



REFLECTION ON MINING EXTRACTION

Depredation and Appropriation of Natural Resources by Multinational Companies

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ABSTRACT

Mining activity, particularly mega-mining, is an economic activity that has boomed in recent decades. This activity is carried out by multinational companies, who have appropriated natural resources, particularly metals and minerals, which, after carrying out the extraction, ghost towns are left, impoverished regions where agricultural activity is no longer possible. Therefore, the central reflection of this research is: What does mining contribute? The main contribution of mining is the depredation of the planet and the impoverishment of the towns from which the resource is extracted. This is descriptive exploratory research, whose objective is to motivate a reflection on the depredation, appropriation, and dispossession of resources by a small group of companies.

KEYWORDS: natural resources, depredation of the ecosystem, dispossession of resources, mega-mining, economic growth.

1. INTRODUCTION

The economic growth of the last two centuries has been dizzying, production and consumption are the essence of the capitalist system, even at the expense of the ecosystem. The way it is produced today is based on great technologies that facilitate the extraction of natural resources. To the detriment, the natural resource that was extracted in decades, today is reduced to months. Which means that, once the resource is found, the company to which the government has granted its use arrives, takes it out and leaves. These companies generate a reduced number of jobs and some indirect activities, but all of them are short-lived. In such a way that, we can affirm that transnational companies, apart from how small their contribution is to the economic growth of the environment in which they are installed, prey on the ecosystem and appropriate resources.

The work will be divided into three parts, in the first it deals with the theoretical approach on the exploitation of natural resources, extractivism and mining activity, then some data from the main mining companies in the world are shown. Subsequently, the discussion and results about the depredation carried out by transnational companies on natural resources are raised.



2. THEORETICAL FRAMEWORK

Natural resources

Natural resources are part of an ecosystem, just like human beings, in such a way that both are interconnected. However, man has found, throughout history, the way to appropriate and use it, in most cases in a predatory way. The material appropriation of natural resources has developed through certain relationships between men around production, distribution, exchange, and consumption. Under this logic, production is defined as a process of interdependent relations between nature, social work, social organization, and culture, which include the productive forces, which, together with the production relations, constitute a mode of production, defined by the prevailing forms of ownership in a system (Jasso, 2016).

The various modes of production recorded throughout history, are nourished and affect the different modes of material appropriation of resources, carrying out this form of appropriation not only through relations of force on the biotic and abiotic entities of nature, also between two or more people who have the resource as their object, to which they give exchange value not only based on its abundance or scarcity, but also on its use value, which is the abstraction of the symbolic appropriation of nature that is gives for consumption.

However, for the market, what prevails is exchange value. For Jasso (2016), with the appearance of the State in societies, this implied a mediation between the owners of the resources and those who work them, as well as the resolution of the competences for the control systems for the territories and their resources, being which in turn, generally the State reproduces the structure of domination through institutions (Jasso, 2016).

One of the dimensions of the ways in which humanity relates to nature, in addition to domestication, is genetic modification, generating destruction of biodiversity and through the consumption of resources, with which humanity generates ecological footprints. Since potentially every entity of nature serves humanity as a natural resource, all of nature is a potential resource, but for a natural entity to become a resource, it is necessary for man to need it to satisfy a lack without matter what kind (Jasso, 2016). Thus, if the questions of ecology are above all questions of appropriation, these power relations allow some actors more and others less, to access resources and decide on their use (I. Á. Rodríguez, 2019).

The insertion of Latin America into world markets has been through raw materials, dependent on the behavior of international markets, the neoliberal economic model, accentuated this process and the arrival of foreign direct investment (FDI). All this affects the consolidation of an economic model strongly influenced by a free market logic, where the country is inserted in a level of global competition. The implementation of neoliberal economic policies at the end of the 20th century was widespread in Latin America (Trujillo-Ospina et al., 2018).

What sense does it make to base the growth of a nation on the development of an economic activity that allows the detriment of its natural resources, which are propellants of life and sustainment of society itself? It is simple, while foreign or national companies (with foreign financing and coordinated by others) make use of the nation's own natural resources, this same, remains with the "waste" of the ecosystems that at some point were rich in natural resources and after their economic and extractive "use" remain submerged in cyanide pools and contaminated deserts that are impossible for any living being to inhabit (O & V, 2016: 106).

