PART 6

Forestry governance

A key issue for climate change
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Forests cover 31 per cent of the Earth’s surface, but they are shrinking at a rate of 13 million hectares (ha) each year.¹ They play a fundamental role in regulating CO₂ levels in the atmosphere, and, as a result, they naturally mitigate the effects of climate change by acting as carbon sinks. Conserving forests and promoting reforestation rather than deforestation or forest degradation has a twofold benefit: the preservation of the carbon already stored and the maintenance or enhancement of the forests’ ability to act as a carbon sink and absorb atmospheric CO₂.

Forest resources are very lucrative, however, and have the potential to be an important element of countries’ economic development. The sector is prone to illegal logging and corruption, which strips forests at unprecedented rates and does not provide revenue to governments for development purposes. REDD – Reducing Emissions from Deforestation and Forest Degradation – is a mechanism to offer financial incentives for developing countries to reduce forest-related emissions. This special section discusses the governance risks associated with the implementation of REDD in a sector that is vulnerable to corruption.

In the first section, Patrick Alley provides a compelling critique of the drivers of corruption in forestry, including the international demand for timber, shortfalls in legislation regulating illegally sourced forest products and the emphasis on forests as a component of economic development rather than conservation. In a complementary piece, Iftekhar Zaman and Manzoor-e-Khuda analyse the effects of localized corruption in Bangladesh in response to revenue-centric government policy, which encourages the erosion of essential mangroves.

Jeffrey Hatcher and Luke Bailey go on to discuss the implications of implementing REDD in countries and forest environments with poor governance records, particularly in relation to the impact on and participation of indigenous communities. This piece is supplemented by a contribution from Ana Murillo Arguello that
highlights the need for supportive government legislation in Nicaragua to ensure that forest communities participate in forest-related policy.

In an assessment of the governance risks associated with the measuring, reporting and verification of REDD, Christopher Barr highlights aspects of the process that could be particularly susceptible to corruption, such as the inappropriate validation of projects, the overestimation of carbon benefits and the misappropriation of carbon rights. Sarah Dix supports this assessment with an example of the illegitimate sale of forest carbon certificates in Papua New Guinea, emphasizing the importance of robust systems for managing the revenue created through REDD+. Finally, Manoj Nadkarni illustrates, with the example of Indonesia, how, even before a REDD mechanism was agreed, the game plan itself was changing rapidly, potentially at the expense of good governance safeguards.

Notes

6.1

Corruption

A root cause of deforestation and forest degradation

Patrick Alley

Corruption and illegality are not uncommon in the resource extraction industry. It is arguable, however, that they are most visible and pervasive in the tropical timber industry. The World Bank estimates US$10–23 billion worth of timber is illegally felled or produced from suspicious origins annually, of which some US$5 billion enters international trade. Governments are deprived of the same amount in lost taxes and royalties.2 Ironically, much of these losses are in the formal forestry sector, which has been promoted as a key economic driver of development.

Recent findings that land-use changes, including deforestation, have raised the stakes and elevated forestry issues onto the international agenda.3 Key United Nations Framework Convention on Climate Change (UNFCCC) negotiations now include a mechanism to provide incentives to developing countries for the Reducing Emissions from Deforestation and Forest Degradation initiative—a concept known as REDD, and several billion US dollars have been earmarked for REDD and multilateral REDD-related efforts. Some US$17–33 billion per year could flow as a result, making forests worth more standing up than cut down.4

The combination of significant corruption risks in the timber industry and the fact that many forest-rich countries suffer very high levels of corruption and poor governance of resource revenues represents one of the greatest threats to the success of any REDD agreement. Interpol warns that the sheer scale of REDD may make it impossible to monitor.5
A sector prone to corruption

The forestry sector is one in which large-scale illegality both thrives and depends on widespread corruption. It pervades every step of the logging process, especially in the bidding processes for concessions, forest management (or the lack of it) related to these concessions, over-harvesting, under-declaring timber volumes, cutting outside permitted areas, tax evasion and state failure to prosecute perpetrators. The capacity of some interests to capture forest resources and revenue flows, in the context of an industry that has up to now effectively avoided international regulation, has condemned most reform efforts to failure.

This corruption is enabled in part because most of the world’s tropical forests are classified as public land, and can be therefore controlled by relatively few politicians and civil servants, who are in a position to wield great discretionary power in return for bribes. Furthermore, forests are remote and beyond the public gaze, and the populations most affected – more than a billion forest-dependent people – can be effectively excluded from the decision-making processes that determine the fate of forests, due to a lack of information, resources, capacity and influence.

Private land ownership is not a guarantee that corruption can be warded off. Nevertheless, the collective self-interest represented by community or local control of forests, which is itself not immune to corruption, can act as a powerful check on it.

Since the late 1980s the international donor community has spent tens of billions of US dollars trying to reduce deforestation and harness forests for economic growth in developing countries. The international forestry community usually portrays tropical forests as a renewable resource, but industrial-scale logging of tropical forests cannot be simultaneously economically and ecologically sustainable. Most investments have focused on trying to improve forest management, governance, technical capacity, and legal mechanisms and compliance. Nonetheless, the tropical regions of Africa, Latin America and Southeast Asia lost around 1.2 million km² of forest from 1990 to 2005 — an area the size of France, Germany and the UK combined.

The typical 30-year harvest rotation required by most tropical forest management plans does not allow enough time for trees to regenerate, so logging companies tend to log far beyond sustainable limits. Now that stricter legal, governance and enforcement systems are being introduced, companies can make money only by seeking subsidies — continually extending their operations into new areas containing high-value virgin forests — or by bucking the system. To maximize profits, companies are tempted either to over-harvest within permitted areas or to cut outside them.
An alarming number of logging companies appear to rely on subterfuge, intimidation of observers and corruption. Transporting timber to export points and evading various taxes and royalties require bribes in order to obtain the necessary paperwork. Once this paperwork is in place the job becomes much easier, because, with the exception of the US (see below), no countries have laws that ban the importation of illegally sourced timber, so it can be laundered onto the international market with ease.\textsuperscript{13}

\textbf{The engines of corruption}

Corruption can be driven by politicians, government officials and their business patrons, who make discretionary timber deals without following due process; by the international donor community, which often drives and bankrolls national forest strategies and individual logging operations, but fails to address adequately the corruption that condemns virtually all these ventures to failure; and by the unrelenting international demand for cheap timber.

The tropical timber industry has both driven and fuelled grand corruption in virtually every country it has operated in. Brazil, home to the world’s largest tropical forest block, scores 3.7 (out of 10) on TI’s Corruption Perceptions Index. The Democratic Republic of Congo (DRC), with the second largest block, scores 1.9, while Congo Basin countries in general, which together possess Africa’s richest forests, have an average score of 2.3. Papua New Guinea, which shares the third largest forest block with West Papua, scores 2.1.
Table 6.1 REDD-Monitor ‘Rainforest Risk’ tables, December 2008

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Average: 118 119 5 5.29 4 4 −0.57 −0.72 −0.61 −0.80

Source: Simon Counsell, REDD-Monitor Risk Table, http://www.redd-monitor.org/2008/12/05/risk-the-fatal-flaw-in-forest-carbon-trading/
Politicians, public officials and the timber industry

In some countries, natural resources seem to be treated as the personal fiefdom of the ruling elite, to be ‘sold’ as they see fit, regardless of national laws. Such elite capture means that corruption has become systemic across entire nations or resource sectors. Over and above the desire for personal wealth, political leaders bestow money or exploitation rights on key ministers and military or business elites in return for political, military or financial support. Capturing state resources effectively requires both coordination and patronage, and the connivance of key officials.

High-level appointments in some places are ‘sold’ to key allies, who can then run these ministries or departments, making important decisions that favour their patrons rather than the constituencies they are paid to serve. In turn, corrupt officials can ensure that corrupt revenues trickle down the hierarchy so that everyone at the head office benefits.

At the bottom of the ‘food chain’, field-level forestry enforcement officers are typically very poorly paid and equipped. Their salaries are often augmented by the very logging companies they are meant to oversee, and through bribes and checkpoint fees. Moreover, in remote areas where logging generates vast unofficial revenues, only a very brave person would dare to blow the whistle on the people with whom he or she lives and works. This is the sharp end, where corruption and physical intimidation go hand in hand.

Corruption hot spots

In the early 2000s Cameroon joined the front line in the battle against corruption and illegal logging, as forestry reforms would make the country eligible for international debt relief. Logging companies indulged in illegal logging on a massive scale, following the example of the president’s son, Frank Biya, who extended a 1000ha permit so that he eventually controlled about 130,000ha of forest.

In a similar vein, Teodorin Obiang, the agriculture and forests minister of neighbouring Equatorial Guinea and also the son of a president, has a multimillion-dollar car collection and owns a US$35 million beachfront home in Malibu, California – while earning a monthly salary of US$4000. With one of the highest levels of per capita GDP in the world, Equatorial Guinea has little to show for its oil and timber wealth. The timber sector is dominated by Shimmer International, a subsidiary of Malaysian timber conglomerate Rimbunan Hijau, which according to a document obtained in 1999, also acted as a logging contractor for Obiang’s own timber concession.
Major reviews of Papua New Guinea’s (PNG’s) forest sector have found it to be one of the most corrupt in the world. In an unusually blunt governmental report from 1989, corruption was shown to be ‘pervasive’, including bribery, non-compliance with regulations, extensive violations of landowners’ rights and extreme environmental destruction. Logging companies have been reported to be ‘roaming the countryside with the self assurance of robber barons; bribing politicians and leaders, creating social disharmony and ignoring laws in order to gain access to, rip out, and export valuable timber’. A 2006 report found that PNG’s logging industry ‘is synonymous with political corruption, police racketeering and the brutal repression of workers, women and those who question its ways. Its operations routinely destroy the food sources, water supplies and cultural property of those same communities. They provide a breeding ground for arms smuggling, corruption and violence across the country.’

The enablers of corruption, deforestation and degradation

The unsustainable logging of tropical forests is not simply the economic equation of supply and demand. The faith of the international development community in industrial-scale logging as a key economic driver of and contributor to sustainable development and poverty alleviation has been promoted by the international forestry community. It has been seized upon by the tropical timber industry, which portrays itself as a key development partner: the websites of the companies concerned highlight their contributions to national economies, employment and the building of schools and clinics.

Multinational timber companies

Timber companies are seeking to improve their credentials and their eligibility to receive concessions. Another intention is to attract financial support from bilateral development funds and endorsements from large conservation non-governmental organizations (NGOs) to improve the forest management practices that should really be a core part of their business already. In many cases these attempts would appear to be a cynical mechanism to maximize profit at taxpayers’ expense, as their actual practices belie their commitment to their publicly stated developmental aims.

