Proceedings of the International Workshop on

Reforming Forest Fiscal Systems to Promote Poverty Reduction, and Sustainable Forest Management

October 19–21, 2003
World Bank, Washington, D.C.
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**Sponsored by:** the United Kingdom’s Department for International Development (DFID), German Technical Cooperation (GTZ), the Program on Forests (PROFOR) and the World Bank Institute (WBI).

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ACKNOWLEDGEMENTS

The Workshop proceedings were possible thanks to the contributions of the German Technical Cooperation (GTZ), the Program on Forests (PROFOR), UK Department for International Development (DFID), and the World Bank Institute (WBI). DFID’s financial support towards the editing, translation, printing and distribution of this publication is especially appreciated.

The efforts of country teams responsible for providing the country background papers and assisting with editorial queries is acknowledged. Others who have contributed significantly to the preparation of the proceedings are: Adriana Bianchi (WBI), James Douglas (World Bank Forests Team), Nalin Kishor (World Bank Forests Team), Tapani Oksanen (Indufor Oy), and Paul Steele (DFID). A special acknowledgement to Laura Ivers (PROFOR) for overseeing and managing the production of the proceedings.
INTRODUCTION

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Forests provide multiple benefits such as goods and services important to people’s livelihoods, economic growth, foreign exchange earnings, and environmental services. The range of actors involved in the production and consumption of forest-based goods and services include governments, private industry, local communities, individual forest owners and their associations, and nongovernmental organizations. But too often the state formally manages, regulates, and prices these forests as an undervalued capital resource subject to the control of certain politically powerful groups and individuals. The design of instruments to implement forestry policy, including forest fiscal systems, consequently needs to take into account the multiple roles involved in forestry and the political process of directing toward the same overall goals a large number of actors with diverse and sometimes conflicting objectives and vested interests.

Sustainable forest management has for a long time been the primary goal of forestry policies. The development and use of economic and policy instruments such as forest revenue-collection systems to increase rent capture has been recognized in the international dialogue about forestry as key to promoting sustainable forest management, and several of the proposals of the Intergovernmental Panel on Forests, Intergovernmental Forum on Forests focus on this issue. With the adoption of the Millennium Development Goals, the importance of maximizing the contribution of the forestry sector to poverty reduction is increasingly recognized as an important corollary objective. Because of the relative failure of the forestry sector to contribute effectively to poverty-related development processes, increasing attention is being given to issues of governance and policies, including key fiscal policies, which critically determine how (and in whose interests) forests are managed and used.

Forest fiscal systems play a vital role in capturing the full value of forestry goods and services and in ensuring that they are effectively distributed in a way that promotes the sustainable management of forestry resources while contributing toward broader societal objectives such as poverty reduction and economic growth. A recent World Bank assessment estimated that losses from failure to collect taxes and royalties from legal forest operations amount to some US$5 billion per year, more than three times the amount of overseas development assistance (ODA) financing for sustainable forest management. This lost revenue may arise from illegal practices, corruption, and weak government capacity to collect, enforce, and monitor forestry tax collection—often in remote rural areas. In addition to being a missed opportunity for financing sustainable forest management, this represents a tremendous lost opportunity for financing poverty reduction programs at different levels.
Pressures leading to the unsustainable use of forests can come from several different sources. In many developing countries demographic factors will inevitably lead to loss of forests in the coming decades. In the broader context of poverty reduction, this may sometimes be desirable as forests are converted to other land uses to meet the needs of growing populations and economies. When this conversion is managed in a way that meets basic sustainability requirements, it can represent the transformation of one form of capital into another, with a potentially positive impact on poverty reduction. The evidence from many parts of the world, however, reveals the loss or degradation of forestry resources at an unsustainable rate with little return on growth or poverty eradication. Appropriately designed forest fiscal systems can also contribute to preventing unsustainable or uneconomical change in land use by ensuring that the full value of the resource is appreciated and captured by those who influence forest conversion at different levels of decision-making, from local communities to national parliaments.

A domestic forest processing capacity that far outstrips the ability of domestic forests to supply timber on a sustainable basis creates another important pressure for resource overexploitation. This overcapacity, combined with weak enforcement and poor governance, promotes illegal logging, corruption, and unsustainable harvesting of forests. Three of the country discussions—Cameroon, Ghana, and Indonesia—highlight the serious problem of overcapacity and cite reform of fiscal policies as a key measure to address the problem.

Forest fiscal systems, together with resource tenure and security, set the fundamental parameters of the private sector’s utilization of an often publicly owned asset. This is becoming increasingly important as the role of the private sector (including companies, communities, and individual forest owners) as managers and users of forests is rapidly expanding in many countries through devolution of tenure rights and establishment of different forms of public–private partnerships. These fiscal systems comprise concession fees and royalties for both industrial and community forestry concessions, other forest-related taxes and fees, export duties and fees, and any exemptions and financial incentives given to forest managers and users. Equally important is the distribution and use of the revenues collected. Experience shows that a well-designed and effectively implemented forest fiscal system, particularly one emphasizing incentives to sustainable forest management and investment in value-added processing industries, can be a much more effective instrument to increase the forestry sector’s contribution to growth and development than a narrow regulatory-based approach.

An active debate on concession policies and forest fiscal systems has taken place for a number of years. Several countries, encompassing a diverse range of forest types and associated industries, are implementing or considering new approaches to allocate rights to utilize forests, often with the support of the international community. Although each of these countries’ situations are different, in all cases the objective is to identify practical ways to use forests sustainably and make a more positive contribution to national poverty reduction objectives (as defined in Poverty Reduction Strategy processes or similar policy statements) through stimulating growth and providing regular and en-
enhanced revenue flows to governments. This workshop was designed to contribute to the learning process among a selected group of tropical countries that are actively trying to implement forestry policies to achieve sustainable forest management where the forestry sector could potentially have a significant impact on poverty reduction. The workshop on which this report is based, “Reforms of Forest Fiscal Systems to Promote Growth, Poverty Reduction, and Sustainable Forest Management,” focused especially on the politics of the reform process, taking into account situations of vested interest, corruption and poor governance, and weak institutional structures.

The Workshop

Objectives

The workshop had the following four objectives:

1. Engage key policymakers in selected countries to review the experience of forest fiscal reforms.
2. Share lessons learned on emerging best practice and define strategies to move from current policies to best practice.
3. Define concrete steps to move forward the forest fiscal reform process in the participating countries.
4. Disseminate the results of this experience to other countries and stakeholders.

Scope and Themes

As indicated by its title, the workshop took a broad approach to the discussion of forest fiscal reforms. In addition to economic efficiency (maximum rent collection), fiscal instruments were expected to serve at least the following broader objectives:

- Promote sustainable forest management, that is, provide an incentive for the different types of forest managers (individuals, communities, industry) to manage forests wisely and without depleting the resource base.
- Promote other objectives defined in the forest policy, such as devolution of the forest resources to local communities, increased participation of the private sector as custodians of the forests, provision of forestry goods, and benefits for the rural populations.
- Contribute to poverty reduction, emphasizing equity, attention to specific groups (such as the rural poor), and gender issues.
- Promote good governance, emphasising, for instance, decentralization, accountability, and transparency.
- Advance environmental objectives related to natural resource utilization and conservation in general.

Based on this broad interpretation of the scope of discussions on forest fiscal systems, the following three concrete themes, each with a set of leading questions, were identified to guide the discussions during the workshop:
1. **How do we define the mix of fiscal instruments and set the right levels?**
   - What is the right mix of instruments that meets the basic criteria of economic efficiency, is administratively feasible (in terms of revenue collection and use, reduced corruption, and monitoring and control), and supports broader social and environmental objectives?
   - What is the most appropriate basis (area, volume) and mechanism (administrative, market based) for determining forest-related fees and other fiscal instruments and their right levels?
   - What provisions can or should be made to introduce specific incentives into the forest fiscal system—for example, sustainable forest management and other identified policy objectives, such as poverty reduction, good governance, and environmental conservation?
   - How can we minimize inconsistencies between the different instruments and mechanisms?

2. **How do we use the revenues raised?**
   - How should the collected revenue be used and shared among different stakeholders and purposes at different levels to support the objectives established?
     - Allocate all revenue through the central government budget versus more decentralized structures.
     - Share revenue among communities, local government, and central government.
     - Earmark revenue for specific uses such as monitoring and law enforcement.
     - What are the pros and cons of different arrangements?

3. **How should we manage the politics of the fiscal reform process?**
   - What processes are used to define and implement appropriate forest fiscal systems, and how do we identify who should participate?
   - How do we identify “champions,” build coalitions, and sequence reforms to overcome private sector and political vested interests?

**Participants and Agenda**

Experts from seven countries representing the major tropical forest regions of the world participated in the workshop: Cambodia and Indonesia, Cameroon and Ghana, and Brazil, Honduras, and Nicaragua. The participants (Annex 1) were policymakers representing the ministry responsible for the forestry sector, the Ministry of Finance, private sector, and civil society. This balanced representation of different policy-level actors was considered important for an informed discussion as well as the possibility of defining and implementing concrete steps to be taken at the country level as a follow-up to the workshop. In addition, a number of representatives of donor and international agencies and nongovernmental organizations participated as observers.