Extractivism

For Espinoza (2018), extractivism is characterized as an economic and political model based on the commodification and unbridled exploitation of the resources that nature offers. For him, it is a notion that characterizes a predatory vision and unsustainable exploitation of resources of continuous dispossession. From a deeper conception, extractivism is the result of the concatenation of four structural, historical and global processes: 1) capitalist accumulation centered on the private and violent appropriation of natural assets; 2) a new international division of labor within the framework of neoliberal globalization; 3) the third scientific-technological revolution that deepens the process of commodification of nature and life on a global scale; and 4) the multidimensional contemporary crisis characterized as civilizational.



According to some authors, extractivism is an activity like the original accumulation of capital, studied by Karl Marx, which ponders the flourishing of wool manufacturing and the consequent rise in prices characterized by abuse and dispossession. Derived from extractivism, access to and domain of territories, as well as control and usufruct of their resources, become essential processes for the current global economic system (Vélez, 2017). Something similar is pointed out by Ramírez & Alonso (2021) regarding accumulation by dispossession or dispossession, noting extractivism as a process of overaccumulation of capital.

In current extractivism, unlike the extractivism of the 20th century, the State has a more leading role, is more active, imposes higher rates of taxes and royalties, but still maintains its vision of exporting and seeking foreign investment; In addition, these countries maintain their role as international price takers, reproducing a subordinate position in the international market. In fact, Latin American countries have ended up reprimarizing their economies, given the reversion of trade-export structures towards the primary sector (Trujillo-Ospina et al., 2018).

Mining exploitation

One of the main problems faced by regions dedicated to mining exploitation is the environmental implications that this generates: to extract one gram of gold, a thousand liters of water are required per second, which means that in one day of exploitation the same amount of this vital liquid demanded by a community of approximately 500,000 inhabitants is used, which implies depleting a population to make the execution of this work in the industry sustainable, and not only talking about human lives that are seen affected by the scarcity of water, but also the habitat of animal and plant species. Mining has been taken as an economic model to follow, without considering a capital scheme oriented towards the exploitation of natural resources in a responsible and sustainable manner; the only current economic pattern is extractive or the one that guarantees a greater amount of wealth and monetary income (O & V, 2016).

3. SOME FACTS: LARGEST MINING COMPANIES IN THE WORLD

The online mining portal (2022), points out that the largest mining companies are:

1.-*BHP Billiton*. It is one of the largest mining companies in the world. Its origin comes from the merger of the Australian company Broken Hill Proprietary and the British company Billiton. It has a global workforce of 40,000 people. It has exploration, development, production, and marketing activities in more than a dozen countries, with a significant position in the deep-water area of the Gulf of Mexico, the United States and Australia.

2.-*Okay*. It is a Brazilian multinational company founded in 1942, it is the second largest mining company in the world (with second place in the production of nickel, copper, aluminum, and alumina), the world's largest producer of iron and second in nickel. It is also the largest logistics operator in Brazil.

3.-*Red River*. It ranks third in our list of the most important mining companies in the world. It is present in more than 40 countries and has more than 60,000 employees, with a strong domain in terms of iron, uranium, copper, coal, and diamond production. Rio Tinto is a mining and metals company, the company's business is to find, extract and process mineral resources. The company's segments include iron ore, aluminum, copper and diamonds, energy and minerals and other operations.

4.-*Anglo American*. It is a global mining company headquartered in London, United Kingdom, noted to produce copper, iron ore, nickel, metallurgical coal and thermal coal, and diamonds; It is the world's largest producer of platinum, with around 40% of world production.

5.-*Freeport-McMoRan Inc*. It is the lowest cost copper producer in the world and one of the world's largest gold producers. It is based in Phoenix and has subsidiaries in Indonesia and North America. It is the world's largest publicly traded copper producer and molybdenum producer.

6.-*Barrick Gold*. It is the second largest gold mining company in the world, headquartered in Toronto, Canada. It has more than 23 operating mines in the United States, Canada, Australia, Argentina, Chile, Papua New Guinea, the Dominican Republic, and Zambia, and operates open pit mines.