The ultimate possessor of the largest timber concession in Africa, Swiss–German timber conglomerate Danzer, is at the forefront of this public relations campaign, stating on its website: ‘Responsible forest management means also contributing to the sustainable development of the region and countries [in which] we operate, in particular combating poverty. Danzer Group … has [a] skilled … workforce and
has generated tax and export revenues. Also, Danzer Group has built schools, roads and small hospitals at its operations.24

Meanwhile, DRC-based Danzer subsidiary SIFORCO (Société Industrielle et Forestière du Congo) was accused by Greenpeace in 2008 of systematically avoiding taxes through transfer pricing, thus depriving the DRC and Republic of Congo governments of at least €7.8 million.25 Danzer denied the allegations even though they were based on internal company documentation, citing an audit carried out on its behalf by Ernst & Young, the findings of which have not been made public.26 While tax avoidance is not necessarily illegal, it does not reflect well on an industry that plays the development card in its international lobbying.

Moreover, along with Danish logging multinational DLH, Danzer companies were also major buyers of timber from Liberia during the presidency of Charles Taylor. Despite extensive evidence linking the timber trade and trafficking of arms into Liberia,27 human rights abuses, illegal logging and corruption, these companies imported Liberian logs up until the moment that UN Security Council sanctions brought this trade to a halt, in July 2003.28 From December 2001, long before Security Council sanctions came into force, the most notorious Liberian logging company and a major supplier to DLH and Danzer, the Oriental Timber Company, exported logs to Europe as the Evergreen Trading Company, in an effort to disguise the origin of the timber, and also replaced company markings on logs with a secret code in the form of a series of coloured dots.29

In Papua New Guinea the website of Rimbunan Hijau (PNG) proclaims: 'RH is a significant contributor to the nation’s economic and social wellbeing. […] RH is Papua New Guinea’s industry leader on environmentally responsible and 100 per cent legal management of forests. […] RH has prided itself on an economically, environmentally and socially sustainable future for Papua New Guinea.'30 In fact, in October 2008 it admitted in court that it had been awarded logging rights in PNG illegally.31 Eight months later its website reported the company’s participation in TT’s ‘Walk against Corruption’ in Port Moresby. In an extremely retrogressive step, on 28 May 2010 PNG’s Parliament amended the Environment and Conservation Act, removing the rights of indigenous people to challenge deals concerning the country’s natural resources.32

**Multilateral and bilateral donors**

In an effort to end corrupt practices, international donors have taken a series of actions, ranging from placing conditions on aid, funding the creation or improvement of forest laws, providing technical assistance for law enforcement activities, funding independent forest monitoring and, in its ultimate manifestation, helping to shape
the entire forest sector. Examples include the creation of the Liberia Forest Initiative in post-conflict Liberia and a reform process that cost US$20 million, funded equally by the World Bank and the United States Agency for International Development (USAID).33

As is often the case when the root of corruption is at a high level, however, donors have failed to achieve the desired results. A World Bank funding programme in Cambodia and international debt relief in Cameroon gave way to business-as-usual corruption. Essential political support from the donor community for Global Witness, which served as an independent forest monitor in these countries, shrank in the face of diplomatic awkwardness caused by the organization’s field-based findings that suggested there was top-level corruption.34 International donors have yet to comprehend that failing to match anti-corruption rhetoric with action actually entrenches corruption, sending a clear message that, when push comes to shove, they will not act.

In Liberia the process of forestry reform entered the implementation phase after five years of work in 2008, with the start of concession auctions and sales of old timber stockpiles. Almost immediately the regulations, guidelines and various checks and balances that had been built in to the reform process were allegedly routinely broken or ignored.35 In early 2009 the country’s Forest Development Authority unilaterally altered the tax structure for the concessions after the bidding process was under way, reducing the requirement for 25 annual payments to one initial payment. This would have cost the government up to US$150 million in revenues.36 Behind-the-scenes protests from the donor community prevented this from going through, but no one was held accountable and no investigation was conducted. Although no investigation has been carried out as to whether corruption played a role in this process, a Special Presidential Committee established to investigate a forest carbon deal recently released its report which documented various allegations of corruption, and recommended the dismissal of and further investigation into various officials, some of whom were involved in both processes.37 So while there is no evidence that corruption played a role in the concession allocation process, the Forest Development Authority’s decision to unilaterally give up millions of dollars in a sector specifically reformed to bring economic and social benefit is questionable.

Such examples illustrate that the tropical forest sector’s ability to deliver economic and social benefits can be undermined in practice by the failure of governments and their aid partners to solve problems. Indeed, the international donor community has displayed a remarkably tolerant attitude towards illegality. Significantly, until 2008, no country had a law that made it illegal to import illegally sourced timber. In May 2008 the US led the way by passing an amendment to the Lacey Act38 that not only
bans the importation of illegally sourced timber but firmly places the burden of proof of legality on the importers and imposes severe penalties for non-compliance, including fines of up to US$500,000, seizure of merchandise and up to five years’ imprisonment.

In contrast, the European Union (EU), where it is estimated that the market for illegal tropical timber may comprise between 16 and 19 per cent of total imports, has been considering legislation since 2003. Belatedly, in July 2010 the European Parliament voted to approve a regulation, the aim of which is ‘…to halt the trade in illegally harvested timber and products made from such timber in the EU …’. The move was approved by the European Council in October 2010, but the law will not come into force until 2012. Although this regulation is welcome, it falls short of the stringent requirements of the Lacey Act in that it relies on due diligence carried out by the importers themselves, only applies to those who first place timber on the market, rather than the whole supply chain, and there are no minimum penalties across the EU, with sanctions left to member states.

Despite this appalling record, the development community continues to champion industrial-scale logging under the label of ‘sustainable forest management’. This includes pressure for countries to factor the forest sector into their national Poverty Reduction Support Programmes; and financial support (bilateral aid and World Bank grants and loans) to improve technical capacity, subsidize logging companies to produce forest management plans, and to fund certification schemes and infrastructure investments. Overall, ‘aid’ money has bankrolled the forest sector to the tune of around US$750 million per year. Despite these vast sums, the global gross loss of primary forest between 2000 and 2005 averaged 1.3 million ha per year, 7.3 million ha of which returned as plantations.

In sum, countless initiatives and billions of dollars have been spent trying to curb illegal activities in the industrial logging sector. The question must be asked whether success is actually achievable before the world’s remaining tropical forests are commercially logged out – doing little to serve the communities that depend on forests for their livelihoods and next to nothing to mitigate the effects of climate change.

The future of sustainable forestry: seeing REDD?

If forest management regimes that protect the rights of forest-dependent people and are ecologically sustainable are not economically viable, logging companies have incentive to engage in illegal practices to make profits. In countries already given over to concession logging, everything possible must be done to improve transparency
and good governance. In countries that still have forests not yet allocated to concessions, such as the DRC and Liberia, the only sensible option is to seek new, alternative uses for forests that are socially, ecologically and economically equitable, or perhaps learn from traditional forest uses that make possible a symbiotic relationship between people and forest ecosystems.

REDD offers the opportunity to preserve these forests. Although preventing illegal practices within REDD and managing forests under a REDD mechanism will face many of the same challenges that have dogged the industrial logging sector, a good REDD agreement must have at its core the protection of natural forests rather than promoting the logging of them. It will be easier to detect criminality in ‘no-logging zones’ than to spot illegally felled trees among the legally felled ones as the logging trucks roll towards ports in Africa, Asia and Latin America.

Under a REDD regime, forests will still need to be managed. Illegal logging will need to be prevented, social and environmental issues will need to be monitored and carbon will need to be accounted for. Enabling legal mechanisms will need to be created and enforced. REDD revenues will need to be captured and equitably distributed, because REDD cannot work if forest-dependent populations do not realize any benefits. It is, of course, forest-dependent communities that have the best record in conserving forests, but this fact, and the lessons that could be learned from it, are usually ignored by the policy-makers who determine future forest use.

Corruption poses risks to REDD, as illustrated when an Interpol official noted: ‘Organised crime syndicates are eyeing the nascent forest carbon market. I will report to the [World Bank] that [REDD] schemes are open to wide abuse… [REDD] fraud could include claiming credits for forests that do not exist or were not protected or by land grabs. It starts with bribery or intimidation of officials, then there's threats and violence against those people.’

In late 2009 the president of the Republic of Congo, Denis Sassou Nguesso, in his role as the African Union’s spokesperson on climate change, made various heartfelt pleas to the international community – including US President Barack Obama in particular – for international financial support to help poor but forest-rich countries protect their forests for the global good. This indeed must happen, but his sentiments ignore his country’s abysmal record.

Furthermore, the Republic of Congo is a member of the Coalition for Rainforest Nations (CfRN), which is a major force in the drive to obtain financial benefits through a REDD mechanism. CfRN describes itself as ‘forested tropical countries collaborating to reconcile forest stewardship with economic development’. Despite these laudable aims, many of the coalition members have egregious records in achieving this reconciliation. Until there is genuine political will in such countries
to tackle corruption, a major driver of deforestation, it is unlikely that any forest management regime can be effective. Rhetoric will achieve nothing.

Corruption in tropical forestry has thrived in large part because, although it has been publicly condemned, it has also been tolerated — and it has been tolerated because naive policy-makers have come erroneously to believe that industrial logging is simultaneously ecologically and economically sustainable and good for development as well. The reality is that the world must enter a new phase of zero tolerance for forest-related corruption. The world’s remaining forests are at stake, and without them the battle against climate change cannot be won.

Notes
1. Patrick Alley is a director of Global Witness.
12. See www.globalwitness.org for reports on Cambodia and Cameroon that are illustrative of these issues; Royal Government of Cambodia, Ministry of Agriculture Forestry and Fisheries, Department of Forestry & Wildlife, *Cambodian Forest Concession Review Report* (Asian Development Bank, 28 April 2000).
13. Dependent on approval by the European Council, an EU regulation is set to take effect from 2012.
15. Numerous interviews conducted by the author in both Cambodia and Cameroon between 1995 and 2002.
18. See Forest Law Enforcement in Cameroon 2nd Summary Report of the Independent Observer December 2001–June 2003, Global Witness, October 2003. Global Witness, an independent forest monitor in Cameroon at the time, found its enquiries into the case blocked by the authorities, and was even asked by the World Bank, UK Department for International Development and other donors to omit mention of these familial links in its reports in order to avoid ‘diplomatic’ discomfort. Global Witness did not comply with the requests (personal communication with a World Bank official, June 2002).
20. A special rapporteur to the UN Commission on Human Rights reported that ‘80 per cent of national income is in the hands of 5 per cent of the population’; see UN Commission on Human Rights, ‘Question of the Violation of Human Rights and Fundamental Freedoms in any Part of the World’, 27 January 2000. The rapporteur also stated that ‘[t]he exceptional economic boom which followed the discovery of major oilfields in the mid-1990s has not led to any improvement in the economic, social and cultural rights of the population, more than 65% of which lives in conditions of extreme poverty’. See UN Commission on Human Rights, *UN Report on the Human Rights Situation in Equatorial Guinea – 2001*, 2001.
24. Danzer Group website, davidrwebb.com/Africa.2790.0.html.
27. This is extensively documented. See, for example, Report of the Panel of Experts appointed pursuant to UN Security Council Resolution 1306 (2000), paragraph 19 in relation to Sierra Leone, paragraph 215.

