. 2017. Available at: <<http://politica.estadao.com.br/blogs/fausto-macedo/transparencia-e-compliance-criam-empregos-no-brasil/>>. Retrieved: Nov 15, 2017.

GIL, Antonio Carlos. **Métodos e técnicas de pesquisa social**. 6. ed. São Paulo: Atlas, 2014.

HANDELSMAN, Simon D.. **Human Rights in the Minerals Industry**. Londres: IIED – International Institute for Environment Development; WBCSD – World Business Council for Sustainable Development; MMSD– Mining, Minerals and Sustainable Development, 2002. n. 9. Available at: <[https://commdev.org/userfiles/files/1152_file_Human 20Rights 20in 20the 20Minerals 20Industry.pdf](https://commdev.org/userfiles/files/1152_file_Human%20Rights%20in%20the%20Minerals%20Industry.pdf)>. Retrieved: Oct 30, 2017.

HIRIGOYEN, Marie-France. **Assédio moral: a violência perversa no cotidiano**. Tradução de Maria Helena Kühner. 5. ed. Rio de Janeiro: Bertrand Brasil, 2002.

IBNE. **Programa de Integridade e Conduta**. Available at: <[http:// www. eticanosnegocios.org.br/2011/pdf/Apresentacao-PIC-Programa-de-Integridade-de-Conduta.pdf](http://www.eticanosnegocios.org.br/2011/pdf/Apresentacao-PIC-Programa-de-Integridade-de-Conduta.pdf) >. Retrieved: Oct 30, 2017.

JENKINS, Kerry. Regulatory compliance: Demonstrating good corporate citizenship. In: KPMG Global Mining Institute. **Mining risk and assurance: A survival strategy**. Suíça: KPMG, 2014. Compliance Series. p. 18-19.

LARUCCIA, Mauro Maia; YAMADA, Karen Junko. **O Desenvolvimento Sustentável e a Gestão de Compliance em Instituições Financeiras**. 2011. Available at: <[http://estrategica.fiap. br/ojs/index.php/estrategica/ article/download/8/5](http://estrategica.fiap.br/ojs/index.php/estrategica/article/download/8/5)>. Retrieved: Oct 30, 2017.

LOVE MONDAYS. **Salários de Operador na Companhia Brasileira de Metalurgia e Mineração (CBMM) em Araxá, MG**. 2017. Available at <[https://www.lovemondays.com.br/trabalhar-na-companhia- brasileira-de-metalurgia-e-mineracao-cbmm/salarios/cargo/operador/mg/ araxa](https://www.lovemondays.com.br/trabalhar-na-companhia-brasileira-de-metalurgia-e-mineracao-cbmm/salarios/cargo/operador/mg/araxa)>. Retrieved: Oct 30, 2017.

MARCONI, Marina de Andrade; LAKATOS, Eva Maria. **Fundamentos da metodologia científica**. 7. ed. São Paulo: Atlas, 2010.

MARTINEZ, André Almeida Rodrigues. **Compliance no Brasil e suas origens**. Available at: <<http://www.ibdee.org.br/compliance-no-brasil-e-suas-origens/>>. Retrieved: Nov 15, 2017.

MIRANDA, Viviane. A Contribuição dos Programas de Compliance para a Sustentabilidade das Organizações. s.d. Available at: <<http://www.hospitalsantarosa.com.br/simposio/pdf/1.pdf>>. Retrieved: Nov 15, 2017.

MONOPÓLIO brasileiro do nióbio gera cobiça mundial, controvérsia e mitos. Com 98% das reservas, Brasil não tem política específica para o mineral. Exportações cresceram 110% em 10 anos e somaram US\$ 1,8 bi em 2012. São Paulo, G1, 09 abr. 2013. Economia. Negócios. <<http://g1.globo.com/economia/negocios/noticia/2013/04/monopolio-brasileiro-do-niobio-gera-cobica-mundial-controversia-e-mitos.html?hash=3>>. Retrieved: Nov 2, 2017.

NASCIMENTO, Juliana Oliveira. **Compliance e Sustentabilidade: Perspectivas do Futuro Corporativo**. Available at: <<http://www.lecnews.com/artigos/2015/04/29/compliance-e-sustentabilidade-perspectivas-do-futuro-corporativo/>>. Retrieved: Nov 15, 2017.

UN. Human Rights Council. Resolution no. A/HRC/RES/17/4, Human rights and transnational corporations and other business enterprises. Approved at the 17th Session, July 6, 2011. Available at: <**Error! Hyperlink reference not valid.**>. Retrieved: Nov 31, 2017.

VALE. **VALE Human Rights Guide**. 2. ed. Rio de Janeiro: Vale, 2013.

WALDRON, David. Strategy: gaining long-term advantage. In: KPMG Global Mining Institute. **Mining risk and assurance: A survival strategy**. Suíça: KPMG, 2014. Compliance Series. p. 4-7.

Evaluation of Development Conditions in Goiás Mining Towns

*Helena Esser dos Reis*³⁷⁶

*Luciana Gonçalves Tibiriça*³⁷⁷

*Maurides Batista de Macedo Filha*³⁷⁸

*Mauro Machado do Prado*³⁷⁹

*Ilana Patrícia Nunes Seabra de Oliveira*³⁸⁰

*Marden Reis de Abreu*³⁸¹

*Pedro Paulo Damacena e Silva*³⁸²

*Renato de Araújo Ribeiro*³⁸³

*Tiago Ducatti de Oliveira e Silva*³⁸⁴

Introduction

Although since the 16th century many explorers had been doing their thing through the land we now call the state of Goiás, the state was settled only in 1722 with the arrival of trailblazer Bartolomeu Bueno da Silva – a.k.a Anhanguera – after gold mines drew people there. In colonial Brazil, the now state of Goiás was first referred to as *Minas dos Goyazes* (meaning mines of the Goyazes) and “within the Portuguese Empire’s work division, such was Goiás’ title of existence and identity for nearly a century” (PALACIN, 1976, p.42).

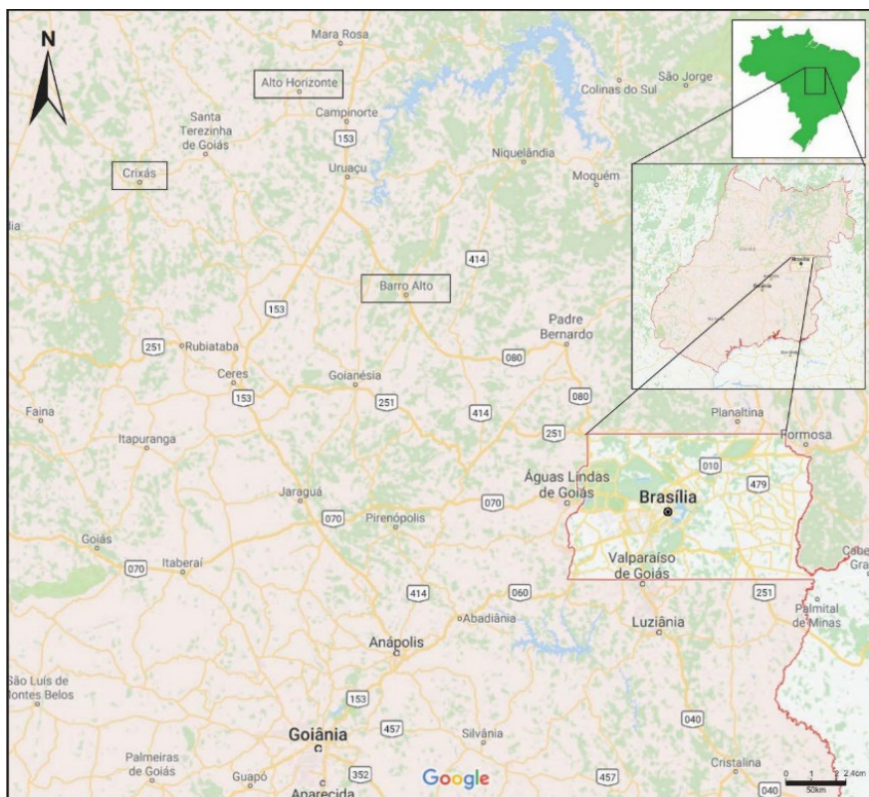
At the time, the mines of Rio Vermelho (today the city of Goiás), Rio das Almas, Crixás, São Felix, Pontal and Porto Real, Arraias, Cavalcante, Pilar, Carmo, Santa Luzia, and Cocal were found and explored.

After a century that saw frantic digging for gold, diamonds, and other precious gemstones, around 1822 the deposits started to wane and Goiás goes through a mining crisis. In the course of the 20th century, mining once again boomed after roads were built and efficient ways of transporting and exporting the production were found, along with new mining techniques. Today, according to GOIÁS (2018), Goiás is the third state boasting the highest revenue from mining in Brazil. This activity is the main source of income in several cities, where different types of mineral resources can be found (gold, asbestos, nickel, bauxite, phosphate, aluminum, copper, stones, water, sand etc.). Different types of retrieval consequently lead to different sources of wealth and vulnerabilities.

Our study focused on the operations run by transnational mining corporations in three cities in the state of Goiás (Figure 1). Impacts from mining are clearly evident when we consider their small populations and the high number of people among them working directly for mining companies, as well as the relatively short time mining has been taking place there, especially in the cities of Barro Alto and Alto Horizonte.

The three cities – Crixás, Alto Horizonte, and Barro Alto – are located in the center-north region of the state of Goiás, 250 km to 350 km away from Goiânia, the state capital. In these cities, gold and copper are mined by transnational corporations Yamana Gold, AngloGold Ashanti, and Anglo American. Below is a brief description of the cities studied.

Figure 1 – Location of the Goiás cities studied.



Source: Google Maps (2018).

Alto Horizonte

Alto Horizonte is a fairly young city that split from Mara Rosa in 2009. The 2010 census found 4,505 residents, and estimated 5,784 people for 2017 (GOIÁS, 2017). Of these, 23.1% work directly in copper mining at Yamana Gold. Copper mining began in 2007 when Alto Horizonte had yet to become a city in its own right. That year, 56,039 metric tons of copper were retrieved. The largest volume was retrieved in 2009 (248,940 metric tons).

Barro Alto

Barro Alto is a slightly older city, having been created in 1958 as it split from Pirenópolis. The city's economy is based on farming and livestock breeding. In 1980, it had a population of 12,021. Data collected in 1991 and 2000 showed there were relevant drops in population: 9,919 and 6,251 people, respectively. In 2005, company Anglo American comes to the city and begins retrieving nickel, which leads to a population growth. In 2010, 8,716 people were living there, 36.4% of them working in mining, according to the IBGE (2017). The estimated population in 2017 is 10,435 (IBGE, 2017).

