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Rachel Carson Center for Environment and Society
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José Augusto Pádua

Pitfalls and Opportunities in the Use of the Biodiversity Concept as a Political Tool for Forest Conservation in Brazil

In the last two decades, Brazilian society has experienced a deep transformation in its long-established relation with the tropical forests. After centuries of dominant land occupation patterns based on heavy deforestation (Dean 1995; Pádua 2010), we can observe an environmental turn in the 1990s that became an almost frenetic swing towards forest conservation in the last decade, when Brazil was responsible for around 74 percent of the protected areas created worldwide after 2003 (Jenkins and Joppa 2009). As a consequence of this move—together with other strong federal policies—deforestation in the Amazon was reduced by more than 75 percent between 2004 and 2012. Deforestation is declining even in the current context of strong economic growth. The explanation for this historical change is quite complex and has multiple aspects. But the exogenous diffusion of the biodiversity concept in Brazil since the 1980s can be considered a central aspect of it.

Of course, the reception of the concept was far from homogeneous (as was the concept itself), moving from the expectation of future economic benefits based on biotechnology to the “deep ecological” appreciation of the intrinsic value of the Amazon forest’s diversity of life forms.

In any case, the uses of the concept by different social agents—including governments, scientific associations, and non-governmental organizations—helped to give a new meaning to the politics of forest conservation, with strong appeal reflected in national public opinion (Hecht and Cockburn 2010). The enduring tropical forests in the Brazilian territory, many times deprecated in the past as useless green areas that must be converted to economic production, received a new social value based on frontline concepts of science and “sustainable development.” The average perception is that the economic and use values of biodiversity, especially its potential for the future, justifies the reduction of deforestation as a political goal.

We must remember, however, that the relation between the concept and this particular country is not an ordinary one. With a huge land mass, almost entirely located

in the tropical zone, Brazil is frequently mentioned as the biggest concentration of biodiversity in a national territory. It is, furthermore, a territory with a new geopolitical significance, being abundant in the kind of natural resources that are increasingly valued in the context of the global environmental crisis: fresh water, solar rays, capacity for biomass reproduction, and so on (Pádua 1997). These elements, together with biodiversity, are seen by Brazilian political elites, including the military, as a crucial set of assets for the future. The same perception is quite strong in the public opinion surveys.

It makes sense to suppose that the high international ecological ranking of the Brazilian territory is relevant for understanding the significant internal cultural acceptance of the concept of biodiversity. But we must also understand that the concept is potentially well-grounded in standard Brazilian political culture, being functional to a national identity based on the amalgamation of diverse cultural and social flows, an identity that became almost canonical in Brazilian social thinking in the twentieth century (Burke and Pallares-Burke 2008). It is interesting to note in this regard that many Brazilian intellectuals and social movements have been using the concepts of “socio-biodiversity” or “socio-environmentalism” to emphasize the link between natural diversity and the diversity of local cultures inside the territory (Pádua 2012), including Amerindian and Afro-descendent communities (quilombos). Since the 1980s, explicit efforts have been made to reduce the gap between nature and culture in discussions about ecology, conservation, and development in different regions of the country (Padua 1992; Hochstetler and Keck 2007). Darrel Posey (1983), since the period he was living in the Amazon, made efforts to link ethnobiology and development. Other important discussions were led by researchers like Antonio Carlos Diégues (2000) around the idea of “ethnoconservation”.

However, we must also consider the many political and conceptual problems associated with social appropriations of the biodiversity idea in Brazil. In fact, its use as a political tool for forest conservation has created some important pitfalls for an integrated conservation policy for the territory as a whole. A crucial problem is the stratification of ecosystems according to the level of biodiversity, condemning some natural areas to be destroyed as sacrificial zones for the salvation of others. The reduction in Amazon deforestation in the last decade is directly linked to the massive conversion of the Cerrado—the 200 million hectares of wooded savannah in central-western Brazil—for

