

LEGAL ISSUES RELATED TO GARIMPOS IN BRAZIL

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1. INTRODUCTION

Due to its geological fate the rainforest areas of the world are a rich compartment for secondary to primary gold ore deposits. Thus, colluvial, alluvial and near-surface ore bodies are all scattered in these regions, promoting a nice business environment for the “*garimpeiros*”.

For this reason, mercury is widely utilized in gold extraction, since it readily amalgamates, and the resulting amalgam is easily broken by fire. With amalgamation and firing operations, mercury is released to the environment because when mercury is introduced to amalgamate gold particles, it is seldom handled in a close-circuit; the same being true when it is released from the amalgam through burning, which is generally carried out at open air.

The problems regarding elemental and other forms of mercury in the environment and local population are all well discussed and documented in the literature. For the Brazilian case, see for instance, LACERDA and SALOMONS (1992), BARRETO (1993), SILVA (1995), AKAGI et al. (1996), and VILLAS BÔAS (1997).

2. LEGAL ASPECTS

The Brazilian Mining Law, approved in 1967, defines the profile of the “*garimpeiro*” as a professional who works the outcropping deposits (typically alluvium, eluvium and colluvial deposits) manually (with the help of tools). Ideally, he should be a professional individual, without economic and technical resources, who would make “*garimpo*” mining his means of subsistence. Because of this technical and economic limitation, the damage to the mineral reserves, even in the case of ambitious mining practice (predatory mining), would be negligible.

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The most recent Brazilian Constitution (1988), favors the “garimpeiro” - even in detriment to the constituted mining activity - according to many - and gives the Federal Government the power to establish areas and conditions for the “garimpo” activity (Art. 21, XXV and Art. 174, paragraphs 3 and 4). The aim is to encourage the “garimpeiros” to associate in cooperatives, and doing so, gives them priority for prospecting and mining the deposits that could be exploited by the “garimpo”- in areas where they are already working at, and in other areas that may be legally determined.

Until 1988, there was no reference made whatsoever in any legal document, to the “garimpo”, as a mining activity with rights and responsibilities, rather than a mining activity always subordinate to the prospecting and mining systems. The Constitution raised the “garimpo” activity to mining system “status”, recognizing it as an economically profitable and socially desirable activity.

The “Regime de Permissão de Lavra Garimpeira” (“Garimpo” Mining Permit System) was instituted as a result of these constitutional provisions, and can basically be defined as the system to be applied to the alluvium, eluvium, colluvial or other deposits, as defined by the DNPM (“Bureau of Mines”), that may be mined without the need for previous prospecting work. This law can only be applied inside well-defined areas.

The “Garimpo” Mining Permit introduced a new mining system, with rights and responsibilities, defining the difference between the Concession and the Permit systems as: the type of deposits that may be worked by the “garimpo”, the individual work, and the absence of mineral prospecting studies. The cooperative was chosen as the type of organization because in the constitutional legislator’s evaluation, this would hasten the social and economic development of the “garimpeiros” and make environmental preservation feasible.

These distinctions between the systems are, in fact, strictly partial, which means, for example, alluvium, eluvium and colluvial mineral deposits can be the subject of concessions under the mining concession system. On the other hand, the “Garimpo” mining permit, although a simplified mining system, may require mineral prospecting studies. The difficulty of distinguishing between the two systems has

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led inevitably to persistent conflicts between the two main economic agents: mining companies and “garimpeiros”.

Law No. 7805/89, which instituted the “Garimpo” Mining Permit, mainly aims to discipline “garimpo” activity. However, the concept of a simplified system was affected by the difficulty of establishing a homogeneous picture of the role of the “garimpo” activity in the mineral and even in the national scenario. The result of this situation was the regulation of dissimilar and even contradictory conceptions of the “garimpo” activity, which in practice brought about an overload of technical and bureaucratic requirements, in an attempt to regulate the Permit System, according to corporate reasoning, and ignoring that of the “garimpo”.

All these incongruities and evident contradictions denote the difficulty of legally differentiating between the various mining systems. This deadlock has been adversely affecting the mining sector because of the increasing importance of the “garimpo” activity in recent years.

The priority given to the cooperative over other systems led the legislator to exclude the small and medium-size mining companies, meaning that a large part of the “garimpo” activity has evaded legal control. Such a rationale is much more business-oriented than cooperative or individual, since “garimpo owners” are commonly known as “garimpo entrepreneurs”. It seems necessary that the small and even medium-sized companies be recognized in the Brazilian mining scenario, not only because of the “garimpo”, but principally for their own sake.

Reference to the small and medium-sized mining companies, means different rights and responsibilities from those of the so-called mining companies. This means a company with simplified legalization processes, taxed according to its size, although without losing its identity as a mining enterprise.

Equating the cooperative to the mining company is much more an enigma than a solution because, for logical and legal reasons, a cooperative is, and will always be, a cooperative and a company will always be a company. There are several types of companies, but they can never be mistaken for a cooperative.

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Two points stand out in the current regulations: the privilege of not having to carry out previous prospecting studies and doubts about the size of the area for the “garimpo”.