Prior to the workshop all country teams prepared background papers and presentations on their experience in forest fiscal reforms, including an assessment of the chal-
challenges of implementation and areas in which further fiscal reforms are needed. Chapters 1–5 represent five of these background papers.

The agenda of the workshop (Annex 2) began with the presentations of the background papers, followed by breakout group discussions on the three themes identified above. As a final step, the country teams agreed on the next steps to be taken in the respective countries as a follow-up to the workshop. The discussions during the workshop emphasized lessons learned among the participants and an exchange of experiences within an informal group of experts. At the end of the workshop, the observers were given an opportunity to express their views. The workshop ended with a discussion on the next steps to be taken at the international level to move forward the discussion on forest fiscal systems. The aide-mémoire (Chapter 6) provides an overview of workshop discussions.

Next Steps
Building on the dialogue begun at the workshop, an informal learning group will continue to share members’ experiences with forest fiscal reform processes. The Program on Forests (PROFOR) will support continued exchange by providing a space to post and share documents on its Web site (http://www.profor.info). The experiences and lessons learned from the group will be communicated to a broader audience, including as the fourth session of the United Nations Forum on Forests in May 2004.

End Notes
CHAPTER 1: CAMBODIA BACKGROUND PAPER

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Improved Forestry Management and Use

The forestry sector contributes approximately 5 percent to gross domestic product with the potential for expansion. Forestry management reform has been implemented by the Royal Government of Cambodia (RGC) to respond to the need for sustainable management of forest resources. A nationwide, participatory process involving many stakeholders has produced a draft subdecree on community forestry. This action has enhanced local community participation in forest management decision-making processes, facilitating the initial steps in the development of a forest policy statement and restructuring of the Forest Administration undertaken by the Department of Forestry and Wildlife of the Ministry of Agriculture, Forestry, and Fisheries (DFW/MAFF). This provides the potential for better support to the forest development community.

The RGC is now focusing on enforcing the forestry law, including procedures, forest demarcation, elimination of illegal logging, and enlargement of natural forest conservation areas for eco-tourism. These actions will ultimately stabilize the annual forest revenue stream received by the RGC at a level compatible with long-term sustainable forest resource management. The RGC has achieved significant progress in forest concessions management to ensure the sustainable management of forest resources. Further improvement is required, however, to bring such management up to international
standards. The RGC has taken aggressive steps toward promoting conservation, including the suspension of logging activities. Further steps are planned to promote good governance and transparency in the forestry sector.

The RGC is currently reviewing the status and system of forest concessions and has already taken action on the most important issues. Local governments and nongovernmental organizations maintain a continuous dialogue to address the impact of forest policies on the local communities and the poor. Local communities will be empowered to participate in the community forestry programs. Specific policies to support community forestry management will be established in all forest areas. Local participation can serve as an independent monitoring mechanism in forestry issues.

The sustainable management of forest will require careful classification of forest for alternative use, such as nontimber forest products (NTFP) and timber. To improve the present concession system, the development of sustainable forest management plans, including an Environmental and Social Impact Assessment, has to be made transparent. Stakeholder participation also needs to increase. The forestry law will be reviewed as information about its effectiveness and implementation is gathered. The system of fee and permits on NTPFs will also be reviewed in consultation with local user groups. Moreover, efforts should be made to remove barriers to marketing NTFPs, especially resin, since NTFPs can be harvested without negatively affecting the forest and are of great importance to the rural household economy.

To achieve these strategic objectives and strategies, the MAFF has determined to do the following: (a) revise existing legislation and formulate policies to ensure benefits to small-scale, poor farmers (for example, subdecrees on community forestry, community fisheries, and so forth) and to respond to emergencies resulting from natural hazards that reflect the current situation; (b) promote agroprocessing industry and agricultural marketing by establishing adequate legislation, policies, plans and programs; (c) strengthen institutional capacity and arrangement by establishing and providing a well-targeted and comprehensive capacity-building program, based on training needs analysis, for all relevant stakeholders; (d) strengthen agricultural extension activities by developing a program of rural education in agriculture for Cambodia’s population, which would aim especially at the rural youth; (e) extend support for livestock production by developing appropriate veterinary and animal production technologies with an emphasis on small animals that will be introduced to small-scale farmers; (f) encourage small-scale aquaculture development that will cover rice-fish and fish pond cultures; (g) provide support for and promote crop intensification and diversification, giving due consideration to agro-ecological zones, varieties of crops, farmers’ production capabilities, and land size; (h) establish and strengthen community forestry by increasing awareness and understanding of forestry, building capacity for community forestry management and planning at the DFW and Provincial Forestry Office (PFO), and assisting forestry user groups in implementing and enforcing community forestry management plans; (i) promote sustainable, community-based fishery resources management and establish freshwater and marine protected areas in the lower Mekong Basin and coastal
provinces; (j) establish agricultural system analysis and ensure improved technical input; and (k) strengthen the agricultural marketing system and market access for small-scale farmers and rural producers.

Ensuring Sustainable Social Benefit from Forest Resources

Forests constitute a major national asset in Cambodia, with estimates of its forested land area ranging from 50 to 65 percent. Much of the timber is valuable hardwood, which is in great demand in the region and worldwide, since its supply has diminished to an extent that concessions are urgently sought by foreign investors from other countries. Although the export value of hardwood has fluctuated from year to year because of policy and management problems, in a normal year logs and sawed timber represent one of the Cambodia’s few major exports, valued in 1993 at US$26 million. Prior to the imposition of the logging ban in April 1995, the treasury accrued US$33 million in revenue from foreign operations.

Apart from timber sales for export or for large-scale manufacturing, forests make an important contribution to the rural economy of Cambodia, providing 90 percent of rural energy supply. It has been estimated that fuelwood and charcoal accounted for slightly less than the total wood demand in 1995. With the exception of timber used in rural housing, important nonwood forest products include honey, wood spirit, resin, rattan, bamboo, cardamom, bark of different kinds, and medicinal plants.

The Logging Industry

During the past five years, substantial areas within Cambodia have been allocated for timber concessions to various overseas companies from within the region. The area approved by the previous government up to the end of 1992 amounted to 1.4 million ha through 10 concessions. An additional three, much more substantial, concessions brought the total area allocated to slightly more than 4 million ha by the end of 1995. Seventeen additional applications existing since 1995 would, if approved, bring the cumulative total of allocations to 6.6 million ha. These figures compare with 10.7 million ha of available commercial forest resources identified in 1989 and 3.4 million ha of areas protected under the Royal Decree of November 1993.

The critical issues with regard to logging are:

- The compatibility of total concession area with sustainability
- The provision made for sustainable management practices within concessions and their enforceability
- The guarantee of the national interest in the financial terms and conditions negotiated
- The control of illegal logging.

In implementing forest policy in the future, the RGC will seek to ensure that short-term benefits derived from maximizing the area of concessions are not at the exp-
pense of longer term benefits or of securing the most favorable terms and conditions from a national perspective. The exploitation of the forests is geared toward providing timber for domestically located, wood-based industries. Sustainability of the basic resource is necessary to safeguard the progressive development of these wood-based industries.

The sawmilling industry will also be reviewed. Some 300 sawmills, mostly private, currently operate in the country, and they usually have poorly maintained, obsolete equipment and operate at low levels of efficiency. Wasteful of the natural resource, they are associated with illegal logging. Those enterprises still operated by the state will be progressively privatized, and efficiency improvements in the industry as a whole will be considered. To secure the best financial terms and ensure that the contracts agreed upon incorporate and detail suitable forest management obligations, public bidding procedures, which in the past have not been followed in some important instances, will be rigorously applied in all cases. In addition to detailed forest management plans, all bids will be accompanied by Environmental Impact Assessments and Social Impact Assessments, the latter specifying the potential impact on existing residents of the area and the extent of any actual population displacement.

In the past forestry management problems have arisen because of a lack of effective enforcement rather than the lack of relevant management norms. Consideration will be given to ongoing concessions to introduce methods of systematic monitoring and evaluation and to determine the most appropriate ways in which pressure can be brought to bear in cases where practices diverge from the requirement of sustainability. In already deforested areas, where suitable, the planting of perennial crops, such as rubber, oil palm, and coffee, will be encouraged to provide conservation benefits alongside commercial gain.

**Forest Policy in Deficit Areas**

Despite apparently huge forest resources, substantial segments of the population at the village level face shortages of wood and fuelwood. About a quarter of the country has been completely deforested as a result of conversion to intensive agriculture, and this is precisely the area in which much of the Cambodian population is concentrated. As indicated, rural families depend heavily on wood and nonwood forest products or building materials, energy, and many other needs. A separate and distinct policy needs to be developed to cover these areas. Some years ago an effort was made to identify an appropriate model for reforestation, suitable for the Cambodian situation. It was agreed that such a program would accomplish the following:

- Deal with the fuelwood and timber problems of the rural poor and rural population generally
- Contribute to family income and to soil fertility in village areas
- Involve the villagers and develop community cooperation
- Impart relevant skills to the village community
- Provide training in forest extension to personnel at central and local levels.
As much progress as possible will be made in these directions over the next five years. At present, the stated program does not exceed 700 ha a year, and this will be increased substantially. Financial resources for program implementation and uncertainties over land tenure and tree ownership, which need to be clarified, represent constraints that affect social forestry. However, a program will be established focusing on the protection and, to some degree, enrichment of remnant secondary regrowth, wood lots, or more substantial agroforestry systems, including a mix of long-term timber trees, fruit trees, and fuelwood trees, as well as annual crops. With respect to all forestry work, steps will be taken to clarify the relative responsibilities of central and provincial governments, communes, and villages. Training needs at the different levels will be identified and appropriate training initiated.