Crixás

Although the settlement of Crixás dates back to the 17th century when it was founded by the trailblazers who discovered gold there, Crixás only became a city in early 1954. At the time, its economy was based on farming, livestock breeding, and gold mining. Similar to Barro Alto, in 1980 Crixás had a population of 30,219 but saw many people move away in the following decades. Data from 1991 and 2000 showed there were relevant drops in population: 22,213 and 14,673 people, respectively. Around 2005, mining company AngloGold Ashanti comes to the city and draws people back to it. In 2010, 15,760 people were living there, according to GOIÁS (2017), 29.5% of them working in mining. The population estimated in 2017 is 16,893 (IBGE, 2017).

The purpose of this study was to learn about the good practices and vulnerabilities found in the cities with respect to their environmental, social, education, and health conditions in order to understand their development process. A brief look at the statistical data available from the Brazilian Institute of Geography and Statistics (IBGE) shows the

cities studied have improved significantly since the transnational mining corporations began operating there. Such improvements include a higher GDP and the considerable tax revenue earned by the cities from mining, as seen in the chart above. Besides a population growth, there has been a noteworthy increase in their Gini ratios and HDIs after the company was set up there. In Alto Horizonte's case, the city's Gini ratio in 2003 was 0.39 and then 0.50 in 2010; its HDI was 0.557 in 2000 and then 0.719 in 2010 (IMB), which places the city among those with a high human development index. The same is true for Barro Alto. Its Gini ratio in 2003 was 0.40 and then 0.45 in 2010; the city's HDI was 0.543 in 2000 and 0.742 in 2010, which places the city among those with a high human development index. Crixás is the only city whose Gini ratio has remained basically the same since 1991, at 0.55. The city's HDI in 2003 was 0.565 and then 0.708 in 2010, which places the city among those with a high human development index as well.

However, it must be noted that despite the cities' Gini ratios and HDIs set by research institutes, when visiting these cities, looking around and speaking with people from city social work offices, we found that approximately 50% of their residents are poor. This underprivileged population survives on governmental welfare programs based on minimum income or income distribution. Social inequality materializes not only as a lack of wealth but also as social, educational, health, and environmental deprivation that undermines the assurance of the population's civil and human rights.

1. Social conditions

Regarding the vulnerabilities seen while visiting the mining cities of Crixás, Alto Horizonte, and Barro Alto, we were somewhat taken aback as we realized they are largely unaware of how important it would be for them to draw up and have short-, mid-, and long-term plans in place for surviving without the funds earned from mining. Such disregard is astounding not only because it is a trait common to all three cities but especially because it could prove fatal for the population's future. Considering all minerals are finite and their mining depends on its economic viability as dictated by their prices in the international commodities market, on the whole we did not find any plans for keeping basic public services up and running or improving them once these resources are depleted.

Although other economic activities are carried out in these cities, albeit activities that are chiefly rural in nature, the cities' economies depend largely on mining. Each of the cities has its own history and social makeup. Also, each one of them is home to a different transnational mining corporation. Consequently, the relationships between the companies and their local communities are distinct. For instance, in Alto Horizonte, getting a job with the transnational corporation is quite a common aspiration shared by all local youngsters (they get really psyched about being hired by the company). On the other hand, in Crixás it is evident the community harbors extreme, albeit covert, hostility towards the company (and the city administration as well). People there live under a sort of code of silence regarding the negative impacts from mining. Everyone has one or more relatives employed in mining activities, so they tend to not speak out against such impacts for fear of reprisals and people losing their jobs. In Barro Alto, the ambition to work for the company has turned into spite because the neighboring town of Goianésia – a bit bigger and more developed – boasts a higher number of its residents

working for the mining company than Barro Alto, the city where said company operates.

The three cities went through a time of chaos back when mining operations were being set up. Varied demands were put upon them (especially in terms of social conditions, healthcare, and education), which they had to deal with without the aid of funds from the state or federal governments or from the company itself.

Out of the cities visited, Crixás is undoubtedly the one where mining has been going on the longest, as it dates back to subsistence miners panning for gold in the 18th century. That is perhaps why its social setting is distinctly more troubled than in Alto Horizonte and Barro Alto. In Crixás, we saw a clear social stratification: there is a city for those working for the transnational corporation, whose top executives live in a gated community built by the company and whose other employees live in well-developed neighborhoods around town. According to information obtained from residents, Anglo Gold employees get to send their children to a good school financed by the transnational company and have access to healthcare via private plans partially funded by it. There is another city for civil servants and tradespeople who, more often than not, live downtown or thereabouts and manage to, albeit not without some effort, pay for the costly tuition fees at the school meant for Anglo Gold employees' children and a private healthcare plan. There is also a third city for the poorest stratum of the population, who live in impoverished areas in the outskirts of town, and particularly, in a specific neighborhood (pointed out as a violent place). The city is currently facing increasing rates of urban violence associated with crack cocaine, an extremely cheap, highly addictive drug, a situation that could be mitigated in case proper public policies were in place.

From the Barro Alto city office for social development, we learned that the transnational corporation's arrival there led to a price surge felt especially in rent rates. The poorest residents were hit the hardest, as their income levels did not increase at all. We also heard about the massive numbers of farmers leaving their land and moving to the city in hopes of getting better-paying jobs with the mining company.

People living in the visited cities do not engage much in their political scene. Most of the time they limit themselves to party politics at election times, supporting one candidate or another usually in return for favors, oftentimes some public job or position

Finally, we found there are many politicians and local public managers in all three cities being investigated by the police and the Prosecution Office for embezzlement. However, according to our sources, no one has been convicted yet. Everything is still under investigation.

2. Education conditions

There are private and public schools in the mining cities of Crixás, Alto Horizonte, and Barro Alto. Most of the public schools are run by the city and obviously funded to a great extent by revenue earned from mining activities carried out by the transnational corporations operating in each city. Also, the three cities have partnered up with SENAI, an institution that provides vocational high school education, to train people to work in mining-related activities. Additionally, there are occasional training courses on offer. However, these are either focused on meeting production line needs, that is, the lowest tier in the transnational corporations' hierarchy, or their tuition fees are too expensive for the poorest people to afford, thereby hindering their upward social mobility.

Another aspect shared by the three locations is the absence of public policies dedicated to expanding and enhancing basic education (be it in terms of infrastructure, teacher training and incentives, making more school places available etc.) in order to improve social conditions and social mobility. Public policies dedicated to the higher or vocational education of youngsters and adults are quite timid, as there are no strategic plans in place for the higher education of the cities' average population, even though Crixás is home to a Universidade Estadual de Goiás (UEG) campus.

UEG, Crixás Campus, was created in 1999. In 2000, it began offering teacher training programs on pedagogy, history, and languages to better the quality of the work done by local teachers. This campus once also offered undergraduate programs on agribusiness management, public management, and computer network technology. However, it must be noted that the number of programs offered at UEG - Crixás Campus has not increased. Instead, it has dwindled. Today, pedagogy is the only program still available. It is meant to train teachers and meet the mining companies' immediate needs. There has been a disregard about training people in other fields of knowledge to meet the cities' and their surrounding areas' current and future needs.

The positive education-related aspects found in Crixás includes the existence of three education levels: basic, high school, and higher. Also, the fact that most schools are public and the city's partnership with SENAI dedicated to high school-level vocational education. In Alto Horizonte, all schools are public. One school is run by the state, another is run by the city, and there are two nursery schools also run by the city. The public schools are tuition-free and meals are made using locally-sourced ingredients to encourage family farming. Although there are no higher education institutions in the city, we learned from the city office for education that the city administration is in talks with the mining company and SENAI

seeking to expand partnerships already in place and bring higher education to the city.

Barro Alto is home to 17 elementary to high schools: 11 city schools (one of them in its rural area), two state schools, a private school, and four nursery schools run by the city. Education funds are provided and managed by FUNDESBA, in which Anglo American invests approximately BRL 10,000.00 from tax deductions and benefits. The city's education HDI is about 0.682 percent.

Like in Crixás and Alto Horizonte, there is a partnership between SENAI and the mining companies (*UNIDADE INTEGRADA Sesi/SENAI BARRO ALTO*) and various vocational courses are offered to meet the mining companies' local needs and improve the population's schooling. On the other hand, there are no higher education institutions. Barro Alto residents go to undergraduate/graduate schools in Goianésia, Anápolis, and Goiânia with the aid of a scholarship and grants program funded by the city. One hundred sixty teachers work in the city, although not all of them hold an undergraduate degree.

Overall, schools in the cities strictly fulfill curriculum requirements and focus on meeting the mining companies' workforce education needs. City officials seem indifferent to the strategic purpose of using education as a vital tool for the development of the population and the community. Outside-school programs, although important, have little impact on the community and contribute very little towards creating conditions that would allow residents and communities to achieve greater independence.

3. Environmental conditions

Considering mining towns spring up and fizzle out equally as fast, some environmental aspects deeply troubled us. There are no landfills in any of the three cities visited or any type of control by city administrations over solid waste, which is typically hauled to dump yards located in rural areas. Waste from mining operations in all cities are unloaded into tailing ponds. These ponds are the ones most commonly used in Brazil for the disposal of mining refuse.

The soil in these ponds should be waterproofed, otherwise their environmental impacts may be varied and harmful to the environment and the population, such as: (i) groundwater and aquifer contamination; (ii) surface water contamination; (iii) refuse leaks. Also, it is important to have a plan in place to evacuate the population in case a pond dam breaks. In the case of the visited cities, the authorities said they are not aware of such plans. There is also a suspicion the groundwater volume has receded owing to the use of water by the company. Consequently, the cities have been having a really hard time drilling for water to supply the population.

In the city of Crixás, perhaps because mining has been going on for longer there, environmental impacts are more conspicuous. So much so that all of its residents know they should use only mineral water for drinking/preparing food. They also know they must not eat fish from local rivers. Despite this entire situation of environmental vulnerability, which is somewhat similar in the three cities studied and widely known about by their residents, there have been no substantial, effective efforts by the mining companies towards reforestation and the conservation of water springs, water sources or riparian woodland.

