



# Company–community non-timber forest product deals in the Brazilian Amazon: A review of opportunities and problems

Carla Morsello \*

*Escola de Artes, Ciências e Humanidades da Universidade de São Paulo Leste/PROCAM-Programa de Pós-graduação em Ciência Ambiental da USP, Rua do Anfiteatro, 181-Favo 14, CEP 05508-900, Cidade Universitária, São Paulo, Brazil*

## Abstract

Company–community partnerships represent a new forestry mechanism prompted by increased devolution of forest control and growing demand for socio-environmentally responsible products. In the Brazilian Amazon, general economic and cultural trends, combined with the appeal of the rainforests and its peoples, have led to the growing implementation of partnerships for non-timber forest products (NTFP) trade. However, despite the fanfare some companies have given these partnerships, evidence suggests that their impacts on communities, companies and forests are mixed. Communities and forests are more likely to experience problems, especially in a context of weakening government power. The complexities involved in company–community deals call for a changed research focus, advancing new theories that consider community forestry as part of broader economic systems.

© 2005 Elsevier B.V. All rights reserved.

*Keywords:* Community forestry; Company–community partnerships; NTFP; Amazonia; Rainforest harvest; Corporate social responsibility

## 1. Introduction

In the last two decades, forestry has changed in many ways. Devolution of forest rights to rural communities is expanding due to a society's reaction to globalisation (White and Martin, 2002) and, in parallel, due to the current paradigm shift in forest management, from state-controlled to community-based approaches (Shackleton et al., 2002). These changes in forest tenure have been accompanied by worldwide economic, social and cultural transformations. Com-

bined, these forces are inducing companies to adopt new strategies in order to respond to a complex set of stakeholders and to the expanded demand in socio-environmentally sensitive products.

Amid novel strategies in forestry, agreements between companies and forest communities—often labelled partnerships—stand out because they are purported to change the configuration of power relations among stakeholders. Partnerships vary widely, but all imply shared responsibilities and risks in order to deliver benefits to all trade partners (Warner, 2003). They are becoming important particularly in timber production (Mayers, 2000; Mayers and Vermeulen, 2002), but also in non-timber forest products

\* Tel.: +55 11 3091 3235; fax: +55 11 3091 3330.

E-mail address: [morsello@usp.br](mailto:morsello@usp.br).

(NTFP) trade in particular settings (Anderson and Clay, 2002). Companies and some academics claim that these partnerships are an avenue to increase the de facto control of forest resources by rural communities, delivering increasing benefits to them, as well as to firms and forests (e.g., Andrade, 2003; Clay, 1992; Corry, 1993; Waddington, 2002). Others, however, have been more sceptical, pointing out several problems and traps associated with partnerships. Problems include for example companies' excessive control, interference with complex social systems and overexploitation of forest resources (e.g., Corry, 1993; Entine, 1994; Mayers and Vermeulen, 2002).

Little, however, is known about partnerships in the Brazilian Amazon, a recently growing phenomenon in the NTFP sector. This paper focuses on this sector and region, arguing that present evidence supports mixed conclusions as regards the outcomes of partnerships. Communities, companies and forests may both win or lose, and communities and forests may still require the regulatory role of the state to guarantee better outcomes.

To advance the evaluation, the paper builds on a political economy framework in which the web of government policies, market trends and the relative power of stakeholders are decisive in determining the outcomes of company–community partnerships. The model mainly maintains that devolution in conditions of weakening power of the state may transfer de facto rights to the exploitation of forest resources to firms rather than communities.

The paper proceeds by reviewing the current evidence provided in a number of published studies, in addition to a few preliminary unpublished data from an ongoing project of the author's (for details, see <http://www.parceriasflorestais.org>). It begins by briefly reviewing the state-of-the art regarding company–community deals around the world, followed by an overview of the situation in the Brazilian Amazon. Successively focusing on communities, companies and forests, the paper then presents evidence from a number of cases that illustrate either the opportunities or problems created by the establishment of partnerships. In the final section, the main findings are synthesised and discussed, arguing that the state should be brought back into the equation.

## 2. Company–community partnerships in perspective

The study of partnerships in forestry began in the early 1990s with the 'Rainforest Harvest' debate, which focused on the agreements between rainforest communities and companies (Counsell and Rice, 1992). Early studies mostly analysed context-specific questions and lacked a solid empirical basis (Clay, 1992; Corry, 1993). More recently, however, a growing body of action-oriented research has begun to emerge. Focusing predominantly on logging partnerships, these studies advanced the elucidation of partnership outcomes, in addition to the conditions under which they occur (e.g., Mayers and Vermeulen, 2002; Scherr et al., 2003). Generally, these studies have been more sceptical, concluding that partnerships may deliver some benefits to communities and forests, but may also involve several dangers. A brief review of these findings is hereafter summarised.