28. See www.globalwitness.org for numerous reports about the Liberian timber industry.

29. Oriental Timber Company internal company documents in Global Witness’s possession.


34. Reform of the Forest Crime Monitoring and Reporting Project, CMB/99/A05, Global Witness, March 2002.


36. SGS/Liberfor, ‘Fiscal Year Summary of Forestry Fees Up to 1 June 2010’.


38. The Lacey Act protects plants and wildlife through civil and criminal penalties for violations, including trade in wildlife, fish and plants that have been illegally taken, possessed, transported or sold.


41. The term ‘sustainable forest management’ is poorly defined. Although on the surface it sounds a reasonable concept, in practice it is usually used by the timber industry to describe conventional, industrial-scale logging. See Global Witness, September 2009.


44. Guardian (UK), 5 October 2009.


46. This is well documented. See, for example, Judgement in the High Court of Justice, Queen’s Bench Division, before Justice Stanley Burnton, Long Beach Limited and Denis Christel SassouNguesso and Global Witness Ltd, case no. HQ07X02371, 15 August 2007.

47. For the full composition of the coalition, see www.rainforestcoalition.org.


49. CFRN member states have a collective average rank of 113 out of 180 on the Corruption Perceptions Index (not including Fiji).
6.1.1
Climate change and corruption leave the world’s largest mangrove forest in peril

Iftekhar Zaman and Manzoor-e-Khuda

The Sundarban, off the southwest coast of Bangladesh, is the largest contiguous mangrove forest in the world. It constitutes 51 per cent of the total reserved forest in Bangladesh, contributes 41 per cent to the total forest revenue and accounts for about 45 per cent of all timber and fuel output. Significantly, it also serves as an essential ‘bio-shield’ against cyclones and high tidal surges, providing protection against coastal erosion and stabilizing land by trapping sediment. In effect, the belt of mangroves is capable of absorbing 30–40 per cent of the total force of a tsunami- or cyclone-generated shock wave before it reaches the inhabited area behind it.

Not only is the Sundarban threatened by the onset of climate change and rising sea levels — it is estimated that a 45cm sea-level rise would inundate 75 per cent of the mangrove, with a 1m rise covering it completely — but it has the additional threat of corruption to contend with. The mangrove is highly vulnerable to illegal logging, particularly in the logging of its precious trees — the sundari. Illegal logging takes place with impunity, involving the collusion of business syndicates, corrupt forest officials and the local administration. The common form of smuggling these trees involves labourers operating under the guise of transporting Nypa leaves in rafts that are in fact full of illegal logs. It has been estimated that, with this form of trafficking alone, the value of the logs smuggled out of the mangrove each year is equal to Bangladeshi taka (Tk) 60 million. Logs are also illegally
transported by fishermen and bawalis (official collectors of Nypa leaves); through this process an estimated Tk1.35 billion worth of logs are smuggled each year.\textsuperscript{6}

In order for this illegal trade to function unchallenged it demands the complicity of local officials. It is estimated that corrupt forest officials extort almost Tk62.5 million from the bawalis each year, in addition to the regular revenue coming from permits issued to them. In order to cope with such demands they have to collect almost four times their permitted volume of Nypa leaves. Similarly, fishermen have to pay unofficial tolls to officials for each trip, make payments at different checkpoints on their transportation routes and pay bribes when they renew their boat permits. It is estimated that, in total, forest officials extort around Tk230 million a year from the fishermen.\textsuperscript{7} In addition, officials often allow entry into wildlife sanctuaries in exchange for bribes, encouraging further degradation of the ecosystem.\textsuperscript{8}

Illegal logging has a substantial impact on the mangrove’s ability to protect settlements from environmental threats, which are likely to become more severe and frequent with the onset of climate change. Bangladesh’s policies can themselves have the effect of encouraging illegal logging practices. Bangladesh follows a revenue-oriented forest policy rather than one focused on conservation. Each year a revenue target is set by the government, which progressively increases over time. The achievement of these targets is the principal criterion on which the performance of forestry officials is evaluated. As a result, officials are under pressure to meet targets, and often resort to unauthorized means of collecting the revenue.

The combination of illegal practices – some of them encouraged by the government’s emphasis on revenues rather than conservation – is likely to degrade the Sundarban significantly and, in turn, have cumulative impacts on climate change, environmental sustainability and development. The degradation of the mangrove will mean that it will not be able to play its carbon storage role, further contributing to climate change. Its loss as a bio-shield against cyclones and tidal waves and its weakened capacity to trap land sediments and stabilize the coastline will have severe consequences for the 3.5 million people who depend directly or indirectly for their livelihoods on the mangrove’s resources.\textsuperscript{9}

The role of illegal practices and wrong-headed policies in accelerating the degradation of the mangrove highlights the need for tackling governance issues in any climate change adaptation plan. The government’s first step should be to reorient forestry policy away from concentrating on revenues to one of promoting sustainable extraction and conservation and mainstreaming these initiatives into national
development and planning. This, coupled with adequate monitoring by Forest Department officials, the police, army and border guards, who are themselves held accountable, and effective incentives and enforcement powers, would have a twofold impact on the Sundarban: it would contribute to mitigation through the preservation of a carbon sink, and be an effective contributor to adaptation by maintaining the natural bio-shield, which will become all the more important for human development as the effects of inevitable climate change become more severe.

Notes
1. Iftekhar Zaman and Manzoor-e-Khuda work for Transparency International Bangladesh.
5. Ibid. US$1 = taka 68 (approximately).
6. Ibid.
7. Ibid.
8. Ibid.
6.2 Governance in the world’s tropical forests
Where will REDD+ land?

*Jeffrey Hatcher and Luke Bailey*

Despite the disappointing outcome of the United Nations Framework Convention on Climate Change’s (UNFCCC’s) 2009 climate change conference in Copenhagen, an initiative known as Reducing Emissions from Deforestation and Forest Degradation (REDD) remains one of the strongest points of international political consensus. REDD was formally introduced at the UNFCCC’s 2007 conference, held in Bali, Indonesia, as an incentive-based mechanism to slow or stop deforestation and forest degradation, which is a major source of global greenhouse gas emissions. As thinking on REDD – now expanded and known as REDD+ – has matured over the past few years, a more sophisticated dialogue has developed on the links between governance and better forest management.

International climate negotiators and national policy-makers have begun to appreciate that REDD+ is not just about counting carbon but, rather, the complex social, ecological and economic relations in the forest areas where that carbon is found. REDD+ has the potential to drastically alter the way the world’s forests are governed. At its core it is a restrictive land-use regulation, and thus it harbours the potential to infringe on local peoples’ rights to access, use and manage the forests on which their livelihoods depend. This concern is all the more pressing given that many countries eligible for World Bank or REDD+ readiness programmes have been deemed ‘fragile states’, with poor governance and little economic growth. Weak institutions, powerful vested interests and pervasive corruption pose acute challenges to efforts to reduce deforestation in these countries.

REDD+ has the potential to improve forest governance through increased funding for governance reforms, greater scrutiny of national forest sectors and the
creation of new opportunities for forest communities to claim their rights from central governments. Although REDD+ is moving towards implementation at the national scale, the cause for optimism should not hinder measures to ensure that REDD+ does not inadvertently weaken local or national governance or exacerbate political and economic inequalities.

The risks of REDD+ should be examined by pursuing two objectives. The first is to assess the status quo of governance in potential REDD+ countries in relation to the governance requirements needed to reduce emissions from deforestation and degradation. The second is to highlight the governance and accountability mechanisms needed to ensure that any REDD+ programme enhances the rights of forest communities and indigenous peoples. The world’s tropical forests are remote, and they have long been poorly governed resource bases for national development where corruption and human rights abuses are commonplace.° REDD+ can change things for the better if it pays adequate attention to the governance issues that plague tropical forests. Otherwise it has the potential to worsen the situation.

**Governance in potential REDD+ countries today**

Aside from some small voluntary carbon market activities and readiness activities, an international REDD+ programme does not exist today. Funds and programmes have been established to prepare a set of countries to eventually participate in REDD+, either by selling carbon credits from verified emissions reductions in carbon markets or through more direct bilateral or multilateral compensation. The most prominent programmes have identified a set of countries — often overlapping — that will be prepared for REDD+ through a variety of technical and political interventions. These countries are mostly found in the tropics. While most of the world’s forest carbon emissions come from just two countries — Indonesia and Brazil — REDD+ proponents argue that, without involving other smaller deforesters such as Liberia and Panama, there is a risk that deforestation will shift from one country to another.°

Examples of weak governance, corruption and rights abuses are not hard to find in potential REDD+ countries and their forests.° National forest agencies, which will be responsible for much of the REDD+ programme implementation, are not immune from such problems. A recent report, for example, uses allegations of financial mismanagement in Indonesia’s Reforestation Fund as a warning.°° Similarly, reports of missing Norwegian bilateral funds granted to Tanzania provide just a hint at the potential for corruption should a massive influx of REDD+ cash occur.°°° More directly related to REDD+, examples in Papua New Guinea (PNG) of
forest owners being conned into selling away their carbon rights, and perceptions of
government collusion with carbon brokers, paint a bleak picture for the future of
REDD+.$^{13}$

To achieve its aims and protect the rights of forest-based populations, REDD+
will require improvements on two levels: national institutional governance and forest
governance.

**Institutional governance**

This relates to political stability, rent-seeking, clear and enforceable property
rights, transparency, contract enforcement and effective judicial systems. These
considerations are particularly important if REDD+ is to be funded through
market- or fund-based financing to compensate for verified emissions reductions
through the issuance and purchase of certified emission reduction (CER) credits.
For example, sellers of credits originating in a country with limited rule of law will
face the challenge of assuring buyers of the existence and persistence of the reductions
purchased on paper. Unfortunately, most tropical forest countries, especially those
with some of the highest deforestation rates, do not score well on relevant governance
parameters.