7.—*Teck*. This is the largest mining company in Canada, with operations that include the exploration, development, processing, smelting, and refining of different minerals.

8.-*Goldcorp*. Based in Vancouver and founded in 1994, it is a Canadian gold producer engaged in the acquisition, exploration, development, and operation of gold properties in Canada, the US, Mexico, Central and South America. It employs more than 15,000 people worldwide. Its main products are gold, silver, copper, lead, and zinc. The company's assets include four mines in Canada, four in Mexico and four in Central and South America.



9.-*Newmont Mining Corp.* Created in 2019 by Newmont Mining Corporation and Goldcorp. It is one of the largest gold miners in the world, with active mines in Australia, the US, Indonesia, Ghana, New Zealand, and Peru.

10.-*Alcoa.* It is headquartered in Pittsburgh, dedicated to the global production and management of primary aluminum. It is the third largest producer of aluminum in the world, and is also present in the aerospace, construction, and automotive industries. Alcoa is a multinational that operates in 44 countries and has a mining interest in bauxite projects in Australia, Brazil, Guinea, Jamaica, and Suriname.

4. DISCUSSION AND RESULTS

The economic growth of several nations during the second half of the 20th century and the first decades of this century have aroused interest in the appropriation of raw materials produced in Africa and Latin America, generating an increase in foreign investment directed to finance projects for the use mining in these regions, derived, in part, from the laxity of their legal framework of property rights over natural resources. In addition, the economic weakness of several countries that require capital to be able to pay for their development agendas creates conditions for disadvantageous deals in which private companies extract resources in exchange for minimal costs. This situation contravenes the global interest of protecting natural resources and promoting social development (Trujillo, 2016).

Modern experience has shown that in Latin American nations, extractive projects have culminated in the creation of greater external dependency and have also generated economies based on minerals or oil. The incidence of mining capital, as has been said, transcends the limits of mining work and affects the social and economic production of the traditional communities in whose geographical space it is inserted. Thus, both the local economy and the structure and social processes adjust to the presence of capital, according to its character and according to its dynamics (Alonso & Sierra, 2017). Gold has been the attraction factor for complex social problems that are generally linked in all mining territories where there has been no planning, nor a decision that sees the mining industry with all the problems it can bring: it is an industry primarily for men, extractive, work with broad occupational risk implications. These conditions generate a series of environmental, social, violence, territorial degradation problems due to the absence of family life, etc. (Cossío, 1999). In addition, an acceleration of the emptying of resources and alteration of the socio-cultural, economic-productive balance, weakening the social cohesion of the communities and the sustainability of the towns. The mercantile approach to natural resources does not allow other development models to survive.

Latin America is inserted in the export sector, as a supplier of raw material to international markets, which makes it an economy highly dependent on international prices, in addition to evidencing the limited linkage of economic sectors and branches. In other words, there is no productive linkage and, therefore, a narrow multiplier effect. In the country's export model, the exploitation of raw materials is not closely articulated to the national value chain but to world markets. Therefore, the extractive-exporter model transforms the territories based on the endowment of raw materials demanded internationally (Vélez, 2017).

On the other hand, the economic benefit that transnational companies leave in the region is negligible; The royalties that mining companies paid, for 2014, in Argentina, Brazil and Nicaragua do not exceed 3% of the gross value of the mineral, while in Panama they are around 2%. In Mexico, mining companies paid only 1% royalties in 2014 but in 2006 they paid 0.4%. In addition, shortcuts have been created so that tax charges do not affect mining investments. For example, in Colombia it is possible for mining companies to consider royalties as if they were a cost of production and not a fiscal obligation, which explains the downward amounts that have been reported in the country. For their part, in Chile, Ecuador and Peru, tax stability contracts have been signed to maintain the taxes applicable at the time the mining concession is awarded (Carrizo et al., 2016).