Partnerships can benefit communities by increasing market access or market share, may allow the payment of premium prices and can also increase the access to social programs implemented by, or with help of, corporate partners (Clay, 1992; Mayers, 2000; Waddington, 2002). Nonetheless, company–community deals are commonly unable to lift communities out of poverty. Vermeulen et al. (2003), for instance, in a study of 57 agreements in 23 countries, found that partnerships remain supplementary rather than central to income generation.

Capacity building, administrative support and quality control are valuable and potentially more sustainable outcomes of partnerships (Anderson and Clay, 2002; Vermeulen et al., 2003). Companies have often provided capital in order to overcome the costs of trade engagement; have paid for certification costs and have provided infrastructure and access to technology (Mayers and Vermeulen, 2002; Scherr et al., 2003).

As regards credit, however, the outcomes are controversial. Weinberg (1998), for instance, observed a case whereby an urban community dealing with Ben & Jerry's company became indebted: the community took out bank credit to set up trade with the company, but the company pulled out of the deal before the community could repay the debt.

Through risk-sharing with companies, guaranteed purchasing and guaranteed prices, partnerships may reduce the risks faced by communities due to the high volatility of markets in forest products (Clay, 1997). Even so, risk sharing is seldom equal. Companies are able to minimise risk through insurance and the maintenance of a broad range of partner suppliers, while communities have few possibilities available (Vermeulen et al., 2003). Partnerships may even increase risks to communities when commercialisation causes excessive dependency on a product or activity (Clay, 1992), causes lost income through exclusive rights to trade (Scherr et al., 2003), or pushes communities into unwise land uses (Mayers and Vermeulen, 2002).

Partnerships are sometimes publicised as promoting local empowerment by means of strengthening the organizations that represent forest communities (Clay, 1992). However, Vermeulen et al. (2003) found little evidence that deals in either forestry or contract farming became platforms for improving communities' collective action. According to them, if communities are not sufficiently organised when embarking on trade agreements, corporations dominate the relationship. Occasionally, company influence may increase conflict within and amongst households by excluding certain groups from benefit sharing (Vermeulen et al., 2003), or interfering with complex systems and sensitive common property arrangements (Wollenberg, 1998).

To companies, partnerships can provide access to forest resources at a competitive cost (Scherr et al., 2003); improve organisational capacity; foster innovation and workers' performance; and allow the diversification of financiers' portfolios through access to socio-environmentally sensible sources (Mayers and Vermeulen, 2002). The largest benefit, however, involves improving the reputation of the company and its trademarks (Utting, 2001). Despite these potential benefits to companies, managing company–community agreements is troublesome and costly (Wollenberg, 1998).

Regarding forests, partnerships may deliver benefits especially when based on the trade of NTFPs; they reward socially and environmentally sensitive forms of forest use and raise public consciousness around forest conservation. Industries involved in partnerships also tend to adopt environmental standards for many aspects of their operations, both in forests and

urban areas (Vermeulen et al., 2003). On the negative side, partnerships with large economic benefits can encourage overexploitation of forest resources, and advance 'consumerist' approaches at the very base of forest destruction (Corry, 1993).

### 3. The context of company–community deals in the Brazilian Amazon

Forest devolution in Brazil began in the late 1980s, responding to extractivists' and indigenous groups' social struggles. Nowadays one-fifth of the Brazilian Amazon is designated as indigenous land, another four percent are allocated to Extractive Reserves and other similar protected areas (Lentini et al., 2003), and an even larger percentage is under informal regimes of common property.

Devolution of property rights, social struggles and the increasing appeal of the Amazon to the world's community are driving a process of growing social identity which is the foundation for several commercialisation projects in the region. Among these, company–community deals are growing, particularly in NTFP trade (Morsello and Adger, *in press*), but less so for agreements based on timber trade (Vidal and Donini, 2004).