The series of governance indicators in table 6.2 provides some parameters relevant
to market- and fund-based REDD+ schemes for comparison across primary
emitting countries. Most forest carbon emissions originate from a handful of
countries. According to the best available figures, 61 per cent of all 2005 carbon
emissions from land-use changes and forestry$^{14}$ came from Indonesia and Brazil. The
nine next largest emitters totalled 23 per cent – less than Indonesia alone. While not
all the countries in table 6.2 currently participate in REDD+ programmes, they will
probably participate in REDD’s voluntary carbon market.

A glance at the list of top emitters shows the serious governance challenges they
face. The political context in some of these countries may pose insurmountable
challenges to any new initiative to combat deforestation, let alone one as complicated
as REDD+, with its requirements for new forest-monitoring technologies,
standardized forest carbon inventories and consultations with remote communities.

The countries in table 6.2 generally score poorly on quantitative estimates of the
corruption, transparency, government capacity and business environment:

- Eleven countries fall in the bottom half of TI’s Corruption Perceptions Index, six of
  them in the bottom quartile.
- The countries fare somewhat better in Freedom House’s ranking of political and civil
  liberties, with five in the lower half.
FORESTRY GOVERNANCE

- All but two countries rank above 100 on the World Bank’s ‘Doing business’ ranking of 183 countries, with six in the bottom quartile. According to the World Bank’s ‘Governance indicators’, only Malaysia ranks well on ‘government effectiveness’ and ‘control of corruption’, with three and two countries in the bottom quartile, respectively.
- Eight of the 11 countries received a ‘C’ or ‘D’ rating from the French export credit rating agency Coface.\textsuperscript{15}

From an environmental or climate perspective, these considerations are worrying, because the level of these countries’ institutional capacity, corruption and transparency could potentially prevent the accurate reporting of emissions reductions upon which the REDD+ scheme depends. Thus an independent monitoring system is needed to measure both carbon and non-carbon outcomes of REDD+, as advocated by Global Witness. Additionally, there are doubts about the accuracy of government-reported data in the only existing global database of forest cover, the FAO’s commonly cited Global Forest Resources Assessments.\textsuperscript{16}

These data point out the potential difficulty in establishing, maintaining and monitoring national REDD+ programmes. A number of organizations have already voiced concern over the manner in which national consultations with civil society and indigenous peoples on REDD+ planning have been conducted.\textsuperscript{17} Such critiques highlight the difficulty of implementing REDD+ in countries with a long-standing record of human rights abuse and a disregard for engaging local peoples in natural resource management plans. The fact that governments have been spurred to establish national working groups on REDD+ and attempt consultations can be seen as a positive development, however, insofar as governments are now reflecting on these issues and will probably report their performance for donor scrutiny.

**Forest governance**

This includes the conditions of forest tenure, forest management, land-use planning, and revenues and incentives.\textsuperscript{18} The drivers of deforestation and degradation – mostly logging, agriculture and fire, as well as the interactions between them – are complex and difficult to address effectively through national policies.\textsuperscript{19} Examples from history, however, show that certain basic conditions, such as secure land tenure and devolved management authority to local communities, have led to improvements in forest condition, carbon sequestration and local livelihoods.\textsuperscript{20}

Unfortunately, for most of the world’s forests these basic conditions do not exist. Weak governance affects the poor in particular, making their tenure over land insecure, creating additional costs to access administrative services, undermining systems of justice and dispute resolution and corroding social relations.\textsuperscript{21}
Table 6.2. Governance indicators in key forest-carbon-emitting countries

<table>
<thead>
<tr>
<th>Country</th>
<th>CO2e</th>
<th>Share of world total (%)</th>
<th>Annual change in forest cover (Mha/yr)</th>
<th>Corruption Perceptions Index (1 = most corrupt, 10 = most free)</th>
<th>Combined average rating (1 = free, 7 = worst)</th>
<th>Ease of doing business rating (out of 183)</th>
<th>Government effectiveness</th>
<th>Control of corruption</th>
<th>Country risk rating</th>
<th>Business climate rating</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brazil</td>
<td>1830</td>
<td>34.0</td>
<td>-3.10</td>
<td>3.7</td>
<td>2</td>
<td>129</td>
<td>0.0</td>
<td>0.0</td>
<td>A4</td>
<td>A4</td>
</tr>
<tr>
<td>Indonesia</td>
<td>1459</td>
<td>27.1</td>
<td>-1.87</td>
<td>2.8</td>
<td>2.5</td>
<td>122</td>
<td>-0.3</td>
<td>-0.6</td>
<td>B</td>
<td>C</td>
</tr>
<tr>
<td>Venezuela</td>
<td>187</td>
<td>3.5</td>
<td>-0.29</td>
<td>1.9</td>
<td>4</td>
<td>177</td>
<td>-0.9</td>
<td>-1.1</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>DRC</td>
<td>176</td>
<td>3.3</td>
<td>-0.32</td>
<td>1.7</td>
<td>6</td>
<td>182</td>
<td>-1.3</td>
<td>-1.3</td>
<td>D</td>
<td>D</td>
</tr>
<tr>
<td>Myanmar</td>
<td>158</td>
<td>2.9</td>
<td>-0.47</td>
<td>1.4</td>
<td>7</td>
<td>-</td>
<td>-1.7</td>
<td>-1.7</td>
<td>D</td>
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</tr>
<tr>
<td>Nigeria</td>
<td>158</td>
<td>2.9</td>
<td>-0.41</td>
<td>2.5</td>
<td>4.5</td>
<td>125</td>
<td>-1.0</td>
<td>-0.9</td>
<td>D</td>
<td>D</td>
</tr>
<tr>
<td>Bolivia</td>
<td>139</td>
<td>2.6</td>
<td>-0.27</td>
<td>2.7</td>
<td>3</td>
<td>161</td>
<td>-0.8</td>
<td>-0.5</td>
<td>D</td>
<td>C</td>
</tr>
<tr>
<td>Malaysia</td>
<td>139</td>
<td>2.6</td>
<td>-0.14</td>
<td>4.5</td>
<td>4</td>
<td>23</td>
<td>1.1</td>
<td>0.1</td>
<td>A2</td>
<td>A3</td>
</tr>
<tr>
<td>Zambia</td>
<td>106</td>
<td>2.0</td>
<td>-0.45</td>
<td>3.0</td>
<td>3.0</td>
<td>90</td>
<td>-0.7</td>
<td>-0.5</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>Cambodia</td>
<td>84</td>
<td>1.6</td>
<td>-0.22</td>
<td>2.0</td>
<td>5.5</td>
<td>145</td>
<td>-0.8</td>
<td>-1.1</td>
<td>D</td>
<td>D</td>
</tr>
<tr>
<td>Ecuador</td>
<td>84</td>
<td>1.6</td>
<td>-0.20</td>
<td>2.2</td>
<td>3</td>
<td>138</td>
<td>-1.0</td>
<td>-0.8</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>Mean</td>
<td></td>
<td></td>
<td></td>
<td>2.6</td>
<td>4</td>
<td>129</td>
<td>-0.7</td>
<td>-0.8</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Total | 4520 | 84 |

Notes: TI’s Corruption Perceptions Index measures poll results on the perceived level of corruption in 180 countries. The index is based on a 10-point scale, with 1 being most corrupt, and seeks to illustrate the effects of corruption specifically, apart from political instability and decentralization difficulties. The Freedom House’s ranking of countries is a combined average of scores from a questionnaire on political rights and civil liberties, answered by in situ analysts. Countries are rated in increments of 0.5, with 1 representing the most free and 7 the least. The World Bank’s Doing Business Report 2010 ranks 183 countries in terms of the ease of doing business, taking into account factors such as regulatory burdens, taxes and contract enforcement. The World Bank’s ‘Governance indicators’ compile survey results from businesses, researchers, citizens and non-governmental organizations (NGOs) on the ‘rule of law’ (the perceived degree of confidence that actors have in the laws of society, including property rights regimes, policing, judiciary and prevalence of crime). ‘Control of corruption’ illustrates the perceived extent of patronage, bribery, elite capture and other forms of corruption.

Furthermore, the overwhelming majority of the world’s tropical forests are legally owned by governments, despite the long-standing and legitimate claims of indigenous peoples and local communities, who have only minimal legal authority over managing the forests where they live and on which they depend.22

Latin America has done the most to legally recognize community forest ownership and management, with about 32 per cent of the region’s forests under community and indigenous peoples’ ownership or designated use (figure 6.2). In Asia the figure is about 27 per cent. In Africa, however, nearly 98 per cent of forests are claimed by the state. Moreover, there is a high degree of uncertainty and contestation in each region over statutory and customary ownership rights to forest and forest resources. In most countries the ownership rights to carbon remain unclear, and the creation of a new asset class – forest carbon – is likely to engender even more contestation in the forest landscape.

Figure 6.2 Regional forest tenure distribution, 2008


**Governance requirements: ensuring REDD+ promotes the rights and well-being of forest communities and indigenous peoples**

Effectively reducing emissions from deforestation and forest degradation, and promoting enhanced carbon sequestration capacities in the world’s tropical forests, will require better forest governance and national institutional governance. The funding being touted by REDD+ proponents – US$3.5 billion was committed in
Copenhagen for REDD readiness – presents some hope that the world is serious about tackling deforestation. Nonetheless, there is also cause for concern, given the institutional environment in which this money will be injected. Governance reforms are lengthy processes, and funding increases alone are not adequate to guarantee their success. Without strong coordination and oversight, aid influxes may even exacerbate corruption.  

Basic governance reforms, including establishing a foundation of institutions and systems, are necessary for REDD+ target countries to make the most out of funding without negatively affecting the lives of forest communities and indigenous peoples. Such reforms should include:

- clarifying and securing the customary and statutory rights to land, carbon and forest for communities and indigenous, forest-dependent peoples;
- establishing independent, national and international oversight, recourse and auditing mechanisms to review impacts, realign REDD+ programmes and provide redress when rights are violated;
- directing compensation towards communities that have long depended upon and maintained forests; and
- ensuring that REDD+ programmes do not just monitor carbon but also include a robust measuring, reporting and verification (MRV) system to monitor rights impacts and flows of finances.

Table 6.3 presents some considerations for REDD+ governance at the international, national and local levels. These parameters of good governance must be embedded within a national and local context in order for them to be relevant and effective.