Forest Management Reform
Since the fifth Consultative Group (CG) meeting in 2001, the RGC has made significant progress in ensuring sustainable management of forest resources. To improve the performance of forest concessionaires conducting commercial logging activities, the RGC has introduced several rigorous measures, including the suspension of logging activities from January 1, 2002, until such time that a concessionaire would have a new forest management plan approved by the DFW/MAFF that is consistent with international standards and would have renegotiated a model forest management investment agreement with the RGC. A significant reduction in the allowable annual cut was also imposed on forest concessionaires in 2000/2001. During 2002, continued progress has been made in reducing the incidence of forest crimes. To further strengthen the effectiveness of the partnership among project components, the RGC has established an interministerial Technical Working Group to improve the exchange of information and resolve internal differences among project components. The RGC has also initiated plans to incorporate a bar-coding system that will strengthen the ability of project components to monitor the chain of custody of logs from forests to final users.

The legislative and policy framework that is indispensable to achieving sustainable resources management has been strengthened considerably with passage of the long-awaited new forestry law. Furthermore, with the support of German Technical Cooperation Agency (GTZ), a subdecree on community forestry has been developed and approved by the RGC through a nationwide participatory multi-stakeholder consultative process to enhance local community participation in forest management decision-making processes. The initial steps to develop a forest policy statement and a restructuring of the Forest Administration have been carried out by the DFW/MAFF. The RGC is committed to complete the reform process in the forestry sector. It will continue its efforts to eliminate illegal logging, enhance capacity building for the DFW’s staff and public awareness, strengthen forest rehabilitation and reforestation activities, and, with the assistance of various donors, enlarge natural forest conservation for eco-tourism. These efforts will ultimately stabilize the government’s annual revenue stream and enable it to achieve long-term sustainable forest resources management.
Statement of the RGC on Forest Policy

The RGC is endeavoring to implement a coordinated set of laws, programs, action plans, and institutional arrangements regarding forest resources that aim at achieving the national goals of environmental protection, biodiversity conservation, poverty reduction, economic development, and good governance, as described in the Policy Statement on the Second Mandate of the Royal Government of Cambodia on Forestry, the Socio-economic Development Plan, the Interim Poverty Reduction Strategy, and the Governance Action Plan. This set of national goals aimed at the nation’s sustainable development provides the overall development framework for the conservation and management of the country’s forest resources. The RGC considers the ecologically, socially, and economically viable conservation and management of forest resources to be a major pillar of public welfare directly contributing to environmental protection, poverty reduction, and socioeconomic development. The RGC commits itself to the sustainable conservation and management of the country’s unique forest resources now and for future generations. The results and the follow-up processes of the U.N. Conference on Environment and Development (UNCED) in Rio de Janeiro in 1992 consider the concept of sustainable forest management within the framework of sustainable development of Cambodia. The RGC acknowledges the multiple perceptions, interests, and objectives of the numerous forest interest groups within the country’s Mekong Basin region and at the global level regarding the conservation and sustainable management of forest resources.

The objectives of these initiatives within the set of national goals for forest resources are that conservation and sustainable management of Cambodia’s forest resources will make a major contribution to the sustainable socioeconomic development of the country. Consideration of the country’s remaining forest resources will be as follows:

- A permanent forest estate will be managed by exclusively promoting conservation and sustainable forest management schemes for those who directly contribute to the rehabilitation and conservation of a maximum stock of forested land and forest resources.
- Within the conservation and sustainable forest management schemes, a maximum involvement of the private sector and participation of the local population will be encouraged to ensure food security, poverty reduction, and socioeconomic development.
- A wide range of coordinated, multi-stakeholder processes will be implemented to harmonize the different perceptions, interests, and objectives of the various forest interest groups at all levels.

To achieve the national goals of environmental protection, biodiversity conservation, poverty reduction, economic development, and good governance, the RGC will endeavor to accomplish the following tasks:

Forest resource conservation:

- Reclassify and dedicate the major part of the remaining natural forest stands to their environmental protection and biodiversity conservation functions.
Promote conservation and protection strategies such as protected forests, watershed management, and eco-tourism with the maximum participation of the local population.

Implement the strict application of the Code of Practice as the regulatory framework for the sustainable management of forest resources.

Conduct extension, education, and public awareness campaigns at all levels of Cambodian society.

Poverty reduction:

- Legally recognize and protect the local population’s traditional rights to use forest resources under the framework of food security and poverty-reduction considerations.
- Optimize the benefits to the local population from the use and management of forest resources through the implementation of the concept of forestry and wildlife conservation based on the participation of the local population.

Economic development:

- Promote the high socioeconomic value of environmental protection and biodiversity conservation of natural forest resources.
- Promote the substitution of timber supply from natural forest stands for timber plantations by encouraging private investment and public participation.
- Optimize the use, processing, and marketing system for forest products to sufficiently support domestic demand and export.

Good governance:

- Implement capacity-building, institutional strengthening, and research programs at all levels.
- Conduct education, training, and public awareness campaigns, particularly for the local population’s participation in conservation and sustainable forest management schemes.
- Establish a Forestry Administration department in which the necessary steps of devolving decision-making power can take place and in which functional procedures for multi-institutional collaborations are grounded.
- Encourage, implement, and coordinate multi-stakeholder processes that harmonize the different perceptions, interests, and objectives of the various forest interest groups at local, regional, and international levels.
- Promote transparency in the flow of information within the forestry sector.

In addition to the set of national goals to perform the overall development framework for the conservation and sustainable management of forest resources, the RGC acknowledges international issues, processes, and commitments occurring through the UNCED and its follow-up processes relevant to the country’s forest resources. The RGC envisions implementation of a long-term National Forest Program consistent with the proposals for action of the Intergovernmental Panel on Forests/Intergovernmental Forum on Forests as promoted by the international arrangement on forests with the U.N. Forum on Forests and the Collaborative Partnership on Forests.
Forest Revenue Management System of Cambodia

The Ministry of Economy and Finance (MEF) and the MAFF established the interministerial commission by the Prakas no. 432 MEF-217 A.MAFF, dated July 12, 2002, to set up the Forest Revenue Management System. This system reviews and monitors current procedures for receipt of forestry royalties and other revenues from forest products and NTFPs and all related aspects of revenue management, including planning, record-keeping, reporting, disclosure, and auditing of the prevailing laws and regulations and the practical implementation of forest revenue management.

The inter-ministerial commission has produced an operational manual in the Khmer and English languages, and a Joint-Prakas, signed on August 28, 2003, by the MEF and the MAFF was published and issued to formally apply it. The Forest Revenue Management System mentioned above will be revised as necessary in accordance with the relevant prevailing rules and other regulations as applicable.

As part of the Forest Revenue Management System, procedures to harvest the forest in the concession area and the means of paying the resulting revenue to the national budget are discussed below. The forest revenues are generated from forest concessions, logging coupe for domestic use through bidding, NTFP, fines for forest offenses, concession lands and road construction in forest areas, and planted forests.

After signing an agreement with the RGC and receiving a forest timber license, concessionaires will make deposits (according to the terms and conditions specified in the agreement) to the government through the Forestry Administration as security or bonds for the forest concession contract. Deposits will be returned to the concessionaires at the end of the year of the expiration of the timber license after the Forestry Administration has assessed that concessionaires have complied with the technical implementation of their forest concession management. Upon receipt of these documents and after complying with the terms and conditions specified in the agreement, concessionaires will prepare documents for their forest concession management plan at the Forestry Administration.

After receiving approval from the director of Forestry Administration, concessionaires will undertake fieldwork in their licensed areas. This assignment includes a long-term management plan for the whole forest concession, an annual harvesting plan for each coupe, and a block management plan for annual cutting.

The Environmental and Social Impact Assessment of the forest concession is an important part of the forest concession management plan prepared by concessionaires and reviewed and evaluated by the Ministry of Environment before approval by the MAFF. The minister of MAFF should approve the forest concession management plan. The director of Forestry Administration will approve the coupe annual harvesting plan and the block management plan for annual cutting.

After preparing these plans, concessionaires will apply for approval by the Director General of Forestry Administration. The director of Forestry Administration will monitor and decide and propose the annual harvesting quota to the MAFF. The minister of
MAFF will issue a quota permit for forest harvesting based on the proposal by the director of Forestry Administration.

After the Forestry Administration approves the annual harvesting plan and the block management plan for annual cutting, and the MAFF approves the quota permit for forest harvesting, the director of Forestry Administration will issue the letter of permission to enter coupe, accompanied by (a charge book A) to the concessionaires to start their harvesting operations.

The director general of Forestry Administration nominates competent officers to inspect and guide the implementation of harvesting techniques in the coupes. The competent officer will provide guidance on the required technical procedures to the staff worker of the concessionaire, before the concessionaire actually starts operations in the forest coupe.