NTFP-based partnerships in the Brazilian Amazon encompass a variety of products and sectors, such as cosmetics, pharmaceuticals, food and the automobile industry. Companies entering into deals vary in size and origin. The cosmetics industry is the leader among these sectors, due to the widespread adoption of natural sourcing, vegetable-based products and corporate social responsibility practices (Enríquez, 2001). At one extreme, there are companies with about ten employees created especially with the aim of providing an economic alternative to local communities. An example is the Acre-based Tawaya of Cruzeiro do Sul, a company that was started by a Brazilian and produces artisanal soaps, exported mainly to Germany (<http://www.tawaya.com.br>). On the other extreme, partnerships include large corporations with over 2000 employees, such as Croda and The Body Shop from the UK, Cognis from Germany, Aveda from the US and Natura from Brazil.

The number of people benefited in each partnership varies. Some companies deal with a large number

of families, but in this case the agreements involve only direct acquisition of forest products. The Brazilian company Beraca-Brasamazon, for instance, deals with 2800 families in 5 Brazilian Amazonian states (Almeida, 2004), while the production of the Xapuri natural rubber tire involves around 3000 families (MMA, 2002).

Usually, communities involved are small, with less than 300 people, but companies often start with one or two communities and increase the number of partners over time. For example, the partnership between The Body Shop company and indigenous communities in the Altamira region initially involved a single community of around 280 individuals (A'Ukre-Kayapó), but today includes another six communities, ranging from 34 to 440 individuals in size. Natura, the largest Brazilian cosmetics company, has established deals with eleven extractive communities. The numbers of families in the communities vary: the community at the Sustainable Development Reserve of Iratapuru has only 28 families (175 individuals), while others such as Roque community in the Médio Juruá Extractive Reserve (hereafter, MJER) have 53 families (370 individuals).

Partnerships established by companies selling their products in the retail market, such as The Body Shop (<http://www.thebodyshop.com>), Aveda (<http://www.aveda.com>) and Natura (<http://www.natura.net>), also include communities in very remote locations, such as indigenous areas or Extractive Reserves. These companies usually focus on niche markets and advertise the partnerships as a corporate social responsibility practice.

Deals are initiated in a variety of forms. Occasionally, communities take the lead and invite a company, such as the Kayapó leaders who invited the The Body Shop to initiate trade during a large indigenous protest that occurred in Altamira in 1989 (Morsello, 2002). More frequently, however, agreements are intermediated by third parties, frequently NGOs or universities. A São Paulo-based NGO, Instituto Socioambiental (<http://www.socioambiental.org>), for example, mediated the implementation of several agreements between indigenous groups and Brazilian companies. Research groups based at Amazonian universities are also brokering agreements or incubating community-based companies that sell products to other enterprises. For instance, the agreement between communities

within the MJER and the companies Natura and Cognis was intermediated by a research group at the Federal University of Amazonas. Similar deals were incubated at the Poverty and Environment Program, POEMA, housed by the Federal University of Pará (<http://www.ufpa.br/poema>).

#### 4. Opportunities and problems created by partnerships in the Amazon

##### 4.1. *The community sphere*

Estimates of incomes derived from Amazonian company-community deals are rare in the published literature, but there are indications that income levels are unable to lift communities out of poverty. Despite that, the benefits of partnerships in conditions of income scarcity, such as the Brazilian Amazon, are considerable. For instance, in the agreement BS-A'Ukre-Kayapó for the production of Brazil nut oil, the net incomes of adults (over 15 years) averaged US\$277/year (SD=317; Range=0–1388) in 2000–2001 and household incomes averaged US\$1441/year (SD=979; Range=0–3283). While this amount is modest, most families had incomes equal to zero before the agreement. With oil trade, seventy percent of all adults received incomes from oil production, while only thirty percent benefited from other sources of income (Morsello, 2002). In the agreement Yawanawa-Aveda cosmetics, per capita income was US\$70/year in 1995 and was expected to reach US\$370 by 2000. Again, while these numbers are low, at the time of project implementation the only alternative source of income was trade in natural rubber. Rubber prices, however, went down from R\$1.33 in 1970 to R\$0.50 in 1995, inducing community members to outmigrate. This trend was reversed by setting up the company–community deal (Silberling et al., 2002; Waddington, 2002). Presently, the community has expanded its portfolio of agreements and is dealing with other companies and products. Another example of the income implications of partnerships includes the agreement between Amazonlife, a Brazilian producer of vegetable leather (cotton cloth coated with natural rubber), and the Yawanawa. In this case, the trade deal increased the net income from R\$1.22/h, the rate for conventional rubber extraction, to R\$2.85/h, the rate

for production of vegetable leather (Silberling et al., 2002).

These examples illustrate the modesty of the incomes achieved through corporate–community partnerships, but also attest to their importance when alternative sources of income are absent.