From an optimistic perspective, it is worth noting that the costs of improving forest governance are relatively low compared to projected REDD funding. Recognizing forest tenure rights, for example, while politically strenuous, carries a relatively low direct cost. A 2008 report commissioned by the UK prime minister estimates the governance cost of reducing forest emissions in 25 countries at US$2.3 billion over five years. Merely securing financing does not guarantee results, however. As the report notes, such ambitious global projects ‘have not always been successful… due to too little being spent, poor project design and management, or to lack of political will’.
Conclusion

Where does an examination of governance in REDD+ countries leave us? If one were pessimistic, one would conclude that the governance obstacles to reducing emissions from deforestation and forest degradation – or even just to set up a REDD+ programme – are too great to overcome. The challenges are all the more daunting given the short timeframe in which REDD+ proponents are expecting to disburse fast-start financing: nearly US$3.5 billion from 2010 to 2012.28

On the other hand, some national governments have taken dramatic steps to clarify property rights while making steady, incremental progress in strengthening governance.29 It is important to recognize, given the momentum behind REDD+ and the support it received at the 2009 Copenhagen conference and subsequent inter-ministerial meetings,30 that projects and financing will probably proceed despite governance challenges. This means that the world must act to ensure the money is directed towards the policies and governance reforms necessary to achieve long-term emissions reductions, enhanced sequestration and protection of the rights of forest communities.

Achieving forest carbon emissions reductions will mean realigning forest economies towards more sound governance of resources that includes greater local decision-making authority. Wholesale improvement to national governance is not likely to be the short-term outcome of REDD+ as these changes are likely beyond the scope of REDD+ itself – i.e. functioning court systems and political stability. Forest governance can be improved, though, by seizing this moment to secure the rights and tenure of forest communities, and improving decision-making processes related to forest management and land use.
<table>
<thead>
<tr>
<th>Transparency</th>
<th>Accountability</th>
<th>Equity</th>
<th>Participation</th>
<th>Coordination</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>International REDD+ governance</strong> (e.g. UNFCCC decision-making processes, global carbon market regulatory bodies, multilateral and bilateral funds)</td>
<td>Understandable information on negotiation processes, market regulatory bodies and fund governance is made accessible (e.g. funds allocated/ transferred).</td>
<td>Actions by investors, market regulatory bodies and funds are subject to independent audit, oversight and recourse (e.g. World Bank Inspection Panel).</td>
<td>Responsibilities, risks and benefits of participating in REDD+ programmes and markets are made clear and shared equitably.</td>
<td>Negotiations, market regulatory bodies and funds include effective participation from those affected by REDD+ markets and programmes. Refusing to participate in REDD+ remains an option.</td>
</tr>
<tr>
<td><strong>National</strong> (e.g. national land-use planning decision-making structures, forest agencies, REDD+ working groups)</td>
<td>Understandable information related to land-use policy decisions, participation in REDD+ markets and funds, and REDD+ working group governance is made freely accessible (e.g. funds received/ disbursed).</td>
<td>Actions taken by national decision-makers and REDD+ programmes are subject to independent audit, oversight and recourse (e.g. through national courts or specialized land courts).</td>
<td>Responsibilities, risks and benefits for participating in REDD+ programmes and markets are made clear. Decisions on sharing responsibilities, risks and benefits are made through transparent and participatory processes.</td>
<td>Decision-making processes regarding land use and REDD+ programmes include representation from all sectors of society affected, including marginalized groups, customary authorities and indigenous peoples. Refusing to participate in REDD+ remains an option.</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Market regulations, funds and related readiness activities are coordinated to avoid creating multiple standards for protection of rights and interests of those affected.</td>
</tr>
</tbody>
</table>
Transparency | Accountability | Equity | Participation | Coordination
--- | --- | --- | --- | ---
Local (e.g. local government administration, forest agencies, customary authorities) | Information on decision-making structures and decisions regarding land-use planning and REDD+ and land rights is made available in local languages and proactively disseminated (e.g. funds received). | Local implementation of land-use policies and REDD+ programmes are subject to local oversight and recourse mechanisms where appropriate and linked with national and international recourse mechanisms. | Responsibilities, risks and benefits for participating in REDD+ programmes are made clear to all those potentially affected. Local benefit-sharing mechanisms are developed in transparent and participatory processes. | Decision-making processes regarding land use and REDD+ programmes include representation from all sectors of society affected, including marginalized groups, customary authorities and indigenous peoples. Refusing to participate in REDD+ remains an option. | Local REDD+ actions are coordinated with local and customary authorities to avoid restricting livelihoods and ensure coherence in government policy implementation and respect for traditional/customary decision-making processes.

Table 6.3 Levels and dimensions of good governance for REDD+

Notes

1. Jeffrey Hatcher is global programmes manager and Luke Bailey is senior associate for policy analysis at the Rights and Resources Initiative (RRI), based in Washington, DC.
2. The ‘+’ sign denotes the eligibility of sustainable forest management, afforestation/reforestation, restoration and conservation activities.
4. The term readiness can be loosely defined as the process leading to the point at which a country is deemed (or deems itself) ready to engage in REDD+. The assessment of whether a country is ready for REDD+ can be made against technological, economic, institutional or governance related criteria. Many of the REDD+ programmes operating today are preparing countries to engage in REDD+ by, for example, strengthening the national institutions that will implement REDD+ activities.
7. These are the Forest Carbon Partnership Facility (FCPF), UN-REDD Programme, Forest Investment Program (FIP), Amazon Fund, Congo Basin Forest Fund (CBFF), Norway International Climate and Forest Initiative (NICFI) and Governors’ Climate and Forests (GCF) Task Force.
8. Better coordination of donor efforts is among the goals of the REDD+ Partnership, which was established in May 2010.

9. Current REDD+ country participants of the FCPF are: Argentina, Bolivia, Cameroon, Cambodia, the Central African Republic, Chile, Colombia, the Democratic Republic of the Congo (DRC), the Republic of Congo, Costa Rica, El Salvador, Equatorial Guinea, Ethiopia, Gabon, Ghana, Guatemala, Guyana, Honduras, Indonesia, Kenya, Laos, Liberia, Madagascar, Mexico, Mozambique, Nepal, Nicaragua, Panama, Papua New Guinea (PNG), Paraguay, Peru, Suriname, Tanzania, Thailand, Uganda, Vanuatu, Vietnam. Names in bold, plus the Philippines, the Solomon Islands and Zambia, are also members of UN-REDD. Current FIP recipient countries are: Brazil, the DRC, Indonesia, Morocco, Nepal and Romania. Norway is involved in bilateral programmes with Brazil and Tanzania, and is looking to expand efforts in Indonesia, Guyana, Gabon and PNG, among others. The GCF is a coalition of state governors in the US, Brazil, Indonesia, Mexico and Nigeria pursuing a subnational approach to REDD.


14. Climate Analysis Indicators Tool (CAIT) data provide yearly CO₂ emissions from forestry and land use, showing that the vast majority of these carbon dioxide emissions are from forestry (a small portion of carbon is released by ‘agricultural energy use’ – e.g. tractors). While greenhouse gas emissions from crops and livestock are significant in many countries, they are virtually all methane and nitrous oxide. See cait.wri.org/figures/World-FlowChart.pdf.


FORESTRY GOVERNANCE

24. Global Witness is developing tools to monitor the non-carbon dimensions of REDD+.
27. Ibid.
29. Bolivia, Brazil and Mozambique, for example, have all begun recognizing and clarifying property rights to lands and forests. See William Sunderlin et al., *From Exclusion to Ownership: Challenges and Opportunities in Advancing Forest Tenure Reform* (Washington, DC: RRI, 2008).
6.2.1

Bosawás

The ‘Lung of Central America’ under threat

Ana Murillo Arguello

The natural reserve of Bosawás in Nicaragua is the most extensive forested area north of the Amazon and covers 15.25 per cent of the country. Despite the forest’s natural wealth, the native Miskito and Mayangna inhabitants have been confronted with the destruction of their environment. As a result, Nicaragua has lost 27 per cent of its forest cover in the last 17 years.

The unsustainable exploitation of the forest – including the advancing agricultural frontier, the expansion of animal husbandry and incentives to extract wood indiscriminately – is coupled with the difficulties experienced by the local people in enforcing their rights. The destruction of the forest has affected its inhabitants negatively, effectively keeping them in extreme poverty and exacerbating food and water scarcity. The farmers who live on the borders of the forest zone have begun promoting sustainable resource extraction, agriculture and ecotourism, but there have been few public policies to support those who practice conservation.

By the first half of 2010, however, all reported 23 allegations related to the Bosawás in that year had been resolved by the courts. This shows an improvement in capacity to deal with illegal practices related to the environment, which had been exacerbated by insufficient laws and lack of coordination between the local and central governments.

The degradation of the forests in Nicaragua increases the people’s vulnerability to climate change and natural disasters. The country needs an improved regulatory framework, management capacity, and adequate resources to follow up on the legal claims of the local people. The participation of local actors in these processes is fundamental to ensuring that their rights are upheld.
Notes

1. Ana Murillo Arguello works for Grupo Cívico Ética y Transparencia.
2. The Bosawás was designated a Biosphere Reserve and World Heritage Site by UNESCO in 1997.
6. TI-Nicaragua interview Ana Isabel Sequeira, Fiscal Department of the Public Ministry.
6.3 Governance risks for REDD+

How weak forest carbon accounting can create opportunities for corruption and fraud

Christopher Barr

In the global effort to mitigate climate change, investments aimed at slowing the pace of deforestation and forest degradation, particularly in tropical regions, are believed to be a cost-effective approach to reduce CO₂ emissions. Through the UN-sponsored initiative Reducing Emissions from Deforestation and Forest Degradation (REDD), institutional mechanisms are being designed to provide policy and financial incentives for developing countries to protect standing forests and rehabilitate degraded forests. A version of the programme, known as REDD+, aims to provide further incentives for the conservation and enhancement of carbon stocks.

Significant funds are expected to flow once REDD+ programmes are fully operational – up to US$28 billion per year, to reduce the rate of global deforestation by 50 per cent. An unavoidable challenge for REDD+, however, lies in the fact that some developing countries with the highest rates of deforestation also have high levels of corruption. As described in the preceding sections, weak forest governance in many developing countries has facilitated widespread forest-related corruption and financial fraud, and these in turn are major drivers of illegal and unsustainable forest harvesting.

Accordingly, a number of existential questions for REDD+ must be asked. Will the flow of tens, potentially hundreds, of billions of dollars into tropical forest
countries create new opportunities for corruption and fraud for powerful political and economic actors? If this occurs, will such funding significantly exacerbate the deforestation and forest degradation that the initiative is designed to slow?