Felled trees will be tracked to log landings, and their measurement will be made with the participation of the competent officers of the Forestry Administration and the concessionaires or their representatives by measuring length and diameter, calculating volume, determining quality grade and hammer stamping to certify that the logs are already measured. All parties involved must sign on the document describing the timber felled by the concessionaire. Log lists (charge book A) will be made so that concessionaire can make the royalty payment to the national budget and premium to the National Forest Development Fund (NFDF). Based on the log list, the Forest Management Office (FMO) of the central Forestry Administration will write a proposal for the royalty payment and premium charged to the Planning and Accounting Office, and the director of Forestry Administration will give final approval. After the proposal of payment is approved by the director of Forestry Administration, the concessionaire will pay the royalty and premium to the national bank.

Based on the revenue slips and the log lists (charge book A), the central Forestry Administration will issue the initial permit for transportation of forest products and NTFP. The Forestry Administration field office director in charge of the coupes will then issue transport permits to the concessionaires to transport the timber with certified names of the holder of the permit, its valid date, destination, and the attached lists of logs or NTFP to be transported.

The officers of the Forestry Administration, especially those in the division responsible for use destinations, will have authority to re-inspect the quantity, identify logs and NTFP, and verify the transport permit and the lists of forest products and NTFP before allowing them to enter processing mills or for usage.

**Movement of Processed Wood Products from the Mills for Domestic Use**

Transport permits are required for domestic mill consumption of forest products and NTFPs. Such permits are issued only if continuous transportation to destinations is assured and the
FIGURE 1-1. FOREST CONCESSION IMPLEMENTATION PROCESS

1. Long-term management plan for each forest concession
   - Forestry Administration considerations, decides and submits to MAFF for approval

2. Annual harvesting plan of NTFPs for each coupe
   - Forestry Administration monitors, decides, and submits to MAFF for approval of quota permit

3. Block management plan for annual harvesting
   - Forestry Administration monitors and decides on issue of the cutting permit based on the quota permit from MAFF

4. Harvesting operation in the licensed blocks
   - Measurement hammer stamping and product list

5. Royalty
   - National Budget

6. Premium charge
   - NFDF (as stipulated in articles 62, 63, and 64 of section 12 of the forestry law)

7. The central Forestry Administration issues the coupe-opening permit to transport forest products and NTFP

8. Based on the above permit, the Forestry Administration issues the transport permit for forest products and NTFP
certified names of permit holders, dates of validation and destination are provided. The division director of the Forestry Administration at the location of the consuming mill is authorized to issue the permit. Figure 1-1 shows the process for implementation of the forest concession.

Transport of Processed Wood Products from Mills to Overseas Destinations

Referring to the transport permit for the logs entering the mills, concessionaires will request from the Forestry Administration division responsible for the transport permits for processed wood products permission to transport the products from their mills to export points.

The director of the Forestry Administration assigns competent officers to verify the quantity of processed wood products to be transported by comparing stocks and allowable conversion rates.

Concessionaires must pay a service charge of 1 percent of Free-On-Board (FOB) prices to the government through the Forestry Administration, but these revenues will be transferred to the NFDF for future use. The director of central Forestry Administration will then issue the export license before routing the license to the director of the Ministry of Commerce for signature. Based on the export license, the director of central Forestry Administration can issue the transport permit for processed wood products for the export destination on the export license. Concessionaires will be responsible for preparing documents and paying other applicable taxes according to the law.

Export of Wood Products to Overseas Destinations

According to the block management plan for annual cutting, the director of Forestry Administration proposes the annual harvesting export quotas to the MAFF. The MAFF then issues the export guidelines. The plan further stipulates that the product holder or concessionaire will follow the RGC’s export guidelines to obtain the export quota permit to export the processed forest products.

Based on the export guidelines of the RGC, the MAFF will issue an export quota permit including a letter informing the Ministry of Commerce and the Forestry Administration of the quantity and types of products for the concessionaire’s or client’s export license. The export forms require that the client or concessionaire pay to the NFDF 1 percent of FOB. After these conditions are met, the director of Forestry Administration and the director of the Ministry of Commerce sign the export license. Upon receipt of the export license, the central Forestry Administration will issue a transport permit for the processed products to be transported to the destinations specified in the export license. Before export, the persons concerned will pay export and any other taxes required by the law. Figure 1-2 shows the process for exporting forest products to overseas destinations.
FIGURE 1-2. EXPORT OF FOREST PRODUCTS TO OVERSEAS DESTINATIONS

1. Request for the export guidelines from the cabinet of the Council of Ministers; the MAFF sets the annual export quotas

2. The MAFF submits the guidelines approved by the cabinet to the Ministry of Commerce for information and for implementation by the Forestry Administration

3. The Forestry Administration assigns competent officers to verify quantity

4. The Forestry Administration prepares and signs export licenses for signature by the director of the Ministry of Commerce

5. The Forestry Administration issues the transport permit for the products to be moved to exporting destinations

6. Customs requirements for export are fulfilled

7. Customs procedures for export

8. Other export taxes as determined by law

9. National Budget

Payment of the 1 percent of FOB

NFDF (as stipulated in articles 62, 63, and 64 of section 12 of the forestry law)
Royalty and Premium Payment

After the concessionaire has completed the forms obtained from the MAFF and complied with the procedures of the Forestry Administration, the concessionaire will pay the royalty and premium based on the actual quantities and the quality of logs detailed in the log list charge book (A) that is approved by the Forestry Administration. Otherwise, in accordance with the letter of advice from the Forestry Administration, the concessionaire will pay the royalty and premium per the market cost and actual requirement. The director of Forestry Administration will forward the request document to the Forest Management Office (FMO) for consideration and comments. After verifying that the request document correctly follows the technical guidelines, the director of Forestry Administration will instruct the Office of Accounting Planning to issue a payment letter to the concessionaire to deposit (by transfer, cash, or check) the amounts of the royalty and premium charges into a special account at the National Bank of Cambodia. Based on the payment receipt from the national bank, the FMO will take further action as it deems appropriate.

The Forestry Administration will monitor the royalty and premium payments into the account at the national bank on the basis of the following:

- Forestry Administration requests to concessionaires for the royalty and premium payments will be approved within seven business days from the date the requested letter is received.
- Concessionaires are required to make the royalty and premium payments to the account in the national bank within seven business days. Failure to comply with this schedule will result in a concessionaire being fined 0.5 percent per week of the original amount of the royalty.

Annual Forest Revenue Planning

The main objectives of annual forest revenue planning are to provide the MEF with an assessment of the accuracy of forecasting the annual forest revenue to the treasury for effective allocation of the annual budget.

Forestry Administration first begins annual forest revenue planning. It should allow enough time for the following:

- The MAFF to include the annual assessment in the annual budget plan for submission to the MEF.
- The MEF to process paperwork for the National Assembly to approve the RGC’s annual budget plan each December. The revenue will be allocated and used to offset expenses for the fiscal year.

Within 30 days after each quarter of the fiscal year, the Forestry Administration will submit documents to the MEF. The objectives of these documents will be to collect current forest products and quarterly revenue within the 30-day timeframe; provide the
MEF and the MAFF with revisions to the revenue assessment for the rest of the year, reflecting the log harvesting and forest revenue in the current quarters as well as the business plan and forest concession revenue, annual forest coupe, and land concessions yet to be estimated; and allow the stakeholders to continue monitoring by comparing the forest revenue with estimates through the budget years.

A Brief Review of the KPMG Report on Forest Taxation

The report titled “The Equitability of the Forest Taxation System in Cambodia” by the accounting firm of KPMG was reviewed by Dr. Peter Cardellichio on April 25, 2001. This study provides a detailed analysis of profitability in the Cambodian wood processing sector, and uses the results to determine timber valuations. Because of the highly constrained version of the problem that has been presented, many important issues concerning the value of timber in Cambodia have not been addressed. As a result, the report’s policy conclusions have limited applicability when considered in the broader context of the Cambodian forestry sector.

Problem definition: An equitable forest taxation system. The report analyzes the equitability of the current forest taxation system in Cambodia. KPMG defines this strictly from the perspective of the processor and attempts to determine what level of payment can be made to the RGC that would guarantee that existing converting operations are profitable. This definition is rather narrow and may not be appropriate to use in this study. An equitable system would be a scheme in which the RGC receives fair economic rent for the timber resource. This economic rent or stumpage value would be the price that is consistent with competitive market conditions for timber. Once the appropriate stumpage fees are estimated, the country would also see the benefits of greater efficiency in how timber resources are allocated, that is, the quantities of logs exported and processed, identification of the mix of products, and so forth.

Veneer production: A good choice for Cambodia? The primary product currently made in Cambodia is rotary-cut veneer. Most of the operations in the survey sample are veneer producers. Thus, this also becomes the basis for the study’s recommendations. The study concludes that government fees for timber should be reduced because they are much too high for veneer producers to earn a reasonable profit. Even without much rigorous analysis, there is ample evidence suggesting that the economic rent for timber would be much higher in alternative products, and that existing operations for veneer production are probably decreasing value.

Border-equivalent log prices look to be higher than veneer prices in log-equivalent terms. Cross-sectional data on timber prices are not always straightforward because of differences in log species and sizes; however, the following example illustrates the problem well. FOB prices for hardwood logs in April 2001 were in the range of US$165 to US$185/m³ for Sabah and East Kalimantan. KPMG reports a log price (derived from
the selling price of veneer) of US$136 for March 2001. Thus, by converting these logs to veneer, the potential lost income was substantial. Not only was revenue significantly less, but the costs incurred in getting the wood to market were much higher.