Further increases in the effort spent at production could be a way to raise income. However, the potential to raise production is limited by challenges at the level of the domestic economy. Increased production, particularly through the extraction of widely dispersed resources, could threaten food security of communities lacking regular access to purchased food, since less time would be spent on subsistence agriculture. For example, in years of high Brazil nut productivity, some labour-scarce households from the A'Ukre-Kayapó village abandoned the cultivation of subsistence agricultural plots in order to produce Brazil nut oil. Consequently, these families experienced food shortages, because purchased food is hardly accessible in their remote village. For that reason, partnerships are more desirable when they avoid labour trade-offs with the production of food, particularly the cultivation of agricultural plots for subsistence use (Morsello and Adger, in press).

As regards income distribution, data on company–community deals are even scarcer, although, in general, increased market integration of forest communities is often an inequality driver (Morsello, 2002). Nevertheless, in at least one case, a partnership for NTFP trade in the Amazon was reported to have been implemented without creating inequalities in an indigenous area (see Morsello, 2002). In this project involving the Kayapó and The Body Shop, all individuals from the community could participate in all the production phases, which included collecting Brazil nuts and processing them into oil. However, differences in equality levels among partnerships are caused not only by structural arrangements embedded in agreements, but also by cultural differences. To exemplify, in the partnership established by The Body Shop and the Amazoncoop, which involved eleven indigenous groups, gender-related consequences differed. For instance, while Gê-family speaking groups such as the A'Ukre-Kayapó and Xikrin-Kayapó shared income benefits more equally between men and women, groups such as the Assurini and Parakanã from the Tupi speaking-family restricted women's access to Brazil nut income.

Another important aspect of income is the payment of premium prices. In the Amazon, premium prices have been paid in a number of cases. For instance, in the agreement between The Body Shop and A'Ukre-Kayapó, the company paid US\$35/kg for Brazil nut oil until 2002 (Morsello, 2002), when the price dropped to US\$11. In contrast, Brasamazon, the largest industrial producer, sells the same oil for an average price of US\$8/kg (Enríquez et al., 2003). Similarly, Aveda pays US\$0.92/kg for the Yawanawa's urucum (*Bixa orellana*, a natural pigment) (Waddington, 2002), which is approximately thirty percent above the market price (Enríquez et al., 2003).

As in other regions (see Mayers and Vermeulen, 2002), partnerships in the Brazilian Amazon have been reported to improve communities' access to social programs. In The Body Shop–Amazoncoop agreement, for example, part of the profits was invested in healthcare and the surveillance of the indigenous territories against loggers and miners (Morsello, 2002). Similarly, part of the funds provided by Aveda to the Yawanawa was invested in building a school and a health centre in their village (Waddington, 2002).

Capacity building programs are a potential benefit of partnerships, as they allow a more sustainable route to community development. In the Brazilian Amazon, however, these programs are not always implemented. In the Body Shop–A'Ukre-Kayapó context, for instance, over the ten-year period of the agreement, capacity building was limited to the basic duties of Brazil nut oil processing and to teaching basic bookkeeping to two community members. As a result, the community did not develop the capacity to manage the process independent of the company (Morsello and Adger, in press). In the agreement between the companies Cognis and Natura and the communities at the MJER, capacity building activities were initiated early on by the university partner, although there were initially focusing solely on oil processing. More recently, due to combined government and university intervention, the companies were required to finance a more thorough capacity building program, which included instruction on management duties.

Partnerships are also argued to empower communities (Andrade, 2003). In the Aveda–Yawanawa case,

for instance, partnering with the company strengthened links among community members, preventing outmigration (Waddington, 2002) and facilitated the establishment of new commercial links with other partners. Amazonian partnerships were also reported to strengthen indigenous cultural identity, by fostering collective work and the rescue of traditional practices. For instance, through the agreement between The Body Shop and A'Ukre-Kayapó, the traditional practice of trekking for Brazil nut collecting was revived (Morsello, 2002).

There is nonetheless evidence of negative consequences for communities. In the MJER, for instance, through the influence of partner companies, the traditional local organisation (ASPROC) that dealt with partner companies was replaced by a new organisation (CODEAMJ). There are already signs of disagreements within the community due to this change, especially because the new organisation was created by members of only one of the Reserve's villages.

Price setting is an area where empowerment is rarely achieved. Because many partnerships involve the implementation of new commercial activities, companies have an advantage and often approach the community with a 'take-it-or-leave-it' offer, reducing the room for negotiation. An illustrative example of this is provided by the agreement between The Body Shop and A'Ukre-Kayapó community. For about ten years, the company paid US\$35/kg to the group for Brazil nut oil. Later, the company began purchasing the same oil from other indigenous groups in the Altamira region at the price of US\$11/kg. Following this, in 2004, the company decided it would also pay the Kayapó the lower rate, and abandoned trade when the community refused to accept this price.