Regarding the first point, both in the 1968 legislation and the current Law, one of the basic differences between the “garimpo” activity and mining companies was, and still is, precisely the non-existence or demand for mineral prospecting studies. This is not incidental, nor does this mean that the “garimpo” activity is being favored. The legislator’s reasoning was to recognize the special nature of the “garimpo” activity due, essentially, to the type of deposit that can be mined. These are defined by law and are the alluvium, eluvium and colluvial deposits.

Regarding the second point, the size of the “garimpo” area, prevailing legislation determines that the “garimpeiros” are not allowed an area larger than 50 ha, and in spite of this restriction, this area is considered large, apparently without any plausible justification.

In short, this is a good reason, without knowing whether an area is larger than 50, 100 or 200 ha, for having large areas. “Garimpo” is an activity where prospecting studies are not required for the reasons mentioned above; therefore it does not have previously delimited mines or deposits: the limits and ore contents are uncertain and are defined as the work progresses.

It would make no sense, for example, if a cooperative requested a mining permit, which is presently a very complex process, and after one month’s work has to abandon the area because the deposit is not in the requested area, or because it is not economically feasible.

Obviously, in large areas this may also occur but on a smaller scale, and as part of the risk involved in the mining activity in general. It seems that an exaggerated limitation (e.g. 50 to 100 ha) in the case of the “garimpo” and specially in the Amazon region, will make it an extremely high risk activity, making it impractical or leading to illegal practice, as currently occurs.

In the case of “garimpo”, some concepts and beliefs must be clarified. One of them refers to “garimpo” phenomenon itself. What is the reason for the existence of “garimpo” in Brazil? Generally, there is only one answer, whether from the progressive or conservative

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sectors: the reasons are exclusively social. The serious economic crisis in Brazil has brought to the “garimpo” a large number of unemployed people with no schooling or professional qualifications, who dedicate themselves to this activity as a last choice. Hence, if the social problem is solved, the “garimpo” problem would be solved.

Looking at the problem from another angle, there are geological reasons which motivated the appearance and increase of “garimpo” activity in Brazil. As long as these reasons persist, there will be “garimpo” activity in Brazil, regardless of the social reasons. These social reasons may aggravate the situation, but in themselves will never be determinant. This has to be proved not only empirically, but also technically and this means that if this is true, the solution is not outside the mineral sector and that the solution to the existing conflict between miners and “garimpeiros” must come from the mineral sector itself.

The attitude taken by current legislation shares the same idea: the creation of a new mining system is a clear example, although, as explained above, this is still contradictory and incipient.

An aspect of the utmost importance in the solution to the “garimpo” problem is to know if: Is it possible to reconcile “garimpo” activity with environmental preservation? The answer to this question is crucial, since there is a progressive and inexorable movement in the direction of eliminating activities which are potentially and inevitably polluting. Certain activities can be considered as causes of greater environmental impacts than others and would be the “naturally polluting”. To eliminate such impacts requires the development of technology and investment in the production processes so that these activities would become economically impractical.

In activities that are essential to mankind, the economic cost/environmental improvement ratio may be counter-balanced by subsidies, exemptions and other forms of economic and non-economic incentives. However, the tendency in the activities defined here as naturally polluting is their transformation, when possible, from a technological and economic point of view, or their elimination.

In this aspect, is “garimpo” a naturally polluting activity? The answer to this question is complex, because it involves a complete analysis of the work methods and relations, the technology used, the

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environmental impacts, among other relevant aspects of the “garimpo” activity in itself, meaning that the answer at this moment must come from reflections based on discussions of the matter, rather than from results of studies on it.

Politically speaking, the matter is addressed in another way, considering that the “garimpo” activity intrinsic nature could be described as disorganized, and consequently detrimental to the mineral sector (the ore would not be suitably mined), to the environment and to society. Nevertheless, in innumerable “garimpo” sites throughout the Brazilian territory, including the States of Amazonas, Roraima, Pará, Goiás, Amapá, Acre, Tocantins and Mato Grosso, to mention only the most important, there are people working according to determined methods; the objectives and the social and professional status of each worker being clearly defined and structured. At a “garimpo”, it is immediately apparent who is in command, and it is easy to discover which task each “garimpeiro” is responsible for. This is also the case for the methods and instruments which are used for extracting the ore, or even how and by whom a certain deposit was found, what classes of “garimpeiros” exist (much more will be revealed to those who are interested and ask properly).

It is often assumed that mining companies are characteristically organized, while the “garimpo” activity is characteristically disorganized. There are disorganized companies as well as organized “garimpos” and, of course, the opposite is also true.

If there is a disorganized characteristic in the “garimpos” this is due to the fact that the cooperative’s legal nature, does not fit in with the “garimpo’s” reality, nor that of the “garimpo” workers, because they are neither partners, nor individual workers, but someone else’s employees. Any effort at regulating the “garimpo” must keep in mind the question of adapting the law to the “garimpo” reality. When the distortion of the work is mentioned, this refers to a “garimpo” system that has not existed since the sixties, although this is the concept of the “Código de Mineração” (Mining Code) and also, in part, of the recent law. This concept is perhaps mostly responsible for the current conflicts between “garimpeiros” and miners, which have led mining to become impractical in several regions of the country.