REDD+ proponents frequently dismiss such possibilities by emphasizing that the payments are designed to be performance-based. If carbon emissions are not reduced, they argue, the money will not flow. Implicit in such assurances is a twofold assumption: first that REDD+ programmes will have effective institutions for the measuring, reporting and verification (MRV) of forest-based emission reductions and carbon stock enhancements; and, second, that REDD+ payments will be guided by the empirical assessments of such MRV processes. It is important to examine these assumptions critically in order to highlight how potential weaknesses in the MRV process itself could pose corruption and fraud risks for REDD+.

The emerging structure of REDD+ payment schemes

The institutional architecture for REDD+ is still in the design phase and, therefore, evolving. Several different approaches are being considered for providing financial incentives to tropical countries to reduce forest-related carbon emissions and/or to enhance carbon stocks. At the global level, the most significant of these include ‘fund-based’ and ‘market-based’ models.

Fund-based models are designed to channel REDD+ financing to recipient countries and projects through a dedicated fund established by the UNFCCC’s Conference of the Parties (COP). Several alternatives have been proposed for how a COP-mandated fund might be administered, reflecting varying degrees of centralization. A REDD+ fund administered directly by the UNFCCC or a designee could concentrate decision-making at the international level, with a highly centralized secretariat determining how funding is allocated. Under a more decentralized approach, funding procedures could be consolidated at the COP level, but a range of national and international entities could be actively involved in overseeing disbursement and determining the criteria and procedures for performance assessment.

Market-based models are generally designed to link forest-related emissions reductions with the emerging demand for carbon offsets in global carbon markets. Tropical countries would be compensated for reducing forest carbon emissions and/or enhancing carbon stocks relative to a national baseline or reference level. Compensation would be in the form of REDD+ carbon credits, which could, in principle, be traded in either voluntary or formal (including compliance and offset) carbon markets. With the latter being structured around cap-and-trade systems, it is
anticipated that carbon emitters in developed countries would purchase REDD+ carbon credits as one way to offset their own emissions. Proponents of market-based models argue that linking REDD+ to compliance carbon markets would enable REDD forest countries to tap substantially larger and more sustainable sources of financing than most fund-based models, which are likely to depend heavily upon public and private donations.\textsuperscript{10}

It is likely that a future REDD+ payment mechanism will involve both fund- and market-based models, with variations between participating countries. Brazil, for instance, has shown a preference for a fund-based approach, while Indonesia has advocated a market-based model.\textsuperscript{11} Regardless, participating countries have several institutional options through which international REDD+ funding can be channelled:\textsuperscript{12} directly to REDD+ projects managed by public or private sector actors; to national REDD+ funds administered by a government or independent body that would coordinate payment distribution; and/or to national governments in the form of budgetary support.\textsuperscript{13} Some REDD+ countries may select more than one of these options.

### Measuring and verifying forest carbon credits

Under both fund- and market-based models, the vast majority of REDD+ payments are expected to be delivered as compensation for output-based activities—that is, for verified reductions of forest carbon emissions and/or enhancement of carbon stocks.\textsuperscript{14} To function effectively, REDD+ institutions will therefore require reliable tools for measuring such changes and assessing the extent to which they resulted from REDD+-funded activities. Key steps in this process include determining national reference levels, validating project methodologies, and measuring, reporting and verification.

### Reference levels

A national reference level is a projection of a country’s forest-related carbon emissions and removals over a defined period of time, based on documented past and anticipated future levels of deforestation and forest degradation.\textsuperscript{15} It is intended to serve as a baseline against which carbon emissions reductions and/or carbon stock enhancements will be credited under REDD+. Significantly, experts have not agreed on a single methodology for setting national reference levels, and at least as of late 2009 the UNFCCC had offered little guidance.\textsuperscript{16} To a considerable degree national reference levels are politically negotiated, and they are often strongly contested.\textsuperscript{17} Different approaches for calculating reference levels can have far-reaching
implications for how much REDD+ funding a country ultimately may receive.\textsuperscript{18} A reference level based on substantially overestimated historical forest carbon emissions could potentially lead a country to be compensated for emissions reductions greater than those actually achieved.

**Validation**

Proposed projects must undergo a validation process to ensure that they qualify for REDD+ funding, including whether the methodologies meet REDD+ requirements and whether the planned activities are likely to generate the projected emissions reductions and/or carbon stock enhancements.\textsuperscript{19} Critically, validation is also expected to determine whether ‘additionality’ will be achieved – that is, whether the projected reductions or enhancements would be above and beyond those that would have occurred without REDD+ funding.\textsuperscript{20} If it is likely that the project would have been carried out without REDD+ funding, then the benefits are not ‘additional’ and the project would presumably not qualify for funding.

**Measuring, reporting and verification**

National REDD+ programmes are expected to have mechanisms for regularly measuring, reporting and verifying project activities to determine whether the planned carbon benefits are actually being achieved.\textsuperscript{21} MRV will be carried out at multiple scales, ranging from the project to the national level. A key objective of national MRV programmes is ensuring that ‘leakage’ does not occur – that is, the displacement of carbon emissions from REDD+ activity areas to non-REDD+ areas.\textsuperscript{22}

Under guidelines formulated by the Intergovernmental Panel on Climate Change (IPCC), the verification process should measure changes in two key variables: the area of deforestation and forest degradation, and carbon stock densities per unit area.\textsuperscript{23} These measurements can then be used to estimate net carbon emissions and removals from a particular tract of forest during a specified period of time. Deforestation can often be measured effectively using remote sensing with field-based substantiation, or ‘ground-truthing’ to verify the analysis. Measuring forest degradation and carbon stock densities, by contrast, is considerably more difficult, and generally requires much higher levels of data collection on the ground.\textsuperscript{24}

In spite of significant improvements in technology and methodologies, measuring changes in forest carbon often faces significant informational challenges, including:

- a lack of agreement on key definitions – e.g. forest definition and classification of land types;
- a lack of historical and project-scale information – e.g. satellite images, vegetation cover, soil maps, management;
- a lack of information on local drivers of land-use change;
- dispersed and incomparable information;
- inconsistency between the types of measurement and the monitoring methods used; and
- high information requirements because of the numerous, detailed and complex project methodologies.25

**Weak capacity and uncertain political support for MRV**

Despite the central importance of validation and MRV, the vast majority of countries participating in the interim REDD+ Partnership are poorly prepared to measure and verify changes in forest carbon emissions and carbon stocks. A recent review of forest-carbon-monitoring capacity among 99 non-Annex I (developing) countries found that most have limited abilities to estimate greenhouse gas (GHG) emissions and forest loss completely and accurately. Fewer than one-fifth of them have submitted a complete GHG inventory, and only three have a very good capacity to monitor forest area changes and take forest inventories.26

As part of the REDD+ readiness process, bilateral and multilateral donor organizations are working with developing forest countries to build the institutional capacity for national and subnational MRV programmes.27 Such efforts will take time, however, and many REDD+ countries may not have MRV mechanisms capable of verifying compliance-grade credits for at least a decade.28

Often overlooked is the fact that building capacity for forest monitoring and carbon accounting is not simply a technical process. In many contexts it is also a political challenge for government forest management agencies.29 Indeed, the disorganized and highly opaque state of forestry statistics in many REDD+ countries is symptomatic of more fundamental problems with how forests are administered.30 By keeping forest monitoring and reporting activities to a minimum, state forestry bureaucracies can evade accountability for widespread corruption, illegal logging and other governance problems. REDD+ efforts to build capacity for forest carbon monitoring could be undermined by bureaucratic resistance on the part of state forestry institutions.31

In many countries likely to participate in REDD+, it is also conceivable that powerful state elites may seek to control MRV institutions to influence how payments are allocated. Senior political leaders and military officers in timber-rich countries frequently seek to control the institutional mechanisms through which economic rents associated with forests are distributed – a behaviour known as
rent-seizing. By controlling the disbursement of forest rents, for example by distributing timber concessions, they are often able to secure the political support of powerful individuals and institutions both within and outside the state apparatus. To the extent that REDD+ payment schemes generate new opportunities for rent capture, the ability to control MRV decisions would hold considerable strategic significance. Specifically, the ability to influence the validation and verification processes could enable well-placed state elites to channel REDD+ payments to favoured projects, regardless of whether they qualify.

To reduce the risks of biased MRV programmes, REDD+ proponents are considering ways to involve independent third-party auditors in validation and verification – such as creating an international forest-carbon-monitoring body, either as a new entity or under an existing international organization; establishing regional MRV partnerships among forest countries in a shared geographic area; and using independent, private sector carbon-accounting firms.

Each option offers potential benefits for ensuring accurate, objective and reliable MRV processes. None of these approaches is without its own risks, however. In 2008 and 2009, for instance, the UN temporarily suspended two of the world’s leading private sector carbon-accounting agencies – Swiss-based SGS and the Norwegian firm Det Norske Veritas (DNV) – because of inadequate oversight of their audits, and insufficient training and qualifications of their auditing staff. Such concerns underline the need for robust oversight of the carbon-accounting bodies involved in REDD+ project validation and verification.

Corruption and fraud risks of compromised MRV

Some REDD+ countries have histories of weak forest governance, including theft of forestry revenues by corrupt government officials and financial fraud by private sector actors involved in commercial forestry. By paying to reduce forest-related carbon emissions, REDD+ aims to change the sector’s financial incentives in order to generate a new commodity – forest carbon credits – while slowing deforestation and forest degradation. In countries where MRV mechanisms are not fully functional or are politically compromised, however, REDD+ payments may in fact offer incentives for corruption and fraud by government officials and project sponsors seeking to ‘game the system’.

Although REDD+ is still in the planning phase, a growing number of cases suggest how corruption and fraud may undermine forest carbon payment schemes. Some have occurred in countries now undergoing the REDD+ readiness process, while others are associated with Clean Development Mechanism (CDM) projects or
global carbon markets not specifically related to forests. Some of the examples below are also largely speculative, although they are based on illicit practices in other types of commercial forestry activities found in developing countries likely to participate in REDD+. Collectively, they are indicative of how REDD+ may become susceptible to corruption and fraud.

**Inappropriate validation**

It is conceivable that authorized validators could approve projects that should not qualify for REDD+ funding – for example, a project that is unlikely to generate the projected carbon benefits or that cannot demonstrate that the reductions would be ‘additional’. This could result from the project sponsor bribing the validator; the sponsor presenting misleading data or inaccurate statements; a conflict of interest on the validator’s part; the technical incompetence of those assessing the proposal; or some combination of these.