Relations between mining companies and the locals are characterized by the domination and coercion of the former over the latter. Accordingly, the asymmetric processes of distribution of power lead to scenarios of disadvantageous reciprocity: mining companies seek to obtain metals without giving anything in return, for which reason the corporation mobilizes discourses and practices that hide an action of domination and predatory subtraction. Of wealth. In this logic, the conflict over the patrimonialization of the territory has revealed which communities are considered legitimate and how this impacts the negotiation processes before the political system (I. Á. Rodríguez, 2019).



On the other hand, they are in the mining enclaves that arise with mega-mining, based on intensive and highly technical exploitation, imposing new forms of productive organization, where traditions and culture are re-elected, forcing them to change their activities such as agriculture, livestock, forestry, fishing, tourism, housing and culture, displacing communities. Furthermore, generating few jobs and where telecommunications, electricity and water transport networks are designed and built especially for mining companies. For (I. Á. Rodríguez, 2019) the territoriality of mining enclaves is limited, but transnational companies need to become territorial in order to achieve a sufficient level of acceptability that allows them to function and minimize local conflicts.

For Carrizo (2016), the accumulation of mining capital does not result exclusively from the free play of market forces, but from the imposition of certain deprecatory practices such as the massive delivery of mining concession titles. From this perspective, accumulation by dispossession in mining activity is a set of trends that economic groups promote to appropriate both natural assets and social property (water, forests, soils, energy sources, minerals, etc.) , as well as public goods (mining reserves and state-owned companies), which allows them to obtain high rents from extraordinary profits generated when these goods are incorporated and valued as merchandise in the international product markets or financial system (Carrizo et al., 2016).

Espinoza (2018) points out that an indicator that shows the growth of mining extractivism are the rights that governments have granted for mining exploration and exploitation; that is, mining licenses or concessions. Obviously, the number of these grew rapidly in the 21st century. For example, in Guatemala it went from 27 mining licenses in the year 2000 to 116 in 2012, with an increase of 430%. Similarly, in Argentina mining projects increased 740% between 2003 and 2007. The Latin American country that has granted the most territory is Chile with 41%, followed by Peru with 14.6% and Mexico with 11.3%. With percentages less than 10% but where the concessions exceed one million hectares, this one; more than 18 million in Argentina, more than 5 million in Colombia, more than 2 million in Bolivia and more than a million in Nicaragua. The author highlights that, like Rodríguez (2019), mega-mining cannot exist without the control of large territorial extensions, which is why mining companies require that their concessions include the right of usufruct of natural resources. For example, in Chile, concessions are granted where the resources become the property of whoever obtains the mining concession (Espinoza, 2018).

Another aspect that should be highlighted is the duration of the licenses, warns Espinoza, these are usually valid for between 25 and 30 years, although in Mexico they are granted for an initial period of 50 years and in Chile and Peru for indefinite terms. On the legislative side, 15 Latin American countries reformed and enacted new mining laws since the 1990s: Argentina (1993 and 1995), Brazil (1996 and 2015), Bolivia (1997 and 2014), Colombia (2014), Costa Rica (1998), Cuba (1995), Ecuador (1991 and 2008), El Salvador (2012), and 2013), Mexico (2006), Panama (2011), Peru (1991), Uruguay (1991 and 2011) and Venezuela (1999 and 2010) (Espinoza, 2018). The legal reforms have been to offer extractive companies certainty in their investment and legitimize mega-mining, the type of conditions granted to these companies range from simplification of administrative procedures, tax exemption, ease of entry of foreign capital, to constitutional changes, all with the aim of allowing transnationals to enter and empty the territories (Espinoza, 2018).

CONCLUSIONS

For large companies to empty the resources of the spaces, the participation of the entity that owns them has been necessary, and this is the State, which, in complicity with them, has made a series of institutional and administrative amendments that facilitate access to these resources. Minerals, gases, and hydrocarbons are goods of public interest, the regulation by the State for their exploitation should coincide with the social interest and aim at a higher level of preservation of nature and improvement of the quality of life for the population (Alonso & Sierra, 2017). Therefore, in this new world order of intensive and large-scale exploitation of natural resources, there is an urgent need for international, national, and local regulations and regulations that limit this activity, to guarantee the sustainability and sustainability of planet earth and that, At the same time, it guarantees economic benefits and development in the regions where it is based.



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