Our observations have led us to believe environmental conditions will never improve unless everyone clearly understands the damage being done to the environment and a specific rehabilitation plan is put

together for each city. Authorities, residents, and mining companies must be involved in devising such plans in a responsible manner committed to the community's future. Otherwise, consequences tend to be severe for the health of both the environment and people. According to "*Subsídios para construção da política nacional de saúde ambiental*" (BRASIL, 2005), which is a set of guidelines for the construction of Brazil's national environmental health policy, there will be no changes without "a set of actions allowing us to understand and detect changes to factors determining and conditioning the environment and which affect human health, in order to define measures to prevent and control environmental risk factors associated to diseases or other abnormal conditions" (BRASIL, 2005).

4. Health conditions

According to Brazil's public healthcare system (*Sistema Único de Saúde - SUS*), provisions in the Brazilian constitution and other organic statutes on healthcare initiatives require mayors and governors to set up Healthcare Committees and attend city, state, and national conferences on healthcare. One of the reasons for the existence of these committees and conferences is to allow for the transparent reporting of information related to disease rates and the initiatives, programs, and policies carried out. However, it is widely known that many diseases, occupational diseases, and workplace accidents go undetected, unrecognized, and unrecorded because a causal link is not established when social assessments are made or patients seen by doctors. Therefore, either information is not duly recorded with the relevant channels and bodies or proper notification is not made owing to various reasons that range from inexperienced managers and practitioners to

a potential, deliberate omission by city officials and even the mining companies themselves.

At the time the transnational companies were setting up their operations in the cities studied, they saw their population boom and were faced with very specific public health problems. That was particularly true in Alto Horizonte and Barro Alto, where mining is a much more recent activity than in Crixás. Back then, there were reports of growing rates of STDs, teen pregnancy, unwanted pregnancy, alcoholism, drug running, and violence in general. However, after the initial phase of operations was over, those rates went down to levels deemed normal. Today, the cities have a reliable public healthcare structure.

There is a public hospital in Crixás, six health clinics in the city and another in Auriverde (a nearby city that has split from Crixás). According to the city's Office for Health, there are no reports of occupational diseases. City officials did not mention a specific rate of workplace accidents (but they did deny such accidents are not common). There are no statistics about the most prevalent diseases in the city, either.

There is a public hospital in Barro Alto and a health clinic in its rural area. Mining company employees are covered by the UNIMED Cerrado healthcare plan. However, as there are no private healthcare services available to see them under this plan, they usually look for care from public health services in Barro Alto or travel to the city of Goianésia to be seen at the latter's private medical services.

In the three cities studied, health conditions are directly impacted by deteriorating environmental and living conditions resulting from mining activities. For instance, water scarcity (diminished flow and constant need to drill new wells/sources) and lack of quality (which is essential for good health), are problems shared by the three cities and major factors that compromise public health. Although we did not find

records of reported cases of diarrhea and kidney issues at the City Office for Health, some residents told us they have been afflicted by such problems, which may be associated to the quality of water. The origin of the problems found should be studied in greater depth, as well as the possibility they are owed to impacts from mining.

In our preliminary contacts with public officials from the three cities, none of them mention a mining-associated disease other than silicosis. No other high rate/prevalent health issues that could be associated to mining were found. Workplace accident rates were deemed usual and not necessarily associated to the specific activity of mining. None of the cities produced official records in that regard.

The officials did mention social problems that impact the population's health. For instance, they acknowledge there has been an increase in STD cases in all cities, as previously noted. Also, social work offices reported problems related to depression, child prostitution; teenage pregnancy; abuse of alcohol and other drugs, especially in Crixás, where addiction to crack cocaine was reported.

Such reports show there are initiatives in place to detect health issues. However, efforts to fight these issues are site-specific and disjointed. Save for pinpoint initiatives, there were no reports about ongoing disease prevention and/or health promotion programs planned or carried out either by the mining companies themselves or in collaboration with the authorities in the cities studied. According to Siqueira and other scholars, planned, integrated actions should "be part of comprehensive, more global policy and be worked out to become a alternative" (SIQUEIRA, et al., 2003).

5. Development conditions

This study into mining and its association with the cities and populations involved was conducted from the standpoint of human rights which, according to Douzinas, “have been devised as a defense against the rule of power, the arrogance and oppression of wealth” (2008, p. 16). Therefore, we sought to discuss development mechanisms for the cities which are home to mining companies to provide their populations with social, educational, health, and environmental conditions that are compatible with the dignity of their current and future residents.

In the three cities, it was clear the transnational corporations operating there impacted the environment, the city’s economy, its public management, how people live, and the quality of their lives. While on the one hand money is changing hands, jobs are on offer, technical courses are available to those looking for specialist training, city populations are increasing, new neighborhoods and good buildings are springing up, more new cars, better internet networks, cable TV, cell phones, and other amenities become available as a result of economic and urban development, on the other hand we have also detected some vulnerabilities that public officials and the population have been unable to tackle. That which is usually called development is first and foremost associated to the circulation of money and people’s purchasing power as seen in the city’s more privileged areas rather than the actual improvement of current and future living conditions of the overall population in each city. Consequently, this notion of development is compatible with social, environmental, educational, and healthcare deficits. However, from the standpoint of human rights, the idea of development goes beyond the realm of the economy and the ability to buy things to a human, collective domain, as we can see from article one in the UN Declaration on the Right to Development:

“The right to development is an inalienable human right by virtue of which every human person and all peoples are

entitled to participate in, contribute to, and enjoy economic, social, cultural and political development, in which all human rights and fundamental freedoms can be fully realized” (UN, ---)

Considering this broader notion of development, we cannot but mention that the studied cities’ high GDP rates help misrepresent their GINI and HDI rates more closely related to human development: health conditions, schooling, income inequality, and other disadvantages. After all, despite mining bringing economic development to these cities, massive disparities can be seen when it comes to the access to economic, social, and environmental rights.

The discussion we propose hinges on the assumption that development is only achieved when human rights are guaranteed to a greater extent. In other words, that means understanding development not only as the creation of wealth but also as the means that give people access to it. By access to it we are not talking about social welfare programs but instead about people’s right to take part in decisions related to public policies that best fit their community. Notwithstanding the importance of actions allowing people and communities to develop fully, we are aware of the significant difficulties involved.

Although this paper represents simply an initial collection of data in the field, we can highlight, even at this early stage, not only the damaging impacts from mining on the environment, society, and people working directly in the activity but also how mining has kept people away from decision-making processes and other actions pertaining to their communities and the work carried out by mining companies.

Mining is today seen as a prime tool for global economic development, despite countless reports of environmental damage and human rights violations:

materialized into water contamination, destruction of people's ways of life, deteriorated, hindered relationships with the land, forced evictions, meager compensation, unemployment, declining public health and safety, and encroaching upon protected areas (ALGRANATI, TADDEI, SEOANE, 2011, p. 31).

This ambiguous trait of mining can be seen in large transnational corporations' operations, especially in those set up in Latin America and Africa, as reported by the authors of *Mineração transnacionais e resistências sociais na África e América Latina* (mining, transnational corporations and social resistance in Africa and Latin America, free translation) when they remind us that mining for natural resources to the detriment of indigenous peoples began in the 16th century. Since the 1990s, Brazil and various other Latin American and African countries have brought about reforms favorable to the interests of large transnational corporations, thereby boosting a new cycle of mining along with a new cycle of pillaging and exploitation of natural and human resources.

The study conducted about the cities of Crixás, Alto Horizonte, and Barro Alto reveals a situation similar to the one described by ALGRANATI, TADDEI e SEOANE in their aforementioned paper *Mineração transnacionais e resistências sociais na África e América Latina*. Even though transnational mining corporations are operating in full compliance with Brazilian laws, paying their taxes, and carrying out social responsibility initiatives, countless problems are owed to mining. In many cases, the harmful impact from such problems on the population's social, educational, environmental, and health conditions are yet to be defined and understood.

In our study, we considered factors related to the social field, the environment, education, and health, obviously in their macro and micro backdrops, and their association with the arrival, current operations,

and future prospects of mining companies in three cities in the state of Goiás. We found that mining involves an exposure to new, unforeseen circumstances which tend to adversely impact small rural communities with respect to their habits and folk culture, the education of their children and youngsters, their social development, family farming, land occupation, water resources, air quality, diseases, and various risks of injury/workplace accidents that increase the vulnerability of miners, their families, and their communities. Understanding the risks from mining and its impacts on the population's social, educational, environmental, and health conditions is essential for planning and conducting initiatives to foster, protect, and rehabilitate communities where mining companies do business (SOUSA & QUEMELO, 2015).

6. Final considerations

As previously mentioned, this is an initial, exploratory study into the social, educational, environmental, and health conditions of three cities in the state of Goiás and which are home to transnational mining corporations. We can safely say these cities have economically developed after said companies settled in the area. However, we found glaring contradictions between numbers and facts, between promises and deliveries, between rights and their assurance. The current economic development model found in the world and particularly in the three cities studied is not committed to sustainable development that respects human rights not only in terms of the communities' present but also their future.

We found that society and the authorities have been largely failing to do something about two aspects we believe are vital for the pop-

ulation's future. First of all, they should be taking advantage of this time when cities are bringing in revenue from the taxes paid by the transnational mining corporations to put together and implement medium- and long-term plans to develop their cities and make them economically independent from said companies, as well as capable of devising innovative solutions to boost the cities' future sustainable development. Second of all, they should look into the cause of the damage done to the environment and communities, and hold those responsible to account by making them fund and carry out rehabilitation and/or damage mitigation measures whenever possible.

Development committed to sustainability and human rights poses analytical-practical challenges, challenges related to expertise and management, in order to tackle social inequalities, education needs, and dire consequences for the environment and human health. Therefore, an ethical understanding and moral conduct based on respect for the environment and humans in a mining backdrop are required to ensure respect for human rights and full sustainability. In short, to ensure human survival and a dignified life (NAVES & FERNANDES, 2015).

References

ALGRANATI, C.; TADDEI, E.; SEOANE, J. Mineração transnacionais e resistências sociais na África e América Latina. GEAL; IBASE, 2011.

BRASIL. Portaria MS/GM n. 3.120, de 19 de julho de 1998. Aprova a Instrução Normativa de Vigilância em Saúde do Trabalhador no SUS. Diário Oficial da República Federativa do Brasil, 14 jul. 1998.

BRASIL. Ministério da Saúde. Secretaria de Políticas de Saúde. Departamento de Atenção Básica. Área Técnica de Saúde do Trabalhador. Saúde do Trabalhador. Cadernos de Atenção Básica. Programa Saúde da Família, n. 5. 2001. 63 p.

BRASIL. Subsídios para construção da política nacional de saúde ambiental. Brasília, 2005. 49 p. Mimeografado.