To increase communities' negotiation power, Mayers and Vermeulen (2002) suggest the preparation of formal contracts describing the negotiation procedures. Frequently, however, agreements in the Brazilian Amazon are informal (e.g., MJER and Cognis/Natura). Despite this tendency, a Brazilian regulation (MP2.186-16/2001) that governs access to genetic resources and local knowledge incorporates aspects of benefit-sharing with communities, and is beginning to have positive impacts on communities' negotiation power. In the MJER, Natura cosmetics is discussing the creation of a formal

contract with the community, which would entail transferring a percentage of the company's community-sourced cosmetics profits to a community fund. The company recently signed a similar agreement with the Iratapuru community from Amapá (CGEN Deliberation n.94-24/02/2005).

#### 4.2. *The company sphere*

Partnerships in the Amazon have provided benefits to companies, such as increased net financial gains due to sales of their products at premium prices, and increased market access and market share in niche markets (Andrade, 2003). Some companies have been very successful in incorporating partnerships with communities into their commercial strategies. The Brazilian cosmetics company Natura created a new line, Ekos, which is prepared with Brazilian plant extracts, many from the Amazon. Launched in 2000, the line achieved sales of over US\$80 million in 2003 (Vassallo, 2003).

By directly buying products from Amazonian communities, companies can also reduce risks by guaranteeing the sourcing of highly unpredictable NTFPs. These ties may lead to either a contractual exclusivity or a 'virtual' exclusivity, a kind of invisible barrier that discourages trade between communities and potential competitors because of the stronger links a community has with a certain company.

On the other hand, because of the remoteness of Amazonian communities and their infrastructure deficiencies, production costs are quite high. However, for some sectors—mainly cosmetics and pharmaceuticals—and especially for large companies, these raised costs are irrelevant when compared to the total costs incurred or benefits received. One reason is the fact that many companies purchase only a small part of their supplies from communities. For instance, in 2003, only 5% of the Brazil nut oil used by Natura was sourced by the Iratapuru Development Reserve, the single community supplier of this product (Vassallo, 2003).

The greatest costs to companies in this type of deal are due to the high level of effort required to enable trade with communities with poor management skills and strikingly different social organisation and culture. The process demands building up novel management competencies and also expanding

the network of relationships with government and civil society organisations.

Increased visibility and identification with causes of great social appeal bring several benefits to companies, such as amassing free publicity, based on media and NGO coverage of these partnerships, and building up a trustful image. It can, however, also trigger lawsuits or negative publicity, putting a company's activities and reputation at risk. The most famous example relates to The Body Shop and Kayapó deal, which once attracted strong negative publicity, almost resulted in a lawsuit and brought considerable economic losses to the company (Morsello, 2002). In the Amazon, where the density of civil society organisations may be one of the highest in the world, these problems are multiplied and the line between heroism and villainy is blurred (Vassallo, 2003).

#### 4.3. *The forest sphere*

The impacts of company–community deals on forest conservation can be analysed in local or regional terms. Regional impacts include the potential to transform the overall development strategies pursued in the Brazilian Amazon. In this regard, however, partnerships are still very limited in terms of numbers and communities enrolled, although many of the communities involved control large areas, such as the 4.3 million ha controlled by the indigenous groups engaged in the Amazoncoop–The Body Shop deal (<http://www.amazoncoop.org>).

However, in the Brazilian Amazon the greatest deforestation drivers are cattle ranching and soy-bean plantations, with slash-and-burn agriculture by family-based agriculturists being only the third-place driver (Alencar et al., 2004). NTFP deals have little counteracting force in this panorama, because the largest destructive impacts are not caused by forest communities.

At the local scale, the impacts of company–community deals can be direct or indirect. Direct impacts are those involving the negative impacts brought about to ecosystems by trading NTFP species, which are smaller than alternative land uses (Shanley et al., 2002), but may nevertheless lead to the destruction of NTFP populations (Homma, 1993). Control over exploitation rates may be a solution, but there are

several constraints. First, ecological information regarding NTFP in the Amazon is scarce and consequences may be observable only over very long periods. For instance, Peres et al. (2003) documented how chronically exploited Brazil nut populations experience population bottlenecks after several decades of exploitation.