The value of Cambodian logs in the export market would require some fairly detailed analysis, and, as discussed below, would have been a valuable extension of the KPMG study. The following figures are merely estimates. In the current relatively depressed market, FOB border-equivalent prices suggest that Cambodian logs could sell in the export market for US$175/m³. KPMG’s analysis estimates logging costs for the model company to be US$62/m³. The allocation of this cost between fixed cost, harvesting cost, and log transport is not indicated. For illustration purposes, assume it should be increased by 50 percent to cover the additional cost of transport to the port. This indicates a costs of US$93, which is close to the estimate of US$96 used in a previous World Bank study (‘Cambodia Forest Policy Assessment’). In this example, the residual value would be US$82/m³ (or 175 minus 93). This result is about 35 percent (or US$21) higher than that estimated for a veneer processor. These higher numbers also are more consistent with prices paid for logs that have been sold at auctions in Cambodia. Clearly, this residual would be substantially higher if markets improve. Assuming that markets in 1990–96 are more representative of the long-term timber values, the log price could be assumed to be 50 percent higher. Using these assumptions, the residual value of Cambodian timber would increase to US$170/m³ (or 175 times 1.5 minus 93).

Finally, no effort has been made to consider the nontimber values of Cambodian timber. These should certainly factor into any decisions concerning the appropriate valuation of the resource. Timber values must exceed nontimber values if the harvesting of Cambodian timber is to yield positive economic value. The lower the residual value, the more likely it is that the best course of action is to leave the timber standing.
CHAPTER 2: CAMEROON BACKGROUND PAPER

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Since the early 1990s political and economic development in Cameroon has been marked by numerous reforms. Under the combined pressure of its international commitments and the civil society, the state initiated a democratization and reconstruction process that required a redistribution of roles and a reduction of the dominant influence of the state in the economic and social spheres. As a result, the roles of local governments and the rural populations were enhanced in various areas of activity.

The forestry sector was particularly affected by this period of reforms. Although in the past rural communities were marginalized in the management of forest resources, new laws and regulations have opened up many opportunities for people living in forested areas. In this regard, a few instruments that have modified the ground rules of forest management in Cameroon can be cited: Law No. 94/01 of January 20, 1994, to establish forestry, wildlife, and fisheries regulations, and Decree No. 95/531 of August 23, 1995, to determine the conditions for the implementation of forestry regulations. These legal instruments offer inhabitants of forested areas the possibility of managing timber resources through community forests. Law No. 94/01 states: For the development of
neighbouring village communities of certain communal forests under exploitation, part of the proceeds from the sale of forest products shall be reserved for the said communities under conditions laid down by decree.

Instruments are also being updated to promote sustainable management of forest resources. Decree No.95/531 distinguishes four categories of forest exploitation permits, of which the two most important are the forest concession made up of one or several forest management units (FMU) and the sale of standing volume (VC). A forest concession is allocated for 15 years, renewable, and covers a maximum surface area of 200,000 hectares. The sale of standing volume cannot exceed 2,500 hectares, and the duration of exploitation is one year, renewable twice. The planning strategy for granting logging titles currently favors the allocation of concessions to ensure the sustainability of national forest resources through forest management.

To obtain an FMU following a national call for tenders, bidders submit technical and financial tenders, which generally exceed basic rates. The lawmakers have thus laid down a framework that allows local communities to benefit from the spin-offs of forestry exploitation directly or through the councils in which their villages are represented. Although the councils share of annual forestry royalties (RFA) is integrated into the council budget and managed by the council bureau, a legal instrument specifies the conditions of use of the RFA reserved for the local people and provides for their involvement in identifying and carrying out any projects.

A Forestry Revenue Enhancement Program (PSRF) responsible for the collection of forestry revenue and jointly managed by the departments in charge of forests and taxation was set up in 1998 by prime ministerial decree.

According to Cameroons forestry policy document (MINEF 1995), taxes specific to the forestry sector should enable the State, owner of the resources, to tap the value of timber as a raw material. The structure and amount of such taxes should aim at encouraging sustainable management of resources by concessionaires and other forest stakeholders, ensure a fair distribution of forestry income between forest exploiters, surrounding village communities and the State, and stimulate the competitiveness of the forestry sector.

This chapter aims to take stock of forestry sector taxation reforms and their impact on economic growth, poverty alleviation, and the management of forests and wildlife resources. The chapter is divided into three sections: Forestry Taxation Reform, Reform Implementation and Challenges, and Impact of the Various Taxation Instruments on Key Stakeholders.
Forestry Taxation Reform

Since 1989 forestry taxation reform in Cameroon has been one of the conditions for structural adjustment loans. The new forestry law was enacted in 1994 (Law No. 94/01 of January 20, 1994, to establish forestry, wildlife, and fisheries regulations), but tax reform actually came with the 1995/1996 finance law.

Review of Taxation Instruments and Their Evolution

Characteristics of forestry taxation in Cameroon. The forestry sector in Cameroon is subject to two kinds of taxes: general taxes and sector-specific taxes. General taxes include corporate tax (IS); value-added tax (VAT); business licence, customs duties on imports, and stamp duties on documents presented for formalities. Specific taxes apply to the exploitation and processing of forest products.

Tax collection in Cameroon is based on a tax declaration system. The advantage of this system is that it facilitates the work of the taxation department. The taxpayer voluntarily declares and pays the amount of taxes he or she is supposed to pay in accordance with deadlines and conditions determined by the taxation department. This system can be effective if the authorities concerned have the means of verifying the declarations either when they are being made or later. The other system usually allows too much room for tax evasion.

Forestry taxation is made up of taxes or royalties, which give right of access to resources and their exploitation, processing, and exportation. Processing and exportation are governed by two regimes: the common law industrial regime (UDC) and a regime for factories set up in special industrial tax-free zones (UPF). Most companies have abandoned the latter regime, which was aimed at encouraging investments in timber processing.

The main taxes and royalties specific to the forestry sector before the 2000/2001 finance law include the following:

- The RFA correspond to the right of access to the resource and is assessed on the basis of the surface area exploited. Its rate varies with the type of authorization as follows:
  - Sale of standing volume and salvage: bottom rate: French-African Francs (CFA F) 2,500 per ha per year plus financial offer
  - Concession: bottom rate, that is, CFA F 1,500 per ha per year plus financial offer
- Felling tax assessed on the basis of the volume harvested with a 2.5 percent rate of (free-on-board (FOB) value 15 percent) for each species.
- Export duties for logs based on the volume exported with a 17.5 percent rate of (FOB value 15 percent).
- Log export surtax is calculated on the basis of the volume exported, and
the rate depends on the category of species.

- Factory admission fee is initially divided into export duties for sawed timber from factories under common law and taxes on logs going into special industrial-free-zone factories.

Taxes based on the volume of timber harvested have been repealed, while the special industrial-free-zone regime from which more than one-third of logging companies benefited around 1998 has been abandoned. In the latter case, the factory admission fees based on the log exportation rates caused many companies to withdraw.

To this list of forest taxes can be added a sort of village tax, or indirect tax of CFA F 1,000 per m³ of wood harvested paid directly to the neighboring communities for social and economic investments in the case of exploitation of a sale of standing volume.

**Developments in forestry taxation since 1994.** Until 1994/1995 the forestry sector was subject to relatively low taxation. At this point in time, however, the government decided to reverse the situation by raising the RFA and instituting taxes on processed products. The main developments included the following:

- The 1994–95 finance law:
  - RFA increased from 98 to 300 f/ha per year
  - Taxes instituted on processed export products

- The 199798 finance law:
  - Increase of RFA to 1,500 f/ha per year for an FMU and 2,500 f/ha per year for a sale of standing volume
  - Change of the basis of calculation of timber value by abandoning the price list system that was completely ill-adapted to market realities and basing calculations on FOB values in accordance with the prices given by SGSForestry and the Reuters Agency
  - Increase of tax rates for processed products to 12.5 percent for factories under common law and 17.5 percent for special industrial-free-zone factories
  - Assessment of a 17.5 percent tax on log exports
  - Institution of a system of call for tenders for allotting concessions and sales of standing volume

- The September 1997 agreement between the government and logging operators:
  - Institution of a 15 percent reduction of the felling and log export tax and of 25 percent for processed products to reflect the average value of Cameroons timber exports against the FOB values given by SGSForestry and the Reuters Agency, which are based only on superior quality (Loyal Merchant)
  - Reduction of factory admission fees to 3 percent for factories under common law and 4 percent for special industrial-free-zone factories

- Partial prohibition of log exports during the 1999 fiscal year:
  - Exportation of traditional species, such as sapelli, sipo, and iroko, was prohibited, while exportation of species to be promoted and other lower value species, such as ayous and azob, was allowed.

- Follow-up measures to the partial prohibition of log exports for 19992000:
  - Abandonment of the system of calculation of the graduated surtax on exported logs, depending on the degree of industrial processing, for a system of surtax based on the first cubic meter exported for authorized
species. The rates of this surtax are as follows: 4,000F per m³ for ayous, 3,000F for first-category promotion species (like azob), and 500F for second-category promotion species.