DIRETORIA DE PROCEDIMENTOS ARRECADATÓRIOS. Departamento Nacional de Produção Mineral. Disponível em sistemas. dnpm.gov.br/arrecadacao/extra/Relatorios/arrecadacao_cfem_substancia.aspx, Retrieved Oct 8, 2017.

DOUZINAS, Costas. O Fim dos Direitos Humanos. São Leopoldo: UNISINOS, 2009.

FEITOSA, Maria Luísa. Entre o direto econômico do desenvolvimento e o direito humano ao desenvolvimento: reflexões a partir do Brasil. In: BOURGORGUE-LARSEN, L.; MAUES, A.; MOJICA, B. (orgs). Rede Direitos Humanos e Ensino Superior: Direitos Humanos e Políticas Públicas. Rede de direitos humanos e educação Superior, 2014.

GOIÁS - Instituto Mauro Borges [GOIÁS] – *Goiás em Dados*. Available at <http://www.GOIÁS.go.gov.br/pub/Godados/2017>. Retrieved Feb 5, 2018.

INSTITUTO BRASILEIRO DE GEOGRAFIA E ESTATÍSTICA. Available at: cidades.ibge.gov.br/xtras/temas.php?lang=&codmun=520640&idtema=19&search=goias%257Ccrixas%257Cmapa-de-pobreza-e-desigualdade-municipios-brasileiros-2003, Retrieved Oct 8, 2017.

INSTITUTO BRASILEIRO DE MINERAÇÃO [IBRAM] - Gestão e Manejo de Rejeitos da Mineração/Instituto Brasileiro de Mineração; organizador, Instituto Brasileiro de Mineração. 1.ed. - Brasília: IBRAM, 2016. 128 p.

JACOB; P.R.; GÜNTHER, W.M.R.; GIATTI, L.L. Agenda 21 e Governança. Estudos Avançados: v.26, n.74. p.331-339. 2012.

LEFF, Enrique. Saber ambiental. Sustentabilidade, racionalidade, complexidade, poder. Petrópolis: Vozes, 2015.

NAVES, B. T. O.; FERNANDES, F. R. Mineração e saúde socioambiental: o desafio ético contemporâneo entre o risco e a sustentabilidade. Revista Direito Ambiental e Sociedade, v. 5, n. 1, p. 106-128, 2015

PALACIN, Luiz. Goiás, 1722-1822 4a Ed. Goiânia, oriente, 1972.

PORTO-GONÇALVES, Carlos Walter. A globalização da natureza e a natureza da globalização. Rio de Janeiro: Civilização Brasileira, 2015.

SIQUEIRA, E.; ARAÚJO, T.; CASTRO, H.; FASSA, A. G. (Editorial). Ciência & Saúde Coletiva, v. 8, n.4, p. 842-845, 2003

SOUSA, M.N.N.; QUEMELO, P.R.V. Saúde do trabalhador e riscos ocupacionais na mineração. Rev. Bras. Pesq. Saúde. Vitória. V.7,n.2.p.269-271. 2015

The (In)Compatibility Between the Nuclear Power Business and Human Rights: the Case of the Itataia Uranium Mine in Ceará

*Ana Maria D'Ávila Lopes*³⁸⁵

*Martonio Mont'Alverne Barreto Lima*³⁸⁶

*Luis Haroldo Pereira dos Santos Junior*³⁸⁷

*Midred Cavalcante Barreto*³⁸⁸

*Tiago Alves de Araújo*³⁸⁹

Introduction

Boasting substantial natural riches, Brazil is an important player in the international economic backdrop. The country supplies certain foreign markets with a myriad of products and imports those it lacks. For instance, some of its main activities include mining for and selling mineral resources. Standing out among them are ample uranium and phosphate deposits which are highly capable of meeting the domestic demand, in the case of the former, and reducing the Brazil's reliance on foreign countries, in the case of the latter. The city of Santa Quitéria, in the state of Ceará, plays an important role in the Brazilian economic scene owing to the reserves of these resources in its soil. However, the mining project has been

marred by friction resulting from its (non-)compliance with laws and regulations that govern its operations, including those on the protection of human rights, chiefly environmental and social rights.

The purpose of this paper is to analyze the potential friction between projects meant to offer nuclear power as an alternative energy source and Brazilian and international standards on human rights in an effort to understand how such rights set a limit to development initiatives, while focusing on the uranium and phosphate mine located in the city of Santa Quitéria. In addition to a review of Brazilian and foreign literature, we interviewed authorities and residents from this city to understand their position regarding the operation of the mine. We also spoke with people from Angra dos Reis, in the state of Rio de Janeiro, where Brazil's two active nuclear plants are located. Results were analyzed under a qualitative approach.

Despite natural misgivings about nuclear power, as people fear accidents, this source stands out as one of the main sustainable alternative energies. Brazil, despite the great prospects for the output from its uranium and phosphate mines, should conduct such mining operations in keeping with human rights standards and make sure the population is provided with the tools they need in their pursuit of transparency and an active role in decision-making processes.

1. Nuclear power and development

Over time, the various sources of energy used by humans have raised questions about their viability and degree of environmental impact. Such discussions have only become more heated since uranium was first used to generate nuclear power, considering its high potential for damaging the environment around plants.

1.1. Nuclear power historical-conceptual aspects

It was only in the 1960s that uranium first emerged as a primary source of energy. It kept substantially growing until the end of the 1970s when strong opposition by environmentalists who raised concerns about the risks posed by nuclear plants all but halted investments in them, which had been made mostly by the US, Canada, France, and Germany.

Despite the existing risks, some favorable positions about the construction of new reactors began cropping up, especially given the availability of uranium for its use as primary fuel in some countries; low carbon dioxide emissions, which is why nuclear power is considered clean energy; and the safety measures put in place by the power plants.

Nuclear power is now the fourth major source of electricity in the world, following coal, natural gas, and hydroelectricity (ANEEL, 2008).

On the other hand, Brazil holds one of the largest uranium reserves – ranking 7th in the world (ABDAN, 2014), and “masters the life cycle of nuclear fuel” (FGV, 2016, p. 11).

The uranium enrichment process is required for the generation of nuclear power. This process takes place in three phases: a) mining and processing: in this phase, uranium is extracted from nature and taken to a processing plant where it is purified and concentrated, yielding a type of yellow salt (yellowcake); b) conversion: the yellowcake is dissolved, purified and turned into a gas; c) enrichment: uranium-235 atoms are concentrated and then used as fuel by nuclear power plants. At the plants, this enriched atom goes through fission and slowly releases energy in the form of heat, which raises the temperature of water within reactors in a separate system, thereby generating steam and moving the turbines. Keeping the system containing radioactive material separate from the cooling and steam generation systems is important to ensure

operations are safe from radioactivity emitted by uranium atoms and, ultimately, generate clean energy (ANEEL, 2008).

The Brazilian nuclear program began only in 1956. It led to the construction of nuclear power plant Angra I and, later on, Angra II. The program is analyzed further in this study (ANEEL, 2008).

1.2. National and international standards and regulations on nuclear power generation and use

After the United States of America detonated atomic bombs over Hiroshima and Nagasaki in 1945 and once World War II ended, most countries took steps to prevent nuclear power from being used in warfare and limit the proliferation of such weapons.

Despite this capability for destruction, other peaceful uses of nuclear power were encouraged after new scientific advancements made it possible to understand this energy source's potential. Its power-generating viability led to attempts at cooperation to regulate the use of nuclear power domestically and internationally (BUCK, 1983).

According to Sergio Duarte (2014), part of such initiative was owed to the US during the administration of Dwight Eisenhower. In 1953, the President launched a nationwide program called Atoms for Peace, a revision of the 1946 Atomic Energy Act, in order to set up a civil body that would do research into nuclear power. Based on that initiative, the US proposed to the UN General Assembly the creation of an international agency. Hence, in 1957 the International Atomic Energy Agency (IAEA) was created to promote nuclear power research and development, as well as to regulate and control the use of such power by countries.

In 1968, in a global scene where several countries already had nuclear material and technology, the Treaty on the Non-Proliferation of Nuclear

Weapons was signed (UN, 1968). Although the treaty's core goal had been to achieve disarmament by banning the production of nuclear weapons, it also restricted the use of nuclear power solely for peaceful purposes.

The Treaty on the Non-Proliferation of Nuclear Weapons was ratified by Brazil on July 2, 1998, via Legislative Decree no. 65, and entered into force under Decree no. 2864 of December 17, 1998 (BRASIL, 1998). However, because this activity is hazardous for the health of workers directly involved in it, every country was supposed to not only set guidelines for this activity as provided for by the Treaty but also follow the standards set by the International Commission on Radiological Protection (WNA, 2017).

Years later, in 1956 Brazil created its National Committee on Nuclear Power (*Comissão Nacional de Energia Nuclear* - CNEN), the agency in charge of controlling and monitoring the use of this energy. CNEN became a leading player in the country's embryonic nuclear power policy.

Later on, in 1962 Law no. 4118 was enacted (BRASIL, 1962). It regulated the national nuclear power policy and was the main document governing the matter.

After the re-democratization process, Brazil's Federal Constitution was promulgated on October 5, 1988 (BRASIL, 1988). In addition to dictating that mineral resources belong to the federal government (article 20, IX), the Constitution subjects the use of nuclear power to several conditions, including the requirement that it is used for peaceful purposes (article 21, XXIII, "a"). Any attempts at overstepping these strict restrictions are therefore banned.

1.3. Use of nuclear power in brazil

Nuclear power accounts for 3% of the electricity supply in Brazil (WNA, 2017). This initiative dates back to the early 1950s when the Brazilian government, via the National Research Council, began investing in nuclear technology. Its development saw its heyday during the 1964-1985 civil-military dictatorship.

In 1975, the government decided to put a policy in place to make the country self-sufficient in terms of nuclear technology. Brazil then signed an agreement with Western Germany on the supply of eight nuclear reactors over the course of 15 years. The Angra 2 and Angra 3 nuclear power plants were supposed to be built using equipment from the Kraftwerk Union. The agreement also involved the transfer of nuclear technology; the supply of nuclear fuels; the construction of infrastructure capable of supporting Brazil's nuclear program, and the education and training of skilled teams (TÁVORA, 1974, p. 105).

To achieve the goals of this nuclear policy, the state-run company *Empresas Nucleares Brasileiras S.A. – Nuclebrás* was created. However, the economic problems experienced by Brazil prevented the construction of the Brazilian-German reactors. Brazil's nuclear program was re-organized only in the late 1980s.