agricultural production. Indeed, this new economic frontier is quickly becoming one of the world's main agribusiness regions. In Brazilian political debates, it is very common to hear the opinion that the country does not need to destroy the Amazon forest—that it must be saved for subjective and objective, international and internal reasons—since it has such a big area of useless and “ugly” savannahs to be used in the near future. (The cultural construction of tropical forests as beautiful and savannahs as ugly would require a specific historical analysis.) Moreover, the defenders of the Cerrado are reasoning along the same lines, arguing that this ecosystem has a lot of biodiversity too, even if it is not comparable to the tropical forests, and is also important as an accumulator of fresh water. The important problem arises when biodiversity becomes a fetish and when native forms of vegetation with “weak biodiversity” are dismissed as suitable for destruction. From the perspective of biocultural diversity, of course, this kind of ranking of different ecological regions makes no sense at all. Every region is important as such, with a plentiful and complex variety of interactions between natural and social dynamics.

Another problem concerns the significance of biodiversity for local societies and communities in the Brazilian forest regions. I remember taking part in a debate at the University of Oxford in 2007, during which a participant proclaimed, as though it were a self-evident truth, that biodiversity is a concept that everyone in the planet would agree with and appreciate. In the field, though, we can see a quite different reality. The concept has its own specific history and came to Brazilian social life from the outside. Of course, it has been appropriated and re-appropriated by different local actors, including poor communities. In such a dynamic process, many different meanings were attached to it. But, in the practical world of social discussions and conflicts, it is common to observe both poor campesinos and big farmers saying something like this: “It is nice to have a lot of biodiversity. But so what?” The concept of “ecological services,” for example, that is being increasingly used, is very appealing over the short-term, since it is practical and concrete to argue that societies need the clean water and fertile soil that the maintenance of native ecosystems helps to secure. The concept is also an interesting counterpoint to the biodiversity one, since it is possible to make the point that biomes with weak biodiversity, like the Cerrado, are very important in the production of “ecological services.”

I am certainly not saying that poor communities cannot understand the long-term meaning of biodiversity. Social agents can understand and reinvent the concept and perceive the political or spiritual importance of it according to their social and cultural experiences. Subjective feelings about the value and beauty of the diversity of life-forms as such can always be present. But we must not imagine that the scientific and/or aesthetic meaning of the concept satisfies everyone. In fact, there is a political paradox here. The social and cultural acceptance of biodiversity, for many people, is based on its potential economic importance, even though the cultural expansion and reproduction of the idea per se is helping to give an habitual value to the concept. On the other hand, the present day economic utility of natural diversity is often unclear, especially for local actors in the forest regions. A lumber company owner in the southern Amazon once told me something that helps to summarize this complex problem: “When people said that we must preserve ‘forest bush’ [*mato*, a depreciative way of talking about forests], I could not understand. We have too much *mato* here. But when people started to say that in this ‘forest bush’ there is a lot of biodiversity, I started to pay attention. Maybe there is something important here, I thought. But it is now 10 years since I heard about biodiversity, and I haven’t made a fucking dollar from it!”

Certainly, this crude, narrow, and short-term vision does not dominate Brazilian political debate on biodiversity. Moreover, in many instances the local actors are economically exploring the regional biodiversity without being aware of it. However, such comments highlight a problem that deserves to be discussed and that, in a certain sense, is already at the core of the debate. The main point concerns the conceptual limitation of defending biodiversity with market-based arguments. The essential ecological and social importance of biodiversity cannot be measured by economic calculations. Yet this fact is not readily accepted by societies in which the economic mindset still dominates contemporary political debate and guides the actions of governments and private agents.

In any case, it must not be forgotten that biodiversity is not an ahistorical and universal concept. Its historicity and theoretical genealogy is very complex, going back, for example, to the so-called “dispute over the New World’s nature” in the colonial period (Gerbi 2010). We must analyze the history of the concept with an open and critical perspective, in order to produce a better understanding of the dilemmas and political outcomes present in its various uses and reinventions, and also to perceive its conceptual limitations in relation to the broader perspective of the “biocultural diversity” idea.

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