Disorganization is therefore not an intrinsic characteristic of the “garimpo”. What are then the characteristics of the “garimpo”?

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What is referred to when talking about the “garimpo”? What are the differences between a mining company's activity and the “garimpo” activity? The answers to all these questions are found in the law; but are they satisfactory? These questions and answers could help understand the complex reality of the “garimpo” and the regulation of this activity.

If disorganization is not a “garimpo” attribute, and a conciliation of the “garimpo” activity with environmental preservation is possible, it remains to briefly present the environmental regulations that apply to “garimpo” activities. In the first place, it should be noted that there are no substantial differences between the regulations applied to the Permit System and those applied to the other Mining Laws.

The previous Constitution (1967) on which the Mining Code was based, did not foresee environmental rules that would cover the activity of the different economic agents; hence, the Mining Code deals with this matter in a sporadic way, and only regarding one point or other. The eighties are particularly important for Brazilian environmental legislation. A set of rules and new concepts, like that of environmental preservation, were introduced in the 1988 Constitution, as well as in subsequent common law. The 1988 Constitution puts a great emphasis on the environment and requires that States and Municipalities legislate and supervise environmental matters, and that class action may void any act harmful to the environment. The Amazon Forest, the Mata Atlântica, the Serra do Mar, the Mato Grosso wetlands (Pantanal) and the Coastal Zone were declared Protected National Properties.

This legislation applies to all economic activities, including mining, although some constitutional principles had been established for the mining activity (these were demands that were previously established by law). Among them are: all activities that may cause any environmental degradation must, before being established, be preceded by an environmental impact study; responsibility for recovering the degraded environment is required from the miners; and physical or corporate agents responsible for conduct and activities considered to be harmful to the environment are subject to penal and administrative sanctions, regardless of the obligation to repair the damage caused.

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On one side, the 1988 Constitution defines the exclusive competence of the Federal Government to legislate on mineral deposits, mines and other natural resources, on the other, it establishes the competence of the Federal Government, of the States and of the Federal District (DC) to legislate on the preservation of nature, protection of the soil and mineral resources and protection of the environment and pollution control. Accordingly, federal control of prospecting and mining of mineral resources, must observe the federal environmental legislation and the “Normas Suplementares Estaduais Especificas” (Specific State Supplementary Rules).

The “garimpeiro”, as is the case of the miner, must request Environmental Licensing from the “Órgão Estadual Ambiental” (State Environmental Department) or from the “Instituto Brasileiro do Meio Ambiente e dos Recursos Naturais Renováveis” - IBAMA - (Brazilian Environment Institute) (Hermann, H.; Fornasari Filho, N.; Loschl Filho, C., Universidade Estadual de Campinas, unpublished data).

Environmental licensing depends on an Environmental Impact Study - EIA. The Environmental Impact Report (RIMA) must reflect the conclusions of the Environmental Impact Study. The Environment Department holds a public hearing for presenting details about the project and its environmental impact as well as to discuss the RIMA.

3. CONCLUSIONS

This paper leads to the following conclusions:

1. Legal issues are still pending of solution for the “garimpo” to be developed as a sustainable activity.
2. This is not an easy task , since the legal instruments which regulate the activity are to be reviewed , proposed and finally approved by the Brazilian Congress House , after some lengthy consultations and negotiations .
3. Also, discussions and definitions , in legal terms, of sustainability are to be encouraged !

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6. REFERENCES

- LACERDA, L.D. and SALOMONS, W. (1992) Mercúrio na Amazônia: Uma Bomba Relógio Química? STA/CETEM/CNPq, Rio de Janeiro.
- BARRETO, M.L (1993) Uma Abordagem Crítica da Legislação Garimpeira - SED/CETEM/CNPq, Rio de Janeiro.
- SILVA, A.P.; ALBUQUERQUE, G.S. and BARRETO, M.L. (1995) The "Garimpo" Problem in the Amazon Region, Chap. 21, p. 281 in Chemistry of the Amazon, ACS Symposium Series 588, edited by SEIDL, P.R; GOTTLIEB, O.R. and KAPLAN, M.A., Washington, DC.
- AKAGI, H.; MALM, O. and BRANCHES, F.J.P (1996) Human Exposure to Mercury Due to Gold Mining the Amazon, Brazil - A Review, Environmental Sciences, 4, 3, p. 199-211, Tokyo.
- VILLAS BÔAS, R.C. (1997) The Mercury Problem in the Amazon Due to Gold Extraction, Journal of Geochemical Exploration, 58, p. 217-222, Elsevier, Netherlands.
- VEIGA, M.M. et al. (1991) Poconé: Um Campo de Estudo do Impacto Ambiental do Garimpo. STA/CETEM/CNPq, n. 1, 113 pp., Rio de Janeiro.

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