In 1988, Nuclebrás subsidiaries were taken over by *Indústrias Nucleares do Brasil S.A. - INB*, a mixed capital company tied to the Brazilian Ministry of Science, Technology and Innovation which oversees, through a monopoly granted by the federal government, the production and sale of nuclear power materials, under article 177, V, of the 1988 Federal Constitution (BRASIL, 1988). The task of building Angra 1 and 2 was transferred to *Furnas Centrais Elétricas S.A. Furnas*, an Eletrobrás subsidiary.

Power plants activities are monitored by CNEN, which is responsible for licensing and overseeing all nuclear facilities. In addition to CNEN,

the Brazilian Institute for the Environment and Renewable Natural Resources (IBAMA) is responsible for granting the environmental licenses required for nuclear facilities. These facilities are monitored by the International Atomic Energy Agency (IAEA) as well. Among other roles, IAEA monitors whether countries are violating the international commitment to not carry out nuclear weapons programs, under the Treaty on the Non-Proliferation of Nuclear Weapons of which Brazil is a party.

Today, Brazil's uranium output capability is at 400 metric tons/year. However, there are plans to increase such capability to 800 metric tons and, subsequently, reach 1,200 metric tons/year of uranium concentrate (INB, 2017).

2. Brazilian uranium deposits and mines

Uranium is extracted in Caetité (BA), the only mine of its kind currently in operation in Latin America. It is capable of turning out approximately 400 metric tons/year of uranium concentrate, enough to supply the Angra 1 and Angra 2 power plants. However, there is a reserve holding an average of 309,000 mt of U_3O_8 across the states of Bahia, Ceará, Minas Gerais, Paraná, and others (MATOS; RUBINI, 1999).

2.1. Caetité mine (BA)

The Caetité mine, located approximately 640 km from Salvador (BA), is in the prominent position of being the only uranium mine in operation in Latin America. This characteristic has turned the Caetité mine into a benchmark for analyzing the viability of other mines, such as the one in Santa Quitéria (CE).

With a population estimated at 53,000 people, Caetité is located in the Bahia brushland. Mining is one of the city's main economic activities. Overseen by INB, the mine turns out approximately 400 metric tons of uranium every year.

Given the large amount found of the mineral, estimated at 100,000 metric tons, various orebodies have been opened for mining. Still, there are others currently going through the required legal procedures, such as obtaining environmental licenses. Consequently, the annual capability may reach 800 metric tons after the future Engenho mine goes into operation, also in Caetité. According to data from INB, since mining began in the area, 3,750 metric tons of uranium have been extracted (INB), an amount capable of meeting the current energy demand. One of this mine's advantages is that it can be open-cast, without the need for more time-consuming, costlier, albeit safer, underground operations.

Even though technicians regularly visit the Caetité to collect samples for contamination tests, locals have complained they are not given access to the results. As reported by newspaper *Estadão* in 2015 (ESTADÃO, 2015) and also by international NGO Greenpeace in 2008 (GREENPEACE, 2008), there was an instance of water being contaminated by the uranium extracted from the mine. That incident rattled people living in the area and brought to light an already underlying fear experienced by various sections of the population. As a result, several complaints were made against INB, accusing it of withholding information from the community about possible violations of socio-environmental safety regulations (GREENPEACE, 2008). In 2016, NGO Conectas, along with other Brazilian and international organizations dedicated to the protection of human rights, lodged 14 complaints against the Brazilian government with the Inter-American Commission on Human Rights.

Those complaints were related to cases of mining-related violations of such regulations. The Caetité mine featured among those cases. The complaint was grounded on the detection in 2010 of radioactive contamination in samples of water used by humans and animals, which proved a significant percentage of the population was exposed to the radioactive material (CONECTAS, 2016).

2.2. Itataia mine (CE)

The Itataia mine holds the largest reserves of uranium and phosphate in Brazil. It is located in Santa Quitéria, in the Ceará brushland, 222 km from Fortaleza, the state capital of Ceará. Phosphate is the prevailing element. It is estimated at a total 8.9 million metric tons, while uranium reserves are about 80,000 metric tons (INB, 2017).

To tap into that potential, INB and company Galvan partnered up to create the Santa Quitéria Consortium. Galvan operates in mining, processing, and distributing phosphate fertilizers. The consortium's goal is to set up a mining project meant to annually turn out about 240,000 metric tons of phosphates and 1,600 metric tons of uranium concentrate (INB, 2017). The total investment to get the project up and running is roughly estimated at BRL 860 million de reais (CONSÓRCIO SANTA QUITÉRIA, 2014).

3. Nuclear power and human rights

In many countries, despite high growth rates, their population's quality of life has hardly improved. Instead, increased social inequality and income concentration are seen (NUNES, 2003). Additionally, their

environmental, social, and political costs have been severely called into question as they have led to environmental degradation, recurrent disregard for labor rights, and ever stronger lobbying groups connected to various economic sectors (SEN,2010).

As a result of a growing population’s increasing demand for energy, many countries’ governments now see the role of meeting that demand as one of their main responsibilities. However, the fact that most energy sources are highly polluting and non-renewable has led countries to seek sustainable alternative solutions. Also, countries like Brazil, whose energy mix is highly dependent on hydropower, face the risk of having their supply jeopardized by certain external factors, such as prolonged droughts.

ANNUAL ENVIRONMENTAL IMPACTS ASSOCIATED TO A 1000 MWE POWER PLANT

Impacto	Carvão	Nuclear (LWR)
Uso da terra (acres)	17.000	1.900
Descargas de água (toneladas)	40.000	21.000
Emissões de CO ₂ (toneladas)	6 × 10 ⁶	0
Emissões no ar (toneladas)	380.000	6.200
Emissões radioativas (curies)	1	28.000
Saúde ocupacional		
Mortes	0,5 – 5	0,1 – 1
Lesões	50	9
Total de fatalidades (população e trabalhadores)	2 – 100	0,1 – 1

*Inclui extração, processamento, transporte e conversão. Carvão extraído por mineração de superfície.
Fonte: WASH-1.250 e Ann. Nuclear Energy, 13, 173, 1986.

Therefore, reconciling economic development, especially with respect to the use of nuclear power, and environmental conservation is no easy feat. The risks inherent to nuclear power plants and their history of several accidents over time open up a discussion about how compatible nuclear power development, the environment, and human rights are. An ecologically balanced environment is vital for people to enjoy their

human rights because one thing is tied to the other, given that damage to the environment interfere with and undermine the whole of human rights. That is why the right to the environment is said to transcend the notions of individual and collectivity to encompass the entire human species (FENSTERSEIFER, 2009).

Making sure the production nuclear power is compatible with human rights requires, in addition to respect for the environment, that those producing it follow the principles and regulations meant to protect people and keep them and society as a whole safe from the occasional disadvantages associated to the use of this type of energy. To make uranium viable as an energy source, people's rights to human dignity, information, proper working conditions, fair pay, and especially to life and health, must be protected.

The acknowledgement of the connection between environmental conservation and human dignity has made it possible for humans to go further in our pursuit of an ecologically balanced environment that ensures people's right to life and full development, health, and well-being (AMORIM, 2015). However, the development of mining, and especially of uranium mining, has not done away with the risks of impacts to local ecosystems and adverse effects on human health or life. With respect to the Itataia uranium mine in Santa Quitéria, a city located in a semi-arid area, the high amount of water required for uranium-related operations may reduce the amount available for human use and, therefore, make water even more scarce than it already is there.

It is also feared that the local workforce is going to be inhumanely exploited given the lack of technical training available to the population. Up to the completion of this study, no courses had been offered to train the population in the city of Santa Quitéria and improve their work skills. Consequently, it is increasingly likely most locals are go-

ing to take up merely subpar jobs, despite their low wages and adverse working conditions.

Furthermore, the lack of information about the particularities of the Itataia mine project has raised a host of questions. So far, the public hearings held in the city have not been enough for people to clearly understand the project and the strategies that will be in place to deal with environmental risks associated to nuclear power.

4. Brazilian nuclear power plants: Angra 1 and Angra 2

To diversify Brazil's energy mix, the federal government set up in the city of Angra dos Reis, Rio de Janeiro, 157 km from the state's capital and with a population estimated at 181,000 people –, a nuclear complex in which two power plants – Angra 1 and Angra 2 – are in operation and a third – Angra 3 – is currently under construction. Having had turned out enough power to supply large cities such as the very capital of Rio de Janeiro, Angra's operations and advantages have for years been the subject of studies into their viability and expansion.

4.1. Almirante Álvaro Alberto Nuclear center (CNAAA)

Located in the city of Angra dos Reis – RJ, about 40 km from downtown, the Almirante Álvaro Alberto Nuclear Center (CNAAA) was named after one of the pioneers and main advocates of nuclear technology studies in Brazil. The center is home to the Angra 1 and Angra 2 power plants, as well as Angra 3, under construction. It is run by Eletrobrás Eletronuclear, a mixed capital company and subsidiary of Centrais Elétricas Brasileiras S.A.

Covering a relatively small area when compared to other power plants, for obvious reasons CNAAA has a vast team in charge of the security of its facilities, including the Praia Brava and Mambucaba housing developments built by Eletronuclear for its workers. Additionally, to help CNAAA share information on the entire complex's operations and the main aspects involved in how uranium is handled, the center has an Information Bureau operating daily and staffed by a team trained to explain the most basic elements related to the whole nuclear cycle.

4.2. The power plants and their environmental impact

Although nuclear power plants are considered, as long as properly operated, a clean energy source because their greenhouse gas emissions are low, they only take up a small area of land when compared to hydro power plants, and have a low impact on local animals and plants, their potential negative impacts are indeed acknowledged.

Therefore, strict monitoring mechanisms and compliance with regulations are required for a nuclear complex to be authorized to operate, such as the environmental license granted by the Brazilian Institute for the Environment and Renewable Natural Resources (IBAMA), the operating license granted by the Nacional Nuclear Energy Comission (CNEE), and the urban license given by the city.

In 2004, the CNAAA introduced its Integrated Safety Management Policy. Under this policy, all sectors of the complex work together to ensure the so-called Nuclear Safety. As dictated by Eletronuclear³⁹⁰, safety is above economic and productivity aspects. It includes quality assurance and the environment, and workplace safety, health, and personal protection.

³⁹⁰ Available at: http://www.eletronuclear.gov.br/LinkClick.aspx?fileticket=_zP5EYfO-fEW%3d&tabid=85

A series of studies are carried out while plans for the construction of a nuclear power plant are being drawn up. The studies take into account emergency procedures, contingency plans, and the local geography. They also analyze the wider environment where a plant is to be located. The Environmental Impact Report (EIR)³⁹¹ on Angra 3 makes a thorough evaluation of safety procedures and explains about core issues related to the project, such as the characteristics of radioactive elements and waste, as well as the means available to contain them.