• An economic and financial audit of the forestry sector sponsored by the government initiated the numerous tax reforms in force today.

• 2000–01 finance law

The 2000–01 finance law enacted in June 2000 drew inspiration from many of the proposals contained in the audit report. The bottom price for FMU was reduced from CFA F 1,500 to CFA F 1,000, but additional financial offers were to be regulated from the first year. The other measures envisaged included the following:

• A 17.5 percent admission fee into special industrial-free-zone factories, which caused most companies to abandon this regime
• Bank deposit guarantee of all fiscal and environmental obligations for all authorizations with the consequence that of the 21 successful bidders for the July 2000 call for tenders, three abandoned the concessions allotted to them for failing to pay the bank guarantee whose amount was equal to the amount of the bid
• Cancellation of export duties on processed timber in compensation for the admission fees into factories under common law
• Possibility of establishing during the financial year a competitive export quotas system (this measure has not been implemented in 2003 because of its complexity)
• Institution of an equalization fund to rationalize the distribution of the 50 percent of forest royalties reserved for councils and villages (Conditions for rendering this fund operational are still being discussed)

• 2001–03 finance laws

Generally, the tax structures are still maintained despite the many complaints about taxation rates by professionals in the sector, the difficulties pertaining to the deposit system and VAT reimbursement procedures. Deposits constitute a hoarding of productive capital that could be invested in the modernization of production tools. Industrialists also complain that this measure is applicable only to forestry companies.

Forestry Taxation Revenue and Its Use

Revenue collection and economic growth. The forest is one the main sources of export earnings in Cameroon, second only to hydrocarbons. The increasing importance of the timber sector in the national economy can be seen from the share of the forestry sector in national exports, which increased from CFA F 152 billion in 1996/1997 to CFA F 253 billion in 1998/1999, representing a relative share in national exports that increased from 14 percent in 1996/1997 to 25 percent in 1998/1999. It was estimated at more than CFA F 300 billion in 2003. The contribution of the forestry sector to gross domestic product amounts to nearly 9 percent in 2003, while it was less than 7 percent in 1998.

Use of forestry revenue. The state, the councils, and neighboring communities share revenue from RFA as follows: 50 percent for the state, 40 percent for the councils, and
10 percent for neighboring communities. Payment of the royalties of a sale of standing volume is made within a deadline of 45 days following notification of allotment or renewal of authorization. In contrast, forest exploiters can pay concession royalties in three instalments of equal amount by no later than March 31st, September 30th, and December 31st of every fiscal year.

Decree No. 98/009 of January 23, 1998, to lay down the rate and collection of forestry fees, royalties, and taxes, specifies in article 10 that three liquidation forms will be issued for forestry royalties. One will be for the payment of the share reserved for the state, one for the payment of the share reserved for councils, and another for the payment of the share reserved for neighboring village communities. Annual finance laws set bottom rates for annual forestry royalty. RFAs are assessed on the basis of surface areas and have gradually been raised by the various finance laws.

MINEF receives part of forestry taxation revenue in the form of allocations to the special funds for forestry development and wildlife. In 1996, Decree No. 96/237/PM of April 10, 1996, combined the budget allocated to the Forestry Development Fund (FSDF) with a percentage of the forestry taxes reserved for the state. As a result of the 1999/2002 finance law, FSDF funding derived from the proceeds of forestry taxation. Successive finance laws have determined the amount allocated for it as follows:

- 1999/2000: CFA F 4 billion
- 2000/2001: CFA F 4 billion
- 2001/2002: ceiling set at CFA F 3 billion
- 2003: ceiling set at CFA F 3 billion

The FSDF is used to finance activities retained within the framework of an annual program, and these activities may include rolling stock and office stationery, building of offices, sector studies, and diverse missions. The proceeds of the RFA are shared according to the following percentages:

- State: 50 percent
- Councils: 40 percent
- Local communities: 10 percent

As illustrated in Table 2-1, the assessment of the taxes collected shows the following:

- RFA are becoming predominant with close to 36 percent of the taxes in 2003
- Felling tax is maintained at around 13 percent
- Factory taxes represent nearly 9 percent of the total amount of taxes collected in 2003

The projected evolution of tax revenue will be influenced in the future by the allotment of the last FMU (about 20 of them), which will lead to an increase in revenue from RFA. Thereafter, revenue from RFA may not increase significantly. The felling tax, whose amount depends on the volume of forest production, may rise slightly as a result of a projected increase in felling per unit area and an improvement of field controls.

In the long term, the forestry sector will be challenged to keep up with its great ability to generate income as demonstrated in recent years, given that management requirements will inevitably result in a reduction of the surface area open to exploitation.
**Table 2-1. Evolution of Forestry Taxes Collected per Category**

*(in millions of CFA F)*

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</thead>
<tbody>
<tr>
<td>Felling tax</td>
<td>1,351</td>
<td>1,149</td>
<td>1,744</td>
<td>1,823</td>
<td>3,030</td>
<td>4,143</td>
<td>5,438</td>
<td>6,788</td>
<td>5,706</td>
<td>4,259</td>
<td>5,149</td>
<td>5,142</td>
<td>44,371</td>
</tr>
<tr>
<td>RFA</td>
<td>259</td>
<td>200</td>
<td>345</td>
<td>1,120</td>
<td>1,232</td>
<td>2,291</td>
<td>3,235</td>
<td>3,051</td>
<td>10,471</td>
<td>13,430</td>
<td>14,645</td>
<td>50,385</td>
<td></td>
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<tr>
<td>Other taxes</td>
<td>241</td>
<td>184</td>
<td>405</td>
<td>417</td>
<td>1,003</td>
<td>961</td>
<td>1,547</td>
<td>4,131</td>
<td>1,937</td>
<td>10,768</td>
<td>16,770</td>
<td>38,424</td>
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<tr>
<td>Factory admission fees</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>1,982</td>
<td>2,570</td>
<td>3,605</td>
<td>8,157</td>
<td></td>
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<tr>
<td>Auction sales</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>1,241</td>
<td>886</td>
<td>77</td>
<td>2,204</td>
<td></td>
</tr>
<tr>
<td>Penalties</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>1,468</td>
<td>440</td>
<td>559</td>
<td>2,467</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>1,851</td>
<td>1,533</td>
<td>2,494</td>
<td>2,605</td>
<td>4,451</td>
<td>6,378</td>
<td>8,690</td>
<td>11,570</td>
<td>12,888</td>
<td>21,358</td>
<td>33,243</td>
<td>40,798</td>
<td>146,008</td>
</tr>
</tbody>
</table>

*Source: PSRF 2002.*
According to various experts, future forestry production will be below current national forestry production.

**Councils and local communities.** Order No. 122 of April 29, 1998, jointly enacted by Ministry of Economy and Finance (MINEFI) and Ministry of Territorial Administration (MINAT), specifies the conditions of use of revenue derived from forest exploitation and reserved for village communities neighboring the exploitation permit areas. Article 3 of the order stipulates that revenue reserved for local village communities will be used exclusively for the provision of social services such as water and electricity supply, construction and maintenance of bridges and roads, works of art, sports equipment, school and health infrastructure or purchase of medical drugs, and any other services the community decides are in its interest.

The order also specifies the organizational/operational modalities of the management committee provided for in the instrument to shepherd activities carried out with the proceeds of the RFA, especially the respective roles of the mayor or his representative in their capacity as committee chairman and authorizing officer, and of the representative of the minister in charge of forests who is responsible for drawing up reports during committee meetings.

An audit carried out in 2003 on the transfer of RFA and their use by councils and communities indicates that there is an effective transfer of funds to these bodies. The audit, however, raises concerns about retrocession deadlines, lack of information, and, especially, the ignorance of the councils and communities about the real amounts due to them, and about obstacles to the capitalization of data at the national level. All of these problems contribute to undermining efficient use of RFA and the scheduling of investments at the level of councils.

From 1999 to 2002, CFA F 7,400 million was transferred to councils. Compared with the others, RFA constitute an important resource. In the councils and communities investigated, royalties accounted for two-thirds of the budget, although there were significant differences. RFA accounted for 10 to 96 percent of council resources depending on the financial year, and with a significant increase in the number of councils over time, RFA increased from 61 to 82 percent between 1999 and 2002. Royalties thus make up 52 percent of the recurrent budget of councils, representing 84 percent of the volume of royalties.

During the three fiscal years between 1999 to 2002, CFA F 1,093 million of non-RFA community royalties was spent on council investments. Council infrastructure, rolling stock, equipment for council offices, and construction and/or renovation of markets and bus stations represented 59 percent of the investments; water and electricity supply represented 19 percent; social services such as health, education, sports and cultural infrastructure accounted for 14 percent; and road infrastructure amounted to 9 percent of investments.

Such expenditure was essentially for infrastructure in the headquarters of the council areas and not in the rural villages, whether or not villages were near the area exploited. However, some councils carry out a type of redistribution of forestry revenue by distributing investments funded with community RFA in all the villages concerned.
Some positive developments with investments have happened because of the dissemination of the MINEF/MINATD joint order. This explains, for instance, why current distribution of RFA in cash no longer occurs and, subject to the establishment of management committees, community royalties are used to carry out concrete projects albeit inefficiently compared with the amounts allocated.