Legally, Brazil's regulations demand that NTFP extraction in natural primary forests be preceded by the approval of a management plan by the environmental institute (IBAMA) (Law 4771, 15/09/1965). However, NTFP extraction has occurred in the absence of management plans, even in those more restricted areas such as indigenous reserves and Extractive Reserves. For instance, Brazil nuts were collected at the A'Ukre-Kayapó reserve for about ten years without any plan being prepared. In the MJER, it was only in 2005, after five years of commercialisation, that management plan preparation began. The impetus in this case was the certification of traded products, which required a management plan.

Nevertheless, company–community deals tend to enforce the preparation of management plans due to increased visibility when companies advertise the partnership in their marketing strategies. In Brazil, this has occurred in Extractive Reserves, where government oversight is better, but not in indigenous areas, where neglect has often been the case. Forest certification of NTFPs, often sought by companies focusing on green markets, is also beginning to add another layer of control. Over the past two to three years this type of certification has gained some momentum in Brazil.

There are however, some difficulties in transforming forest certification parameters into a real evaluation of the ecological sustainability of NTFP extraction in the Amazon. Evidence suggests that NTFP populations in rainforests exhibit a great degree of variability and unpredictability in terms of resource productivity, which varies seasonally, annually and by forest type (Neumann and Hirsch, 2000). This means that it is not only necessary to develop parameters and indicators for different commercial species, but also to adapt them based on the results of periodic monitoring. Currently, operations certified in Brazil comply with general NTFP standards, or, in the case of Brazil nuts, comply with a product-specific standard (see <http://www.fsc.org.br>). It is, however, still too

early to evaluate if monitoring programs will be able to produce meaningful information.

Indirect impacts are those that involve the use of natural resources other than the products commercialised when communities engage on trade. At least one study has observed that company–community deals sometimes produce, as an indirect consequence, an increase in the area cleared by indigenous communities for subsistence agriculture plots (see Morsello and Adger, in press). This consequence was observed at A'Ukre-Kayapó, and is most likely explained by families spending less time gathering edible forest products for their own consumption—a relatively time consuming activity—in order to engage in oil production. To overcome food shortages, they thereby increased the sizes of their agricultural plots. Households with enough labour usually adopt this strategy, whereas labour-scarce families either abandon oil production or subsistence agriculture.

In the MJER, in contrast, preliminary and qualitative data based on interviews indicate the opposite trend. Household appear to decrease the area of agricultural plots cleared from primary forests, because they invest a larger percentage of their time in NTFP extraction (mainly, *Carapa guianensis*) and trade with companies. Previously, the community traded small amounts of manioc flour. The effects of corporate–community partnerships on the clearing of forest for agricultural plots are still unclear, but appear to be non-linear and influenced by communities' opportunities to engage in trade in agricultural products, household demography and economic returns obtained (see Morsello, 2002).

## 5. Concluding remarks

Despite some problems, current evidence indicates that the exploitation of NTFPs under the auspices of a company–community partnership delivers better results to communities and forests than NTFP exploitation without such a partnership. Yet, despite the fanfare given to these partnerships by companies, evidence presented here suggests that partnerships can have quite different outcomes depending on a number of factors. Partnerships for NTFP trade in the Amazon may provide significant opportunities, but may also cause problems,

especially to communities and forests, but also to companies.

To the Amazonian communities, partnerships deliver modest incomes, which are nonetheless important when income alternatives are scarce. They can deliver other social benefits and may contribute, in the long run, to the establishment of autonomous community enterprises. However, there are many traps that should be avoided, which, in most instances, are rooted in the excessive control of companies. For corporations in some sectors, such as cosmetics, prospects are better and problems mainly involve the effort required to manage the operation, and to deal with increased visibility to the public and civil society organisations. For the environment, partnerships do tend improve the outcomes of forest exploitation due to increased visibility of the operations to the government and the consumers, but the sustainability of NTFP extraction is still in question.

The contradictory results regarding the prospects to communities and forests imply that governments have an important role to play in company–community deals, by setting up legal and institutional mechanisms to protect community rights and oversee environmental impacts. Some recent mechanisms such as the Brazilian regulation refereeing to the access to genetic resources and traditional knowledge are already making a difference in this regard.

However, government actions are constrained by institutional weaknesses, such as the difficulty in monitoring activities in the long run, especially in indigenous areas. In the late 1980s, decentralisation regarding the distribution of the federal budget, as well as administrative and regulatory duties began in Brazil. In the Amazon region, decentralisation had negative impacts on some government sectors, particularly indigenous affairs, but also environmental duties (Toni and Kaimowitz, 2003). Because of that, government control and direct action over these areas were enormously reduced. In this context of the government's shrinking role, corporate influence may be inflated and devolution might mean that the bulk of the benefits of commercialising forest products accrue to companies rather than communities.