One of the main actions taken by Eletronuclear was the creation of an Environmental Monitoring Lab (*Laboratório de Monitoração Ambiental* - LMA) in 1978 in the village of Mambucaba. The lab's purpose was (and is) to conduct studies to check the potential impacts from the activities carried out at the nuclear complex. Incidentally, such studies are a requirement for obtaining the licenses granted by CNEE and IBA-MA. However, sections of the population and even city administration officials have raised issues about how studies and monitoring work are carried out by CNAEA. They claim information is sanitized before it is made available to the public, which keeps them in the dark about the actual problems that may be going on at the plants.

Although we recognize restricting access to the power plants' facilities for security reasons is appropriate, we find there is a need for a closer dialogue with local authorities. Doing so would also help satisfy the population's demands for greater clarity. Additionally, the lack of skilled workers in the area leads Eletronuclear to hire people from other states. As a result, there are fewer and fewer points of contact between CNAEA employees and local residents, which only adds to the shortage of information sources.

391 Available at: http://memoria.cnem.gov.br/Doc/pdf/cronologia/RIMA_2006_angraIII.pdf

In view of this, the population at large remains fearful of what goes on at the power plants. So much so that one of the factors people consider when choosing their home is whether it is closer or farther from CNAAA.

4.3. Outreach initiatives around the power plants

Eletronuclear acknowledges its social responsibility stemming from the impact of its activities goes beyond environmental matters. Therefore, the company runs a few social inclusion initiatives among its surrounding communities. These efforts include a cooperation agreement with state schools, housing for company employees, the construction of a local hospital and staff training, in addition to smaller-scale support for everyday activities, such as funding the school bus run for children of people living in the communities of Praia Brava and Mambucaba and doing small repairs they may need there.

The Nuclear Center holds an annual ‘Environmental Week’, currently in its 15th year. The event features talks on social awareness and environmental and culture appreciation, besides sports like canoeing competitions. This opportunity is also used to provide more information about the power plants’ operation and other related topics, such as solid waste monitoring. For the Environmental Monitoring Lab employees and the population at large, the event gives them the chance to build closer relationships between the residents and the Nuclear Center. This year, the event celebrated certain local cultural practices and also focused on the conservation of marine animals, a source of livelihood for a large number of people in the area.

Fundação Eletronuclear de Assistência Médica, a hospital located in Praia Brava, plays an important role in the lives of residents. Meant for power plant workers and the surrounding population, the hospital offers

tests and exams in general and also has a specific department to monitor anomalies in the area, the Center for Information on Radioepidemiology (*Centro de Informações sobre Radioepidemiologia* - CIRA).

Another noteworthy institution is the Medical Center for Ionizing Radiation (*Centro de Medicina das Radiações Ionizantes* - CMRI), which treats victims of radiation accidents. The hospital has dedicated staff members who have been specifically trained for the event of some contamination or a nuclear accident so they may swiftly respond to such event.

However, some locals, including from the communities financially supported by Eletronuclear, call some of these outreach initiatives into question. Education-wise, the cooperation agreement with state school *Colégio Estadual Roberto Montenegro* expired about three years ago. However, Eletronuclear required the school to draw up its own emergency plan and submit to the company for approval. The school still has not done that because of a total lack of technical support to put such plan together.

Because both the housing development and the school were built specifically for Angra 1 workers in the 1980s, their original purpose no longer fits the new circumstances that have emerged over time. Many of the power plant workers' children do not go to the state school. With respect to the residents' relationship with the Nuclear Center, they point out that, although the Praia Brava community is financially supported by Eletronuclear, there are significant socio-economic differences among the people living there. Such differences affect how local issues are handled. Residents specifically mentioned there are different categories of homes – even different garage sizes – and these categories are directly related to someone's position at the power plants. The 'Environmental Week' is run more proactively by the very residents themselves than Eletronuclear employees. The company is said to merely fund it and hold some talks. The fact the event is held only once a year is another factor residents believe

makes it difficult for them to build closer bonds with CNAAB and tends to keep them a bit distant from the Center.

Therefore, many power plant employees – especially those whose jobs require greater qualification – usually come from the state capital or other states.

4.4. Angra nuclear power plants, between development and human rights

Playing an important role in Brazilian energy policies under the 2030 National Energy Plan, the city of Angra dos Reis has interesting practices in place that help us understand how social bonds are built between large companies in the nuclear industry – in this case, Eletronuclear – and the people living near the plants. This empiric study is the product of a visit to this city between August 29 and September 1, 2017, whose purpose was to understand the different viewpoints of the main social actors within this relationship and bring to light the positive and negative attitudes concerning the protection and preservation of human rights by the companies and even the authorities.

From the studies carried out on site, we found there is strain between business sectors, the authorities, and the population at large. Eletronuclear runs a colossal enterprise that is relevant for the entire country. The company is aware of its socio-environmental liability and has a few initiatives in place to benefit the population. However, the lack of coordinated efforts with the Angra dos Reis city administration and even with locals at times prevents the company from properly sharing information capable of allaying their fears regarding how uranium is handled. Despite certain difficulties with satisfactorily implementing social initiatives, e.g. the lack of partnership with local schools, the com-

pany has been aptly fulfilling its role regarding the environment, even though residents remain largely unaware of such information. The hospital funded by the company is an example of the company's commitment to the community.

5. The uncertainties surrounding the Itataia mine

The Itataia (or Itatiaia) mine was discovered in 1976 and is located in the state of Ceará, between the cities of Santa Quitéria and Itatira, 222 km from Fortaleza. In addition to uranium for the generation of nuclear power, the mine is rich in phosphate used to make fertilizers and animal feed (MELO; MARQUES, 2014, p. 7).

After years struggling to get the required mining license, the Santa Quitéria Consortium, made up of company Galvani Indústria, Comércio e Serviço S.A (whose shares are 60% Norwegian) and state-run company Indústrias Nucleares do Brasil (INB), applied for an environmental license from IBAMA in 2011. In case the license is granted, mining operations are expected to begin in 2018. Still, the consortium is yet to secure even the preliminary permit³⁹² (IBAMA, 2017).

Licenses take so long to be granted because of concerns related to the negative impacts that uranium mining may have not only on the environment but also on the health of people living nearby,³⁹³ as reported by MELO and MARQUES (2014, p. 71).

³⁹² Project approval depends on obtaining the preliminary permit, construction permit, and the operating license (CONAMA, 1997)

³⁹³ The communities impacted by the Itataia Mine are located in the area of Sertão Central in Ceará, amidst mountain ranges, hills, rocks, rivers, and vast shrublands. There, approximately 6,000 families live in 27 communities in the city of Santa Quitéria and 15 in the city of Itatira,

As a for instance of such impacts, the amount of water the Santa Quitéria Project will require is equivalent to 115 water trucks per hour. On the other hand, communities that have in vain been petitioning for years for the construction of a water pipeline only get about 26 to 36 water trucks a month. It means that in a single day this project is going to use up more than 70 times the amount of water the local communities get in a whole month!

Objections against the use of nuclear power also refer to the possible risks it is going to be used for military purposes, in violation of international agreements on the matter.

Two people currently work on the job site. They are there to take care of facilities built decades ago. According to the Santa Quitéria Project coordinator, mining operations are going to create approximately 2,000 jobs and turn over BRL 1 billion a year (JAZIDA, 2017).

On April 24 and 25 and May 18 and 19, we interviewed local authorities and the population³⁹⁴ in the city of Santa Quitéria about the mine-related operations. The results were analyzed in correlation to the fundamental rights embraced by the 1988 Federal Constitution and are described below.

5.1. Background

The Santa Quitéria Project was set up to oversee the phases needed to make the Itataia mine operational. Total investments are estimated at

which are about 20 km away on average from the Itataia Mine; they make up the 'directly impacted communities' (CÁRITAS, 2015)

³⁹⁴ All interviews were recorded, including the participants' express authorization for their disclosure.

BRL 870 million, given the potentially vast phosphate and uranium reserves contained in the mine. However, even in view of such figures and the resulting economic benefits, while speaking with the locals we soon realized some of them are fearful of this project and that the community's opinions are split on this matter.

The Santa Quitéria City Secretary for the Environment said the rift has even reached the media. He mentioned the two local radio stations, each standing on opposite sides of the mining issue.

The topic was the subject of heated political debates in the run up to the 2016 city elections, as mayoral candidates held opposing views on it. According to the president of the Association of Farmhands and Family Farmers, many politicians have been elected to the office of mayor or city councilor on an argument either for or against the mine, and always on the promise of bringing jobs to the area.

Also according to the City Secretary for the Environment, this contention is made worse by the very characteristics of small towns in the northeastern brushlands, where cronyism and political patronage still run rampant. That is why many people claiming the mine is viable do so not out of objective considerations but as a way of supporting certain local political leaders.

We also found people's opinions are divided for other reasons as well. For instance, those who oppose the project believe the nefarious damage uranium may bring to the population and the environment as a whole is grounds enough to deny authorization for it. Among their arguments is the claim there is evidence uranium leads to higher rates of cancer among the population and damage to the environment as the radiation emitted by the mineral contaminates the groundwater, for example.

On the other hand, mine enthusiasts chiefly maintain that the city would make good money from the sale of phosphate fertilizers.

It should be noted that early on during the interview, when the City Secretary for the Environment was asked about the “Itataia uranium deposit,” he promptly clarified that it is actually a “phosphate deposit.” He pointed out that such reserve accounts for 30% of the total phosphate found in Brazil. Once again asked about the uranium, the Secretary said it would be processed and enriched outside of the country. Therefore, the population would be safe from any sort of potential radioactive contamination.

We also heard from people who had mixed feelings about the mine. While they believed uranium mining could be quite profitable for the country, they also understood some special precautions must be taken as it is retrieved from the mine.

Finally, some people added that a lack of interest by local and national authorities is the reason why it has taken so long for mine operations to begin.

5.2. Right to information and political participation

In order to ascertain whether there were any programs or projects dedicated to educating students about the mine, we visited schools *EEFM Júlia Catunda*, *Escola Municipal Francisca Geracina Lobo de Mesquita*, and *Colégio Paulo Freire*. We found that the authorities directly involved with the mine project had only had sporadic contact with the students, which shows there is a lack of interest in adopting an ongoing approach to sharing information. At school *EEFM Júlia Catunda*, some projects had been carried out but are not active anymore. We did not find any similar projects dedicated to students at school *Colégio Paulo Freire*.