Projects funded reveal a tendency to invest in basic social services such as education, health, or rural water supply. This tendency is encouraged by the joint order, which orientates the working plans of management committees toward prerogatives that normally would be within the ambit of the state and/or councils if the new decentralization instruments were to be adopted by Parliament. Moreover, community RFA have been used to fund housing enhancement and social and cultural projects. Management committees that recognize the decision-making powers of village representatives also fund income-generating activities. Though positive developments have been recorded over time, community royalties do not contribute significantly to the local development process.

Community RFA are not achieving the results expected in the joint order. However, the change of council leadership following the last council elections offers hope that this trend will be reversed, given that many mayors have a vision of council development closer to the spirit of the joint order. Whatever the case, a number of improvements still must be made to ensure better use of RFA.

**Reform Implementation and Challenges**

**Administrative Challenges and Opportunities**

Although significant improvement has occurred in the collaboration between MINEF, responsible for granting logging authorizations, and the PSRF, responsible for collecting taxes, relations between the two are not smooth. Fortunately, the assistance of Canadian Co-operation has facilitated a networking of the two institutions.

Enhancing control of forestry resources and revenue, which is the objective of the governments program on economic revival and alleviation of poverty, will largely depend on the quality of the synergies and complementarity of the activities of partner institutions. Thus, the PSRF has instituted a system of checkpoints along the main highways; this system of control operates alongside the traditional system of forestry control used by MINEF. Juxtaposition of these two control systems has not yet made it possible to delineate all forest activities. Small-scale and informal production, which is still largely uncontrolled and avoids forestry taxes, has especially enjoyed a resurgence.
Policy Challenges and Opportunities

Reform of forestry taxation, specifically decentralized taxation, is the cause of many policy changes in the forestry sector. Thus, in the June 2002 council elections, many mayors who had turned managers were defeated in the reelection because of their unprofitable management of the decentralized RFA. It has been noted that representatives of village communities play a more figurative than actual role and are not qualified to orientate community development, since they only partially participate in designing projects.

With regard to good governance, RFA are used in ways that do not conform to the rules governing the use of public funds. Other factors contribute to the lack of transparency in the management of these funds: (i) payment of RFA not following a specific schedule, (ii) controversies arising from undefined allocation of council RFA between investment and functioning, (iii) lack of training for elected representatives and council staff, and (iv) poor control mechanisms of council operations by the supervisory authority.

These problems are not always the result of an intention by council authorities to embezzle funds. However, they affect relations between the people and council authorities, and instead of working toward common local initiatives, local communities become a forum for the expression of the passions of local stakeholders.

Implementation and Control Challenges

Although the 1994 forestry law grants several types of tax benefits to village communities living around a forest under exploitation, only the forest royalty percentage has been codified in a sufficiently detailed and specific legal framework. The absence of implementing instruments makes it impossible to determine both the percentage of felling tax to be applied and the proportion of the selling price of forest products reserved for the populations.

A description of practices concerning the commitment and liquidation of expenses at the level of councils has revealed that procedures are not adequately applied because councils either leave out some stakeholders, deliberately violate the rules, lack understanding of their roles, or pressure from the authorities. Generally, regulatory instruments are not respected, funds are not managed with sufficient transparency, and the state does not assume its functions of following up and controlling council management. Another problem deserving special attention is the lack of training for stakeholders involved in the management of council revenue, namely, elected representatives and council staff.

Control by MINEF staff is very limited. Insufficient collaboration between MINEF and PSRF makes it difficult for PSRF to carry out such control, especially in making sure that all timber felled is taxed.

One of the major limitations of MINEF is the lack of material and human resources. One way of surmounting this limitation is to implement the institutional capacity-building strategy through the Forest and Environment Sector Program (FESP), which is being perfected.
Impact of the Various Taxation Instruments on Key Stakeholders

Impact of Forestry Taxes on Concessionaires

The reform has led to an increase in the total amount of taxes per m³ of timber harvested. Combined with the implementation of management plan requirements, this reform has affected forest operations. Significantly, initially, there was uncertainty in the early stages of implementation of the new regulations; the complexity of the changes and the poor administrative capacity of the forestry sector resulted in some company malpractices. Illegal logging increased during a transition period (1999-2000), but the situation has since improved with the help of an independent observer of the forest control who has been hired by the government to work closely with the central control unit.

As mentioned, the per-hectare yield of timber species has increased; a wider range of timber species are harvested as a consequence of both the laws and the marketing strategy of the companies.

The biggest concessionaires are now engaged in developing and implementing management plans for their concession, which involves a greater respect for forest operational planning and a rationalization of road constructions. More than 25 management plans have received technical approval by the forest administration, and the companies concerned will go into the final convention.

The general impression in the sector is that the reforms have been implemented mainly by formal companies that complain of the tax burden. In the meantime, an informal sector was developing. The scarcity of timber to supply the mills and a growing local market for sawed wood have encouraged production and trade by an informal sector. Figure 2-1 shows the evolution of the production, export, and volume of logs entering the factories since 1991.

Entering the Factories

The volume of sawed wood exported currently stands at nearly 700,000 m³ per year. Domestic consumption of sawed wood in Cameroon stood at nearly 450,000 m³ in 1996/1997 (MINEFI 1998), representing the equivalent of more than 2 million m³ of unprocessed timber for a processing output of approximately 25 percent.

There are about 12 species of timber, which annually represent 85 percent of national production. An analysis of statistics of the different species exploited shows the predominance of the ayous and the sapelli at the national level, as these two species regularly represent 50 to 60 percent of the national harvest. The contribution to national production of 65 to 75 other species is marginal. The output of a few species (harvest per hectare) has been spectacular, but harvest generally remains centred around traditional species. Production has increased mainly because of an increase in the output of the 12 main species, whose contribution to overall production is 85 to 90 percent (Figure 2-2).
These increases can be explained in several ways. One is to consider that these are species present in previously exploited forests, but were either not harvested or harvested in small quantities because of market availability. Another explanation is that the increases are the direct result of sustainable forest management norms that require the company to include more than 20 species in their management plan. This trend is reinforced by the increase in processing capacity.

**Impact of Forestry Taxes on Processing Industries**

The combined effect of the log ban since 1999 and the tax reform has been a greater industrialization of the sector, as evident by the industries established with an installed capacity that now exceeds the natural possibility of the forest if sustainable management standards were respected. In effect, the granting of authorizations has long been subject to the establishment of processing plants by the companies concerned.

Moreover, the scarcity of supplies for factories has caused some operators to adopt long-term industrial practices characterized by alliances among industrial groups spe-
cialized in the processing and development of industrial woodwork, which allows for better use of raw materials. A study ordered by the government in 2002 to assess the performance of the timber industry shows that the forestry sectors fiscal reforms have led companies to increase their processing yield since 1998 by several percentage points as a result of the scarcity and increased cost of raw materials; an increase in productivity has also been observed. The study indicates that timber recovery efforts have been generalized, and all the companies have set a target of a 60 to 70 percent yield.

**Impact of Forestry Taxes on the Local Populations**

The proportions of RFA given to councils and communities, and the 1,000F per m3 contribution toward the provision of social services in sales of standing volume, are aimed at supporting local development. Although concrete social achievements are sometimes visible in the areas benefiting from such instruments, the goals of these taxation instruments are far from attained in the areas supposed to benefit from them (CIRAD/I&D 2000; Nzoyem 2003). There is, however, reason for hope in new strategies developed by the newly elected municipal authorities turned tax managers, who will also have the support of development partners.
Conclusion

Suggestions for Future Tax Reform and Implementation Challenges: Areas of Future Research

Forestry taxation reforms in Cameroon have been especially affected by the 1999/2000 economic and financial audit. Taking stock of the implementation of these reforms constitutes a current priority. Evaluating the performances of the instruments put in place and learning lessons from past performance will help improve taxation procedures. This will also make it possible to take advantage of the lessons learned from the experience of Cameroon.

In recent years, the small-scale and informal processing of sawed timber has gained considerable importance (the equivalent of about 1 million m³ of unprocessed timber), representing about one-third of national production and more than one-half of the volume entering factories. The state has not developed a framework for this sector. There is therefore an urgent need to regulate the development of this sector to channel its revenue-generation potential for the use of the national economy and to limit its negative effect on the sustainable management of forest resources.

Cameroons geographical location in central Africa and the nature of its infrastructure are such that neighboring countries (the Central African Republic, the Republic of Congo) export their timber via Cameroon. In addition, the current policy in Cameroon, which prohibits the exportation of logs, is not applied in other countries of Sub-Saharan Africa. Therefore, the regional context should be considered in attempts to design harmonized policies aimed at reducing current barriers that impede the competitiveness of Cameroonian producers.

In overall terms the difficulties faced by the forestry sector in Cameroon result from a lack of complementarity among different aspects of the sectors policy, compounded by malfunctioning entities in charge of the management and control of forestry activities. These would need to be addressed on a priority basis.