To counteract this problem, the bringing together of public institutions and civil society mechanisms such as certification schemes could be a way to bridge the gap between national policies and monitoring

activities at the local level. Governments could focus on the regulatory role and on providing the framework for action, while mechanisms such as certification schemes could allow the continuous and close monitoring of impacts at the local level.

In summary, ideal company–community deals will work better when: contracts and mechanisms that allow fairer negotiation between partners are a legal requirement; capacity building begins early and includes managerial duties; companies avoid interfering in local community affairs; governments and third parties, such as universities or NGOs, act as brokers, intervening when necessary and also advising companies and communities; monitoring of social and environmental conditions is constant and management is adapted accordingly; commercial activities are planned with the organisation and seasonality of domestic economies in mind, as well as collective systems of common property.

The above conclusions reveal how novel regimes pose challenges to research in forestry. New economic, political, cultural and social forces are reshaping forestry, and are recasting the roles of old and new stakeholders. Forestry can no longer be analysed in the absence of these social processes. While in the 1980s political economists studying Latin America emphasised the role of central governments in shaping the use of forests, the openness of national economies has meant that part of policy-making has moved to the international level, and another part is shared between the local level and civil society. Currently, we also have firms moving into the forest supposedly in search of sustainably extracted resources and to ‘do good’. The arrangement is new and still in need of novel theories and tools that allow the integration of a broad spectrum of forces acting in a variety of scales. Political economists, for instance, cannot answer some questions related to company–community deals. For instance, neither central governments, nor municipalities decide how much forest products to harvest—individuals, households and companies do (Godoy, 2001). Moreover, these decisions are taken in a context whereby several activities influence and are influenced by forestry, while enmeshed in the economic strategies of forest communities’ households and individuals. Forestry in this century therefore has to incorporate a larger number of variables and actors that are acting at the global, national and local level.

## Acknowledgements

Project funded through the Kleinhans Fellowship Award (Rainforest Alliance, USA) and CNPq (Brazil). I thank Deanna Newsom, Thomas Sikor and two anonymous reviewers for valuable and detailed comments on earlier versions.

## References

- Alencar, A., Nepstad, D., McGrath, D., Moutinho, P., Pacheco, P., M.C.V.D., Soares-Filho, B., 2004. Desmatamento na Amazônia: Indo Além da Emergência Crônica. IPAM, Belém.
- Almeida, H., 2004. Óleos amazônicos conquistam o mundo. *Química e Derivados* 429, 24–27.
- Anderson, A., Clay, J., 2002. *Esverdeando a Amazônia*. IIEB/Peirópolis, São Paulo.
- Andrade, A.A.L.G., 2003. *Artesãos da Floresta*. Universidade Estadual de Campinas, Instituto de Economia, Campinas, Brasil. MSc Thesis.
- Clay, J., 1992. Why rainforest crunch? *Cultural Survival Quarterly* 16, 31–46.
- Clay, J., 1997. Business and biodiversity: rainforest marketing and beyond. In: Vance, N.C., Thomas, J. (Eds.), *Special Forest Products—Biodiversity Meets the Marketplace*. Forest Service, Washington, DC, pp. 122–145.
- Corry, S., 1993. The rainforest harvest: who reaps the benefit? *The Ecologist* 23, 148–153.
- Counsell, S., Rice, R.E., 1992. *The Rainforest Harvest*. Friends of the Earth, London.
- Enríquez, G.V., 2001. *A Trajetória Tecnológica dos Produtos Naturais e Biotecnológicos Derivados na Amazônia*. Universidade Federal do Pará, Belém, Brazil.
- Enríquez, G.V., Silva, M.A., Cabral, E., 2003. *Biodiversidade da Amazônia*. NUMA/UFPA, Belém, Brazil.
- Entine, J., 1994. Shattered image. *Business Ethics* 8, 23–28.
- Godoy, R.A., 2001. *Indians, Markets and Rainforests*. Columbia University Press, New York.
- Homma, A.K.O., 1993. *Extrativismo Vegetal na Amazônia: Limites e Oportunidades*. EMPRA-SPI, Brasília, Brazil.
- Lentini, M., Verissimo, A., Sobral, L., 2003. *Fatos Florestais da Amazônia*. Imazon, Belém.
- Mayers, J., 2000. Company–community forestry partnerships: a growing phenomenon. *Unasylva* 51, 33–41.
- Mayers, J., Vermeulen, S., 2002. *Company–Community Forestry Partnerships*. IIED, London.
- MMA, 2002. *Negócios para a Amazônia Sustentável*. MMA/SCA, Brasília.
- Morsello, C., 2002. *Market integration and sustainability in Amazonian indigenous livelihoods: the case of the Kayapó*. University of East Anglia, School of Environmental Sciences, Norwich. PhD thesis.
- Morsello, C., Adger, W.N., in press. Amazonian indigenous groups trading NTFP with large corporations: does globalisation help or