The absence of a campaign capable of correcting possible inaccuracies about the mine project leaves the population largely in the dark. People have trouble understanding all of the aspects involved in the mine's operations, so much so that we noticed they struggle to even articulate and back up their opinions about this project. Such situation is understandable given such lack of information.

5.3. Right to the environment

Regarding the environment, our team found this is one of the major issues of contention among the population. A dispute which is only made worse by the aforementioned lack of information. Hence, the need to build a dedicated reservoir to supply mining activities has raised questions regarding the scarcity of water in the area. The mine's project includes the construction of a pipeline to carry water directly from the Edson Queiroz reservoir. According to the Environmental Impact Report (EIR) produced by the Santa Quitéria Consortium (2014), in charge of the enterprise, the state government will be responsible for the construction of the pipeline. However, locals have complained the water from this reservoir is not enough for its intended purpose.

This situation is made worse by Santa Quitéria's geographical position right in the middle of Brazil's semi-arid region, an area already harshly affected by prolonged droughts.

In fact, based on data obtained from the EIR, approximately three water trucks loaded with 30,000 liters will be used on a daily basis. The water will be taken from towns surrounding the mine. As mentioned above, there has been no word either from the company or the authorities on whether water may become even more scarce for the population.

Additionally, there is widespread concern about water being contaminated by chemical tailings from the mine, especially considering the incidents seen in other places, such as at the Caetité mine in Bahia.

Residents have also pointed out the lack of proper local infrastructure such as roads, reservoir etc. capable of making the entire mine-related activity feasible.

Regarding fears of uranium radiation, some locals said uranium will simply be separated from phosphate and soon after shipped to Canada for enrichment. They added that raw uranium ore poses no risks whatsoever to the population and that people should not worry about a spike in cancer rates. However, they were concerned about the possible risk that mining may lead to some environmental contamination related to the use of water from the reservoir and solid waste lying around the mine. With respect to the transportation of the material extracted, especially the uranium which will be hauled to the Port of Mucuripe in Fortaleza, they expressed misgivings about the safety of the journey.

Most interviewees said they were disgruntled by the lack of information from the Santa Quitéria Consortium, which has not properly discussed or explained about those risks. They also said the consortium has been evasive when asked about the techniques used in this process. Some added that even attempts at clarifying such aspects have not been enough, given that reports on potential impacts are dubious, to say the least, and put together in a way that corroborates the consortium's position. This situation is made worse by the fact the population at large is unable to understand the technical language used in such documents.

5.4. Right to work

One of the main benefits derived from the Santa Quitéria Project is the creation of jobs for the population, as employees will see a boost to

their personal and family income. However, our team found that interviewees were rather doubtful about this benefit and even its viability, considering there is no program in place or in the works to train people to the jobs that may come up.

Like in Angra dos Reis, it is believed people will be brought in from other areas, even from outside the state of Ceará, to fill positions requiring greater qualification.

Interviewees compared the situation with Caetité, Bahia, where the benefits promised to the population have failed to materialize, such as higher income or other social indicators. Additionally, they wonder about the steps that will be taken to protect the affected families – 6,000 families living in 27 communities in the city of Santa Quitéria (including the settlements of Saco de Belém, Morrinho, Queimadas, and Alegre Tatajuba) and 15 in the city of Itatira (MEDEIROS; DINIZ, 2015, p. 82) – as they are closest to the mine. Locals also pointed out that cultural aspects may be affected as well.

5.5. Economic rights

Regarding economic aspects, we found the project focuses on the benefits that mining could bring, especially in the form of taxes and more money trading hands around town. Additionally, electricity would become cheaper given more of it would be available from nuclear power. According to data from the EIR produced by the Santa Quitéria Consortium, in case the mine goes into operation, the amount of uranium to be extracted will represent a significant increase to Brazil's annual output, considering the only uranium mine currently operating in Brazil is the one in Caetité, which turns out approximately 400 mt/year.

Despite acknowledging the benefits this project may bring, some interviewees said there are certain underlying political interests that make locals question who actually stands to gain from it. Comparatively speaking, they mentioned that castor oil plant growing has ceased in the area of Inhamuns. This oil was used to supply biodiesel plants set up decades ago in the Brazilian Northeast. However, one interviewee said that stronger political interests prevailed and this arrangement was halted, much to the chagrin of local farmers.

5.6. Right to education

Considering the significant environmental, social, and economic impacts the city of Santa Quitéria may experience in case uranium and phosphate are ever extracted from the Itataia mine, sensitive issues were raised by interviewees with respect to the production of knowledge capable of improving the locals' education. When we spoke to certain people there, they said research groups often come to town in search of information about the mine's operations. These groups vary in size, from a single researcher to bigger groups of six or seven people. These researchers focus on technical, social, and legal aspects. Incidentally, the legal aspects they are interested in are usually related to environmental regulations.

In any case, despite this relative academic interest shown about the area and the mine's project, we found there are hardly any returns from such studies to the local population, i.e. they have little or even no social impact. We noticed this fact especially after asking interviewees whether they had ever obtained any technical explanations from or seen steps being taken regarding some of those studies, which they denied. Hence, we believe a relationship should be built between the academia and society.

Conclusion

The conflict-laden relationship between development and human rights is especially exacerbated in the energy industry. Meeting the energy demand requires a host of measures, including interventions in the environment, how nuclear source exposes when requesting uranium as a fuel, extractable through procedures that, without strict compliance with legal strictures, can cause serious socio-environmental the damage. In that regard, this study looked into the friction between human rights and nuclear power in Brazil at a time the country is seeking to become self-sufficient in uranium production.

Despite deep-seated fears nuclear sources may be used to make weapons, their potential goes beyond warfare, which is seen in the vast growth of nuclear power being used in various countries. Furthermore, because this is a topic to which national and international interests converge – be it to dispel the aforementioned fears or to reduce adverse climate impacts –, the regulations governing both interests show the need for these regulations to also converge. The result of that includes the ratification of treaties and the role played by the International Atomic Energy Agency in their monitoring. In any case, Brazilian particularities and those belonging to other countries require said countries to formulate their own energy policies based on international standards. Considering Brazil is seeking to add energy sources to its energy mix, nuclear power has ample development potential, even though it is still incipient in the country.

This potential is found in vast uranium reserves located mostly in the city of Santa Quitéria, state of Ceará. However, the nuclear projects that may one day be carried out in this city must be conducted in keeping with human rights standards. The population must be provided with the necessary explanations. Also, locals must be allowed to take part in public

discussions so their needs can be heard and met, considering that these people are the ones positively and/or negatively directly affected by the Itataia mining project. Shortcomings such as the lack of both information and social and environmental guarantees, which shortcomings showed in our talks with locals, deserve special consideration by authorities directly related to such mining and who play an essential role in removing doubts and fears that may be doing the rounds.

Other countries' experience, be it positive via the expansion of nuclear power in their energy mix, or negative because of disasters involving their power plant reactors, is a relevant tool Brazil can use to improve its performance in this field. These accrued experiences should translate into better national practices when dealing with nuclear power to ensure the population is safe. Additionally, for development policies to be deemed legitimate they must make sure people can enjoy their rights to a healthy environment, information, employment guarantees, and even to political participation. After all, people are the ones development is meant for, not only passively but also in an active manner. Therefore, it is up to the population in Santa Quitéria to carefully analyze the mining project's pros and cons, along with the authorities responsible for said project and within the parameters ensured by human rights.

Despite the existing friction, we also see possibilities for convergence between nuclear power and the rationale of human rights. By giving the population the prospect of low-cost, sustainable energy supply, conditions are created for people to enjoy greater well-being, a goal equally pursued by these essential legal standards. The very interdependence between such rights is an acknowledgement of how important economic rights are so that the others may be enjoyed to the fullest. In turn, the right to participation allows the population to voice

their needs and, by so doing, point out the best way to achieve such goals. It is only when both perspectives intermingle that the communities directly involved, such as the one in Santa Quitéria, can recognize the risks and opportunities related to similar projects.

References

ABDAN – ASSOCIAÇÃO BRASILEIRA PARA O DESENVOLVIMENTO DE ATIVIDADES NUCLEARES. **Definição do Programa Nuclear Brasileiro**. 2014. Available at: <http://www.aben.com.br/Arquivos/291/291.pdf> Retrieved: Jun 4, 2017.

AMORIM, João Alberto Alves. **A ONU e o meio ambiente: direitos humanos, mudanças climáticas e segurança internacional no século XXI**. São Paulo: Atlas, 2015.

BRANDÃO, Rafael Vaz da Motta. **O Negócio do Século: O Acordo de Cooperação Nuclear Brasil-Alemanha**. 2008. 135 f. Dissertação (Mestrado em História) – Universidade Federal Fluminense, Niterói. 2008.

BRASIL. Governo Federal. **Plano Nacional de Energia 2030**. Rio de Janeiro: EPE, 2007.

BRASIL. **Lei Complementar** no 140, de 8 de dezembro de 2011. Fixa normas, nos termos dos incisos III, VI e VII do **caput** e do parágrafo único do art. 23 da Constituição Federal, para a cooperação entre a União, os Estados, o Distrito Federal e os Municípios nas ações administrativas decorrentes do exercício da competência comum relativas à proteção das paisagens naturais notáveis, à proteção do meio ambiente, ao combate à poluição em qualquer de suas formas e à preservação das florestas,

CÁRITAS - CÁRITAS DIOCESANA DE SOBRAL. No Ceará, a peleja da vida contra o urânio. 2013. Available at: <http://caritas.org.br/wp-content/uploads/2014/01/No-Cear%C3%A1-A-Peleja-da-Vida-Contra-o-Ur%C3%A2nio-FINAL.pdf> Retrieved: Jun 3, 2017.

CARVALHO, Joaquim Francisco. O espaço da energia nuclear no Brasil. **Estudos Avançados.** v. 26, n. 74, 2012, p. 293- 307. Available at: <http://www.journals.usp.br/eav/article/view/10640/12382> Retrieved: Mar 3, 2018.

CONAMA – CONSELHO NACIONAL DO MEIO AMBIENTE - **Resolução no 237**, de 19 de dezembro de 1997. Available at: <http://www.mma.gov.br/port/conama/res/res97/res23797.html> Retrieved: Mar 4, 2018

CONAMA – CONSELHO NACIONAL DO MEIO AMBIENTE- **Resolução no 001**, de 23 de janeiro de 1986. Available at: <http://www.mma.gov.br/port/conama/res/res86/res0186.html> Retrieved: Mar 4, 2018

CNEN – COMISSÃO NACIONAL DE ENERGIA NUCLEAR. **Quem somos.** Available at: <http://www.cnen.gov.br/> Retrieved: May 15, 2017.