Numerous examples of inappropriate validations of CDM projects have been documented, offering important lessons for REDD+. A UN official estimated in 2007 that 15–20 per cent of offset credits have been issued inappropriately due to inadequate findings of additionality. ‘Validations are an open flame in the system,’ the official said. ‘[The validators] began rubber-stamping what developers were putting into the projects. Then once the projects are up and running — well, it’s too late’.

Another critic, estimating that questionable CDM emissions reduction credits may be as high as two-thirds, stated: ‘Judging additionality has turned out to be unknowable and unworkable… One commonly used “scam” is to make a proposed project look like an economic loser on its own, but a profitable earner once offset income is factored in’.

**Overestimation of carbon benefits**

Once a REDD+ project is under way there may be strong incentives for MRV participants to overestimate carbon emissions reductions and/or carbon stock enhancements. When project sponsors include state elites or their business partners, national MRV agencies or individual staff members may be subject to political pressure or be offered bribes to ‘verify’ carbon benefits that are higher than a project actually achieves. Project implementers have an interest in both overstating avoided emissions and understating problems with the permanence of carbon stocks. At least over the short term, government carbon-accounting agencies may also find it financially rewarding to over-report emissions reductions and carbon stock enhancements so as to secure higher REDD+ payments.
A recent review of carbon accounting under the CDM also highlights conflicts of interest between verifiers and project sponsors, stating that verifiers and validators are paid by project developers and often have to ‘compete vigorously to win business’. This suggests that verification agencies could have a direct, if unstated, financial incentive to assess projects favourably. If it is too harsh in its assessments, a verifier may find it difficult to secure future contracts.

A project’s carbon benefits can be overestimated in any number of ways. Most blatantly, data can be intentionally manipulated or misreported. More subtly, verifiers can skew their analyses through their selection of methodologies for measuring key variables; the amount of ground-truthing conducted; the selection of sites for field-based data collection; and the assumptions factored into their calculations. For example, estimates of how much carbon will be sequestered by an afforestation project can vary greatly, depending on assumptions about planting densities, annual growth rates, carbon densities of the species used, seedling mortality, site management practices and other variables.

Verification of fictitious projects

In some countries it is conceivable that MRV governance weaknesses could result in the ‘verification’ of REDD+ projects that are never actually carried out. Most directly, validation and verification agencies could be persuaded – through political pressure or bribery, perhaps – to sign off on projects that do not even exist.

Hypothetically, unscrupulous project developers or government officials could seek REDD+ payments for forest areas that, in fact, are under no immediate threat of deforestation or degradation. To the extent that they are able to tell a convincing (if misleading) story, these fictitious projects may be difficult to distinguish from legitimate REDD+ projects. Even if field visits are made, the forests could be shown to remain standing over the course of the project period, with carbon emissions presumably averted. This seemingly successful outcome would then be falsely attributed to REDD+ interventions.

Although MRV systems are presumably being designed to inhibit such blatant cases of fraud, the funding of fictitious projects in forestry and other sectors is not uncommon in some countries expected to play a prominent role in REDD+. In Indonesia there have been numerous documented cases of the government’s Reforestation Fund financing plantation and forest rehabilitation projects that existed only on paper. To a significant degree, this has been possible because the programme has been administered with limited transparency in the use of funds and very little monitoring of project sites. Similarly, many REDD+ projects are likely to be situated in remote sites where external scrutiny is minimal.
Double-counting and fraudulent trade of carbon credits

With the rapid growth of global carbon markets, commercial fraud in the trading of carbon credits has emerged as a serious crime. In some instances unscrupulous brokers are suspected to have sold fictitious credits for carbon projects that do not actually exist. Companies may have also sold the same credits (often for projects that do exist) to multiple buyers – a practice known as ‘double-counting’. Such practices are believed to be particularly prevalent in voluntary carbon markets, as these are poorly regulated and transactions frequently involve little more than an agreement between buyers and sellers.

One of the main reasons that carbon markets are vulnerable to fraudulent trading practices is that the commodity being traded – the carbon credit – is intangible and poorly understood by many buyers. The complexity of carbon offset markets created under the Kyoto Protocol has been so characterized:

\[\text{Carbon offsets... are unlike any securities ever created... Unlike traditional commodities, which sometime during the course of their market exchange must be delivered to someone in physical form, the carbon market is based on the lack of delivery of an invisible substance to no one.}\]

Within this context, carbon buyers depend heavily on assurances from brokers and project developers that the credits they are purchasing come from legitimate projects. Brokers, in turn, depend heavily on the credibility of the validation and verification processes to determine that these projects have reduced emissions effectively. This dependence on multiple intermediaries often makes it difficult for buyers to know exactly what they are purchasing, thereby making the market ripe for fraud. As one hedge fund manager noted, ‘There are plenty of carbon cowboys out there, looking to make a quick buck.’

Anticipating such problems, clearly, proponents of REDD+ have advocated the creation of a national register of forest carbon credits for each country participating in REDD+. A similar register of credits, the UN’s International Transaction Log, was established under the Clean Development Mechanism to track the purchase or sale of each credit issued. Significantly, when credits are purchased as carbon offsets they are then supposed to be ‘retired’ from the registry so they cannot be sold again. It is not yet clear what safeguards will exist to ensure that REDD+ credits will not be sold in voluntary markets once they are listed in the registry and will, in fact, be retired when they are purchased as offsets.
Misappropriation of carbon rights

In a growing list of countries, forest-dependent communities are becoming victims of carbon-related fraud. Anticipating the considerable profits to be made from forest carbon once REDD+ is fully under way, carbon brokers and project developers have moved aggressively to secure the carbon rights for large tracts of tropical forest. Often working closely with government officials, they have frequently negotiated contracts allowing them to sell the carbon sequestered in forests that are owned by local communities.

Representatives of forest peoples’ organizations have raised concerns that it is common for these negotiations not to be conducted in a free and open manner, and that the significant disparities of information and power can lead to the fraudulent misappropriation of local landowners’ carbon rights. In some instances, project developers and government officials have allegedly made false or misleading claims in order to secure carbon rights on terms that are highly unfavourable to local stakeholders.

‘Permanence’ risks and the securitization of forest carbon credits

A central challenge for REDD+ lies in the risk that forest carbon emissions reductions may not be permanent. Indeed, there is a very real possibility that carbon benefits achieved by a particular REDD+ project could be reversed if the site is degraded or deforested after verification. This could happen for any number of reasons, including adverse natural causes – e.g. drought, pests, fire; a failure on the part of project sponsors to maintain forest cover; encroachment from other stakeholders; policy changes encouraging the conversion of the site to another land use; or the detrimental effects of climate change.

The risks of non-permanence become especially problematic for REDD+ credits that are traded in carbon markets. Assuming that high standards for verification are met, forest carbon credits are expected to become fungible with mitigation credits and allowance units from other sectors once they enter the market. This becomes particularly important if REDD+ credits are used as offsets for emissions in other sectors. As one analyst explained:

*When you claim an offset and it doesn’t work, the climate is screwed twice over – first because the same amount of forest has been cut down after all, and second because a huge amount of additional warming gases has been pumped into the atmosphere on the assumption that the gases will be locked away by the now-dead trees. So the offset hasn’t prevented emissions – it [has] doubled them.*
From a commercial perspective as well, it is unlikely that carbon offset markets will work efficiently unless buyers have a high level of confidence that the credits they purchase will retain their value over time. If non-permanence is perceived to be a significant risk for credits generated under REDD+, it can be anticipated that buyers will shift to other sectors to purchase compliance-grade offsets.

To manage the commercial risks associated with non-permanence, REDD+ planners are considering various liability mechanisms, including strategies through which these risks can be securitized. Options range from issuing credits for more limited periods and holding a portion of project credits in escrow, on the one hand, to various forms of risk pooling, insurance, and shared liability between developed and developing countries, on the other. By establishing liability for forest carbon emissions, these options will essentially determine who will be responsible for paying compensation to whom in the event that emissions reductions are reversed.

Introducing liability mechanisms into REDD+ could bring with them a certain degree of moral hazard, however. Indeed, to the extent that project owners are aware that the long-term success of their projects is ensured, they may have a perverse incentive to minimize the resources they commit to managing the sites – particularly if substantial portions of the payments are made early in the crediting period. In some cases, project sponsors could walk away from their obligations altogether if this would be more profitable than managing them beyond the initial verification.

Given the generally weak enforcement of commercial and forestry laws in many countries likely to participate in REDD+, it can further be anticipated that national governments may be required to provide guarantees that project owners will fulfil their agreements. If project owners with permanent credits fail to meet their obligations or disappear, the ultimate liability will probably revert to the government of the selling country. In such circumstances, private risk will effectively be assumed by public institutions – a situation ripe for corruption and fraud. Project owners with close ties to state elites may be able to exploit such arrangements to maximize their profits, while transferring liabilities or losses to the government.

More generally, creating new forms of financial securities to address ‘permanence’ risks related to REDD+, as well as emission credits from other sectors, raises fundamental concerns about systemic weaknesses in the global carbon trade. Indeed, a growing number of analysts are questioning whether the world’s rapidly expanding markets for carbon credits may be yet another financial bubble, which at some point is bound to burst. The parallels with the recent US housing bubble, which was catalysed by the emergence of exotic financial instruments, are difficult to miss.

In simple terms, carbon credits are a new type of derivatives contract, in which a supplier agrees to deliver a commodity (carbon emissions reductions) at an agreed
point in the future. By packaging the risks associated with carbon credits into novel and complex financial securities, however, the institutions involved are not only spreading these risks among a much larger group of actors but, quite possibly, amplifying these risks as well.\textsuperscript{65}

With all credits generated through emissions reductions, the value of the asset is very much contingent on the reliability of validation and verification. Market actors will face particular challenges determining the value of credits generated under REDD+: most project locations are remote; MRV processes in many developing countries are likely to be weak and politically compromised; and the permanence of forest carbon emissions reductions is difficult to ensure. Buyers of securities backed by forest carbon credits may have few available tools to know what they are really worth.\textsuperscript{66}

Taken together, these factors should raise red flags as to the possibility of financial fraud and systemic risk. In the absence of transparency and effective regulation, there is a very real chance that many investors could end up owning assets with an actual worth that is much less than they assume. Market actors who know how to ‘game the system’ are likely to make big profits, while most others suffer substantial losses. Moreover, just as the recent subprime market in housing triggered a financial crisis of global proportions, so too could a subprime market in carbon – with enormous implications for life on this planet.