- hinder communities and forests? In: Ros-Tonen, M. A. F. (Ed.), *Global–local Partnerships for Conservation and Sustainable forest use: a Latin-American Perspective*. CEDLA Latin American Studies, Amsterdam.
- Neumann, R.P., Hirsch, E., 2000. *Commercialisation of Non Timber Forest Products: Review and Analysis of Research*. CIFOR, Bogor, Indonesia.
- Peres, Carlos A., Baider, C., Zuidema, P.A., Wadt, L.H.O., Kainer, K.A., Gomes-Silva, D.A.P., Salomão, R.P., Simões, L.K., Franciosi, E.R.N., Valverde, F.C., Gribel R., Shepard Jr., G.H., Kanashiro, M., Coventry, P., Yu, D.W., Watkinson, A.R., Freckleton, R.P., 2003. Demographic threats to the sustainability of brazil nut exploitation. *Science* 302, 2112–2114.
- Scherr, S.J., White, A., Kaimowitz, D., 2003. *A New Agenda for Forest Conservation and Poverty Reduction: Making Markets Work for Low-Income Producers*. Forest Trends/CIFOR, Washington D.C.
- Shackleton, S., Campbell, B., Wollenberg, E., Edmunds, D., 2002. Devolution and community-based natural resource management: creating space for local people to participate and benefit? *ODI Natural Resource Perspectives*. ODI, London.
- Shanley, P., Laird, S.A., Pierce, A.R., Guillén, A., 2002. Introduction. In: Shanley, P., Pierce, A.R., Laird, S.A., Pierce, A.R., Guillén, A. (Eds.), *Tapping the Green Market*. Earthscan, London, pp. 1–6.
- Silberling, L., Franco, M.P., Anderson, A.B., 2002. Couro vegetal: desenvolvimento de um produto artesanal para o mercado. In: Anderson, A., Clay, J. (Eds.), *Esverdeando a Amazônia*. IIEB/Peirópolis, São Paulo, pp. 105–119.
- Toni, F., Kaimowitz, D., 2003. O Papel do Municípios na Gestão Florestal: Lições dos Estudos de Caso. In: Toni, F., Kaimowitz, D. (Eds.), *Municípios e Gestão Florestal na Amazônia*. A.S. Editores, Natal, Brazil, pp. 373–415.
- Utting, P., 2001. UN-business partnerships: whose agenda counts? *Transnational Associations, Third World Network*, July 27.
- Vassallo, C., 2003. Um jeito diferente de fazer negócios. *Revista Exame*, 32–40 (12/03/2003).
- Vermeulen, S., Nawir, A.A., Mayers, J., 2003. Better livelihoods through partnership? *Conference Rural Livelihoods, Forests, and Biodiversity*. CIFOR, Bonn, Germany.
- Vidal, N.G., Donini, G., 2004. Promising business models for community–company collaboration in Brazil and Mexico. 10th IASCP Conference, *The Commons in an Age of Global Transition*. IASCP/UNAM, Oaxaca, Mexico.
- Waddington, M., 2002. Incorporação de uma nova atividade comercial em uma comunidade indígena Yawanawa. In: Anderson, A., Clay, J. (Eds.), *Esverdeando a Amazônia*. IIEB/Peirópolis, São Paulo, pp. 53–66.
- Warner, M., 2003. *Partnerships for Sustainable Development: Do We Need Partnership Brokers?* ODI, London.
- Weinberg, A., 1998. Distinguishing among green business: growth, green, and anomie. *Society and Natural Resources* 11, 241–251.
- White, A., Martin, A., 2002. Who Owns the World's Forests? *Forest Trends*, Washington, D.C.
- Wollenberg, E., 1998. Conclusion. In: Wollenberg, E., Ingles, A. (Eds.), *Incomes from the Forest*. CIFOR/IUCN, Bogor, Indonesia, pp. 221–227.