CNEN - COMISSÃO NACIONAL DE ENERGIA NUCLEAR. **Armazenamento de rejeitos radioativos.** Available at: <http://www.cnen.gov.br/armazenamento-de-rejeitos-radiotivos> Retrieved: Feb 14, 2017

CONECTAS. **Afetações aos Direitos Humanos devido à Mineração no Brasil.** 2016. Available at: http://www.conectas.org/arquivos/editor/files/informe_audie%cc%82ncia-minerac%cc%a7a%cc%83o%20_revisado.pdf Retrieved: Jun 4, 2017.

CONSORCIO SANTA QUITÉRIA. Available at: <http://www.consorciosantaquiteria.com.br/> Retrieved: Jun 5, 2017.

CONSÓRCIO SANTA QUITÉRIA. **RIMA – Relatório de Impacto Ambiental**. Projeto Santa Quitéria – CE. 2014. Available at: [http:// www.consorciosantaquiteria.com.br/arquivos/RIMA.pdf](http://www.consorciosantaquiteria.com.br/arquivos/RIMA.pdf) Retrieved: Jun 4, 2017.

DUARTE, Francisco. **Entrevista II**. [abril 2017]. Entrevistadores: Luis Haroldo Pereira dos Santos Junior, Midred Cavalcante Barreto e Tiago Alves de Araújo. Santa Quitéria, 2017.

DUARTE, Sergio de Queiroz. **Desarmamento e temas correlatos**. Brasília: FUNAG, 2014.

ESTADÃO. **Urânio contamina água na Bahia**. 2015. Available at: <http://brasil.estadao.com.br/noticias/geral,uranio-contamina-agua-na-bahia,1748686> Retrieved: Jun 3, 2017.

FERREIRA, Arilson Lopes. **Entrevista I**. [abril 2017]. Entrevistadores: Luis Haroldo Pereira dos Santos Junior, Midred Cavalcante Barreto e Tiago Alves de Araújo. Santa Quitéria, 2017.

FRIEDMAN, ftomas L. **O mundo é plano: o mundo globalizado no século XXI**. 3ª ed. São Paulo: Companhia das Letras, 2014.

FGV - FUNDAÇÃO GETÚLIO VARGAS. **Energia Nuclear**. FGV **Energia**, Rio de Janeiro, ano 3, n. 6, abril de 2016.

GONÇALVES, Odair Dias. ALMEIDA, Ivan Pedro Salati de. A energia nuclear e seus usos na sociedade. **Ciência hoje**. Rio de Janeiro, v. 37, n. 220, p. 36-44, outubro de 2005.

GONÇALVES-MAIA, Raquel. Lise Meitner: A intérprete da cisão nuclear. **Revista Virtual de Química**. v. 4. n. 2, p. 173-192. Mar-abril

2012. Available at: <http://rvq-sub.sbq.org.br/index.php/rvq/article/view/271/236> Retrieved: Feb 12, 2018.

GREENPEACE. **Ciclo do perigo: impactos da produção de combustível nuclear no Brasil.** São Paulo: Greenpeace Brasil, 2008.

HINRICHS, Roger A.; KLEINBACH, Merlin; DOS REIS, Lineu Belico. ***Energia e meio ambiente.*** Tradução por Flávio Maron Vichi e Leonardo Freire de Mello. 5ª ed. São Paulo: Cengage Learning, 2014.

HOLANDA, Salvador. **Entrevista III.** [abril 2017]. Entrevistadores: Luis Haroldo Pereira dos Santos Junior, Midred Cavalcante Barreto e Tiago Alves de Araújo. Santa Quitéria, 2017.

IBAMA – INSTITUTO BRASILEIRO DE MEIO AMBIENTE E DOS RECURSOS NATURAIS RENOVÁVEIS. **Consulta a processos de licenciamento ambiental.** Available at: https://servicos.ibama.gov.br/licenciamento/consulta_empresendimentos.php Retrieved: Mar 9, 2018.

IEAE – INTERNATIONAL ATOMIC ENERGY AGENCY. **National In Situ Leach Uranium Mining Best Practice Guide: Groundwaters, Residues and Radiation Protection.** Available at: http://www-pub.iaea.org/MTCD/Meetings/PDFplus/2009/cn175/URAM2009/Session%205/07_7_McKay_Australia.pdf Retrieved: Apr 13, 2017.

INB - INDÚSTRIAS NUCLEARES DO BRASIL. Available at: <http://www.inb.gov.br/pt-br/> Retrieved: Apr 14, 2017. INB – INDÚSTRIAS NUCLEARES DO BRASIL. **Caetité.** Available at: <http://www.inb.gov.br/pt-br/A-INB/Onde-estamos/Caetit%C3%A9> Retrieved: Jun 4, 2017.

KISSINGER, Henry. **Ordem mundial.** Tradução por Cláudio Figueiredo. Rio de Janeiro: Objetiva, 2015.

LIMA, Martonio Mont´Alverne Barreto. Energia nuclear. Aspectos legais e segurança internacional. **Cadernos de Pós-graduação em Direito**. São Paulo: Manole, 2011, p. 3-17.

MAM – Movimento pela Soberania Popular na Mineração. **Mulheres Camponesas e a Luta Antinuclear**. Available at: <<http://mamnacional.org.br/2017/05/15/mulheres-camponesas-e-a-luta-anti-nuclear/>> Retrieved: Jun 5, 2017.

MATOS, Evando Carele de; RUBINI, Luiz Antonio. **Reservas brasileiras de urânio e sua capacidade de atendimento à demanda interna**. Available at: <https://www.ipen.br/biblioteca/cd/inac/1999/PDF/CG17AD.PDF> Retrieved: Feb 11, 2018.

NASCIMENTO, Elisângela; VELASCO, Murillo. **Césio 30 anos: Séri do G! Goiás reconta o maior acidente radiológico do mundo**. GI GO. 14 de set. De 2017. Available at: <https://g1.globo.com/goias/noticia/cesio-30-anos-serie-do-g1-goias-reconta-o-maior-acidente-radiologico-do-mundo.ghtml> Retrieved: Feb 11, 2018.

MEDEIROS, Maria Auxiliadora; DINIZ, Aldiva Sales. A mina de Itataia em Santa Quitéria-CE: o urânio e os riscos da exploração. **Revista da Casa da Geografia**, v. 17, n. 1, p. 80-96, mar. 2015.

NUNES, António José Avelãs. **Neoliberalismo e direitos humanos**. Rio de Janeiro: Renovar, 2003.

OECD – ORGANISATION FOR ECONOMIC CO-OPERATION AND DEVELOPMENT. **Managing Environmental and Health Impacts of Uranium Mining**. Available at: < <http://www.oecd-neo.org/ndd/pubs/2014/7062-mehium.pdf>> Retrieved: Apr 13, 2017.

PRIS – POWER REACTOR INFORMATION SYSTEM. Available at: <<https://www.iaea.org/PRIS/WorldStatistics/NuclearShareofElectricityGeneration.aspx>> Retrieved: Jul 11, 2017.

SEN, Amartya. **Desenvolvimento como liberdade**. Tradução por Laura Teixeira Motta. São Paulo: Companhia das Letras, 2010.

SIQUEIRA, Jean. **Entrevista IV**. [abril 2017]. Entrevistadores: Luis Haroldo Pereira dos Santos Junior, Midred Cavalcante Barreto e Tiago Alves de Araújo. Santa Quitéria, 2017.

TÁVORA, Virgílio. **Em Defesa da Política Nuclear Brasileira**. Discursos de 1973 e 1974. Brasília: Senado Federal, 1973.

TÁVORA, Virgílio. II Simpósio de Estudos de Problemas Brasileiros. **Acordo Nuclear Brasil-Alemanha**. Universidade de Fortaleza (UNIFOR). Associação dos Diplomados da Escola Superior de Guerra (ADESG). Conferência realizada no dia 13 de maio de 1977 no Centro de Convenções de Fortaleza.

TRAMAS – Trabalho, Meio Ambiente e Saúde – UFC. Available at: <http://www.tramas.ufc.br> Retrieved: Jun 5, 2017.

UN – UNITED NATIONS. **Declaration on the Right to Development**, 1986. Available at: <<http://www.un.org/documents/ga/res/41/a41r128.htm>> Retrieved: Jul 16, 2017.

UN – UNITED NATIONS. **Universal Declaration of Human Rights**. Available at: <<http://www.un.org/en/universal-declaration-human-rights/>> Retrieved: Jul 19, 2017.

UN – UNITED NATIONS. **Treaty on the Non-Proliferation of Nuclear Weapons**, 1968. Available at: <<https://www.un.org/disarmament/wmd/nuclear/npt/text>> Retrieved: Apr 12, 2017.

U.S. DEPARTMENT OF ENERGY. Available at: <http://www.world-nuclear.org/information-library/safety-and-security/safety-of-plants/fukushima-accident.aspx> Retrieved: Jul 12, 2017.

VOITCH, Talita. Boros. Crise hídrica eleva risco de recessão **Gazeta do Povo**. 24 jan. 2015. Available at: <http://www.gazetadopovo.com.br/economia/crise-hidrica-eleva-risco-de-recessao-ej6qhr7ltf4w54tpjro651pam> Retrieved: Feb 12, 2018.

WNA – WORLD NUCLEAR ASSOCIATION. **Chernobyl Accident 1986**. Available at: <http://www.world-nuclear.org/information-library/safety-and-security/safety-of-plants/chernobyl-accident.aspx> Retrieved: Jul 10, 2017.

WNA – WORLD NUCLEAR ASSOCIATION. **Environmental Aspects of Uranium Mining**. Available at: <http://www.world-nuclear.org/information-library/nuclear-fuel-cycle/mining-of-uranium/environmental-aspects-of-uranium-mining.aspx> Retrieved: Apr 12, 2017.

WNA – WORLD NUCLEAR ASSOCIATION. **Fukushima Accident**. Available at: <http://www.world-nuclear.org/information-library/safety-and-security/safety-of-plants/fukushima-accident.aspx> Retrieved: Jul 10, 2017.

WNA – WORLD NUCLEAR ASSOCIATION. **Nuclear Power in Brazil**. Available at: <http://www.world-nuclear.org/information-library/country-profiles/countries-a-f/brazil.aspx> Retrieved: Apr 14, 2017.

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