Notes
1. Christopher Barr is director of Woods & Wayside International and a former senior scientist at the Center for International Forestry Research (CIFOR).
5. Forest-related carbon credits are already being issued under the UN-sponsored Clean Development Mechanism and are currently traded in voluntary carbon markets. The failure of the international community to reach a legally binding agreement on REDD+ at the 15th Conference of the Parties (COP 15) in Copenhagen in December 2009 means that negotiations over the structure are expected to continue beyond COP 16, held in Cancún, Mexico, in November/December 2010. In May 2010, however, at the Oslo Climate and Forest Conference, some 58 nations agreed to establish an interim REDD+ Partnership, in which partner countries collaborate on REDD+ activities within a voluntary, non-legally binding framework.

7. Ibid. Such a COP-mandated fund may be initiated specifically to support REDD+ activities, or it may be linked to a broader mechanism to finance climate change mitigation.

8. Ibid.

9. Ibid.

10. Ibid.


14. According to the UNFCCC guidelines, REDD+ payments may also be made for capacity-building and readiness activities, and for policies and measures aimed at addressing the drivers of forest carbon change. See Vatn and Angelsen (2009).


23. Global Observation of Forest and Land Cover Dynamics (GOFC-GOLD), *A Sourcebook of Methods and Procedures for Monitoring and Reporting Anthropogenic Greenhouse Gas Emissions and Removals Caused by Deforestation, Gains and Losses of Carbon Stocks in Forests Remaining Forests, and Forestation* (Ottawa: Natural Resources Canada, 2008). If the aim is to estimate the net carbon emissions associated with land-use change (i.e. not only the change in forest condition), the level of emissions associated with the new land use must also be measured. As Wertz-Kanounnikoff and Verchot (2009) note, emission levels can vary considerably depending on the specific type of change: converting tropical forest to soybean, maize or rice can produce 60 per cent more emissions than converting to oil palm.


30. Emily Harwell, ‘*Wild Money*: The Human Rights Consequences of Illegal Logging and Corruption in Indonesia’s Forestry Sector’ (New York: Human Rights Watch, 2009). A recent CIFOR report on Indonesia’s Reforestation Fund describes this dynamic in terms that could apply to many other forest countries as well: ‘Throughout the [Soeharto era] (and, in many respects, continuing since then), data collection and record-keeping associated with each stage of commercial timber extraction in Indonesia – from forest inventories, for instance, to harvest planning, timber production reports, forest royalty payments, industrial wood supply plans and forest regeneration monitoring – have been poorly organized. The very limited availability of reliable information has made it extremely difficult for either external observers or stakeholders within the sector to obtain a clear understanding of what is really happening to the nation’s forest resources. In this way, the generally low quality of forest record-keeping has played a critical role in enabling high levels of illegal activity to occur within the sector.’ Christopher Barr et al., *Financial Governance and Indonesia’s Reforestation Fund during the Soeharto and Post-Soeharto Periods, 1989–2009: A Political Economic Analysis of Lessons for REDD+*, Occasional Paper no. 52 (Bogor, Indonesia: CIFOR, 2010).


34. One example of such a regional partnership is the Central African Forest Watchdog, now being formed by members of the Central African Forest Commission, including Cameroon, the Democratic Republic of the Congo (DRC), the Republic of Congo, Equatorial Guinea and Gabon; Wertz-Kanounnikoff and Verchot (2009).


37. Ibid. Investigative journalist Mark Schapiro argues that these suspensions, however muscular they may seem, in fact underscore the limits of UN oversight of the ‘designated operational entities’ (DOEs) it has deputized to validate and verify carbon emission reduction projects: ‘The only mechanism the UN has for evaluating its DOEs is the evidence they themselves create and present: the validation reports they write and the data they gather onsite. When the UN does spot checks, as it did with DNV (Det Norske Veritas) and SGS, it performs them in
the offices of the validators, not in the field. The increasingly complex and far-flung projects, with developers dredging up thousands of claimed reductions in remote areas all around the world, already far outstrip the UN’s ability to police them adequately’.


40. Ibid.


43. Although such practices may be difficult to sustain – and, indeed, could result in the interruption of REDD+ payments to these jurisdictions if they are exposed – state actors might have an incentive to maximize resource revenues in the short term because of uncertainties over how long they will remain in office. See Ross (2001).

44. Shapiro (2010). In some cases the conflict of interest between verifiers and project developers may be even more direct: ‘In this highly specialized new industry, perhaps a thousand people really understand how onsite CDM projects work … It is not uncommon for validators and verifiers to cross over to the far more lucrative business of developing carbon projects themselves – and then requesting audits from their former colleagues.’


50. Ibid.

51. Shapiro (2010).

52. Ibid.


54. Streck et al. (2009).


58. Ibid.
60. Dutschke (2008).
61. Ibid.
63. Ibid., p. 80.
65. Ibid.
6.3.1 Hypothetical offsets

Carbon trading and land rights in Papua New Guinea

Sarah Dix

Papua New Guinea (PNG) has the world’s third largest rainforest, and the government has shown considerable interest in turning the asset into carbon-trading revenue within the framework of the Reducing Emissions from Deforestation and Forest Degradation (REDD) programme. The paucity of legislation, controversy surrounding the institutional framework and the complexity of dealing with literally thousands of customary landowners pose significant management and governance challenges, however.1

In March 2008 the government signed an agreement with Australia in which Australia undertook to ‘cooperate on Reducing Emissions from Deforestation and Forest Degradation (REDD), and assist Papua New Guinea to participate in future international carbon markets’, as well as to engage in a ‘strategic policy dialogue on climate change.’2 In June 2009 the Australia–PNG Forestry Memorandum of Understanding was signed, paving the way for greater cooperation in the forest sector.

Despite these agreements, as of mid-2009 there was no domestic policy, or specific legislation on carbon trading in PNG, however.3 Several REDD strategic plans had been drafted, but none had received the overall endorsement of the government; notably the Draft Forestry and Climate Change Policy Framework for Action prepared by the National Forest Authority, and the interim REDD strategy drafted by the Office for Climate Change and Environmental Sustainability (OCCES). The OCCES was created in 2008 under the Prime Minister’s Office, primarily with a view to managing the funds expected from REDD.4 It has been criticized by the public on many fronts.
Key challenges for REDD in PNG

In 2009 the OCCES issued certificates for at least 40 future REDD credits for 1 million tonnes of carbon each. One of the projects is in the 800,000 hectares (ha) of virgin rainforest in Kamula Duso, which is embroiled in a protracted legal battle over land ownership, and until this is settled in the courts ‘nobody is supposed to touch it’.

There are allegations that this is in violation of current law and the constitution, in effect entailing the deprivation of the property and carbon rights of the customary owners of the land. In response, the OCCES has claimed that, because Forest Management Agreements (FMAs) or logging concessions had been acquired by the state in these areas, they have the right to sell the carbon. Although it is true that the Forestry Act does not prohibit FMAs from being used for other purposes, they have only previously been used by the state for logging, and the existing FMAs, under which the REDD credits were issued, made no reference to carbon.

Furthermore, the Forestry Act and forestry policy currently determine the shares of revenue from the forests in PNG. According to one estimate, the timber royalty is generally distributed between landowners and government at a 3:1 ratio. In the case of carbon trade, it is unclear whether landowners will benefit similarly. Environmental groups are concerned that most of the carbon trade money will be used up in the running of OCCES and paying middlemen to do transactions on behalf of landowners. If the high revenues expected from REDD are not managed transparently and with stakeholder oversight, there are high risks that the forest communities will see little of the REDD benefits.

Notes

7. Ibid.
8. The PNG constitution’s fourth goal is ‘to ensure that the forest resources of the country are used and replenished for the collective benefit of all Papua New Guineans now and for future generations’.


6.3.2

Is Norway rocking the REDD boat?

Manoj Nadkarni

In the midst of the seesawing Reducing Emissions from Deforestation and Forest Degradation (REDD) negotiations and country positions, REDD funds are beginning to flow. In addition to UN and World Bank funds, there are bilateral financial agreements too. Chief among these is the agreement signed in May 2010 between Norway and Indonesia. Under the US$1 billion deal, Indonesia, among other activities, has pledged to stop issuing new permits to exploit natural forests and carbon peat land areas.\(^2\) Forest civil society organizations, both globally and in Indonesia, claim that this is a game changer.

It could be said that this pre-emptive arrangement – before any global REDD mechanisms have been agreed – is a positive step, in as much as it ups the pace and shows that some countries have faith in REDD and want to see it work. On the other hand, though, there is serious disquiet about the deal. At one level this uneasiness stems from the belief that REDD mechanisms should be based on global consensus and not bilateral agreements, and the Norwegian move may undermine United Nations Framework Convention on Climate Change (UNFCCC) processes. Another, perhaps more immediate concern is the capacity of Indonesia's forestry and other ministries to manage the US$1 billion under the agreement.

Indonesia does not have the cleanest track record when it comes to managing its forests. For example, auditors found that the country’s Reforestation Fund, managed by the Department of Forestry, had lost US$5.25 billion between 1994 and 1998, due to ‘systematic financial mismanagement and fraud’.\(^3\) Furthermore, Wandojo Siswanto, a leading Indonesian climate negotiator at Copenhagen and a key architect of the Indonesia REDD programme, has also
been subject to allegations of corruption by Indonesia’s anti-corruption agency.\footnote{manoj nadkarni manages the forest governance integrity programme at transparency international.}

In 2008 Siswanto admitted taking Indonesian rupiah (Rp) 50 million (approximately US$4600) ‘as a payoff for favouritism in awarding tenders’.\footnote{jakarta post (indonesia), ‘government may name local firm as fund manager’, 16 august 2010.}

Another interesting factor is the announcement that Indonesia is planning to set up a special agency to coordinate REDD activities and manage the Norwegian funds. This agency will bypass the forestry ministry and report directly to the president, Susilo Bambang Yudhoyono.\footnote{jakarta post (indonesia), ‘bribes went to forestry ministry officials: trial witness’, 31 october 2008.} This may be a welcome move, but at the same time it may have the effect of concentrating power in the hands of a few officials and lead to overlap in jurisdiction, therefore making decision-making more complicated and bureaucratic. These are all warning signs as far as corruption risks are concerned.

President Yudhoyono suggested in April that an illegal logging mafia was responsible for much of the deforestation in Indonesia, and created a Judicial Mafia Task Force to examine the illegal logging, but the task force itself has come under criticism for alleged conflict of interest issues among its members.\footnote{indonesia today, ‘judicial mafia eradication task force under pressure’, 2 august 2010.}

Notes

1. Manoj Nadkarni manages the Forest Governance Integrity Programme at Transparency International.
4. Ibid.