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CHAPTER 3: GHANA BACKGROUND PAPER

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Introduction

Ghana has a total land area of 238,537 km² and, according to the 2000 census, a population of 18.9 million, with an annual growth rate of 2.6 percent. In 2001 Ghana’s gross domestic product (GDP) was US$5.3 billion. Agriculture, including forestry, is the strongest sector in the Ghanaian economy, providing 43 percent of GDP, 50 percent of export earnings, and 70 percent of total employment. As a subsector, forestry accounts for 5–6 percent of GDP and 11 percent of export earnings. In 2002 timber exports earned Ghana US$183.3 million. Exports of timber products are the fourth largest foreign exchange earner after minerals, cocoa, and tourism.

The forests provide the required environment for the production of Ghana’s export crops, such as cocoa. The forests also account for 75 percent of Ghana’s energy requirements in the form of fuelwood and charcoal. Forestry forms a key component of Ghana’s poverty-reduction strategy.
**Resource Base**

Like other tropical countries with abundant forest resources, Ghana has in the past experienced high rates of deforestation. Recent policy interventions in the forestry sector have focused on correcting this imbalance in resource harvesting. Ghana’s humid forest zone covers about one-third of its land area, or 82,000 km². Approximately 20 percent of the forest zone has been gazetted as forest reserves. Most of the reserves were legally constituted between 1920 and 1960 for purposes of production and protection. However, the latest national forest inventory results show extensive degradation in some of these reserves.

Although the annual allowable cut of timber from both reserved and off-reserve forests is estimated at 1 million m³, recent studies have placed the annual log production at 3.4 million cubic meters (Birikorang 2001; Awudi and Davies 2001. These recent estimates bring into question the effectiveness of recent policy and institutional reforms to address issues of forest management, particularly the monitoring of the existing resource and the control of illegal logging.

**Fiscal Policy Review**

The Forest and Wildlife Policy of 1994 contains a number of guiding principles that ensure the flow of benefits to all segments of society. In this regard, fiscal policy reviews have targeted the following:

- “Forest and wildlife fees and taxes to provide incentives for encouraging more rational and less wasteful utilization of the resource. These reviews are market based and aim at increasing production of value-added wood products for export.”
- Ensuring that “a share of financial benefits from resource utilisation is retained to fund maintenance of resource production capacity and for the benefit of local communities.”

However, forestry revenue systems in Ghana have been neither efficient nor effective to support or provide incentives for both sustainable forest management (SFM) and the development of the forestry industry over the years. There has been a long-standing debate about the effectiveness of forest fees and forest pricing policies and the extent to which their stated aims of raising forest revenues and encouraging good forest management practices (and even SFM) are compatible.

At present forest pricing policies have not provided adequate incentives for good forest management and development of an efficient forestry industry. Most of the fees and charges are currently outdated, having been established around the time of Ghanaian independence in 1957, when development and political theory stressed a leading role by the public sector. Many developing countries, such as Ghana, confronted with balance of payments and government deficit crisis, have resorted to a reduction in the role of government in forest management and forestry industry development. In particular, the private sector is viewed as the vehicle for future
growth and development in the forestry sector; hence the need for appropriate fiscal policies to drive the change.

In Ghana the latter part of the 1980s saw the first attempts by government to liberalize financial and product markets through engagement of the private sector in its divestiture of state interests in the forestry sector. More recently, debt, governance, law enforcement and poverty-alleviation issues have been the focus of government reform that emphasizes public accountability of government agencies, increasing the participation of the private sector, civil society, and law enforcement (Rhein 2002).

The forestry sector in Ghana has attempted to address the immediate symptoms to these emerging issues with a series of short-term decisions, which have tended to exacerbate institutional and economic problems rather than correcting the underlying causes of the distortions.

The challenge for the Forestry Commission (FC) and the Ministry of Lands and Forestry (MLF) over the last few years has been the following:

- Engineer the reversal of the inefficiencies in the forest revenue system and move toward meeting the fiscal policy objectives of the forestry sector
- Engender rapid development of the forestry and wildlife sector
- Increase the forest cover in Ghana
- Establish structures for collecting and analyzing forest data.

This chapter discusses recent forest policy reforms in the forestry sector in Ghana but focuses on the fiscal and taxation policy reform measures and the use of market-based instruments to improve forest management and the development of an efficient forestry industry. In addition, the chapter reviews the introduction of cost-effective regulatory mechanisms that have positioned the government to capture a larger proportion of the forest rent for the resource owner and manager. The skewed distribution of resource rent has been a consistent barrier to progress in forest management and the development of an efficient forestry industry. Specific policy measures discussed include the following:

- Ban of exports of logs and chainsaw lumber
- Introduction of competitive bidding for timber rights
- Rationalization of stumpage and other forest and forestry industry fees and taxes.

The constraints, challenges, and opportunities in the implementation of these reforms are also presented.

**Recent Policy Reforms**

Recent policy reforms introduced to enhance sustainable forest management, better utilization of the forest resource, and the flow of benefits to forest communities include the following:
• Suspension of log exports in 1995
• Introduction of interim measures to harvest timber in a sustainable manner. These measures involved the community in the process of monitoring forest harvesting, developing forest legislation, and controlling illegal logging and chainsaw activities. Chainsaw operators are being mobilized and provided with alternate productive ventures so as to control chainsaw logging and lumbering operations. Illegal logging in Ghana is to a large extent limited to the domestic market, particularly chainsaw activities and those of forest communities that require wood for housing. Identifying mills that will produce for the domestic market and for which incentives such as access to raw material is provided, are initiatives aimed at addressing this problem. Ghana is however open to working with the international community in addressing the issues of illegal trade in wood products and would encourage bilateral and multilateral approaches to address the problem.
• Introduction and implementation of the Timber Resources Management Act, 1999 (Act 457), as amended by The Timber Resources Management (Amendment) Act, 2002 (Act 617), that incorporates competitive bidding in granting timber harvesting rights, providing the main mechanism for achieving the goals and objectives of sustainable forest management.
• Provision under the regulations of the Timber Resources Management Act to review quarterly the stumpage fees to ensure appropriate pricing of timber and other forestry-based products in order to increase revenues and address the problem of underpricing of forestry resources.
• Introduction of procedures for disbursement of revenues to ensure equitable distribution of benefits to communities, resource owners, and farmers as a way of facilitating the effective participation of all relevant stakeholders in the sustainable management and development of the resource.
• Rationalization of the timber industry through taxation and incentives aimed at encouraging further domestic processing. Export levies have been introduced on primary processed products and timber that have a low resource life in Ghana’s forests and are exported as air-dried timber. Exemptions from levies have been granted for exports in value-added form and in lesser used species.
• Removal of export duties on imported raw material to promote processing for re-export through free trade zones that have been created.
• Plantation development through legislation to rationalize land acquisition and the flow of benefits to landowners. Land management and review of land acquisition procedures are key components of Ghana’s poverty-reduction strategy.
• Institutional reform of the forestry sector reflects the integrated approach to sustainable forest management. Reforms have resulted in creation of the Ghana FC as an umbrella organization with divisions responsible for wildlife, forestry, and trade. Bringing together public and civil service organizations that have differences in their culture and management styles are a key challenge for the forestry sector in Ghana.
• Development of the domestic market for wood products through the provision of incentives and implementation of a quota system to ensure availability for domestic use.
General Overview of Key Fiscal and Taxation Instruments

The key fiscal and taxation instruments introduced in the forestry sector policy framework indicated above are the following:

- Introduction of competitive bidding for granting timber harvesting rights
- Review of stumpage rates and related fees
- Introduction of levies to discourage the export of primary species and products
- Implementation of export duties for primary timber products
- Removal of import duties on imports of logs
- Granting of exemptions to encourage both further domestic processing and the utilization of lesser used species.

Fiscal Policy Reform Process

This section reviews the fiscal policy reform process and further discusses the measures and constraints to implementing fiscal policy reforms. The fiscal reform process started in 1993 when a forest fiscal study was prepared based on a technical and financial audit of Ghana’s timber industry (General Woods and Veneers Ltd. 1993). This work was updated (General Woods and Veneers Ltd. 1997) and addressed the restructuring of the wood industry.

These studies concluded that the forest revenue system was inefficient and ineffective, resulting in difficulties in the administration of fiscal systems. Moreover, sector agencies were shown to require substantial subventions from both government and donor agencies.

The study by Birikorang (2001), financed by the Department for International Development (DFID) within the ongoing Natural Resource Management Program, identified a range of options to deal with the impact of lapses in the implementation of forest fiscal measures, particularly the log export ban and import tariffs. Five options were developed, three of which presumed the continuation of the log export ban. The other two options recommended relaxing the ban provided previously uncollected rent was captured through either auctioning of a log export quota or imposition of a log export tax. This greater capture of economic rent through export tax or auction coupled with increased stumpage rates was to act as a fiscal incentive to improve industry conversion efficiency.

Birikorang’s study was followed by two further reviews of the forest revenue system and financial support for sustainable forest management in Ghana. The first review (Awudi and Davies 2001) recommended that an action plan be agreed upon in order to introduce a series of fiscal and regulatory measures to tackle the unsatisfactory harvesting and collection and distribution of wood rent. The review further noted that the action plan should include a decision on the option to be taken on the export ban of logs.

The second review by Treue (2001) also noted that the package of restrictions on log exports, forest taxes, and fees, and the modalities for granting timber rights to standing timber, have produced unfortunate incentives. Treue noted that these fiscal measures
created an overcapacity in the timber industry, resulting in the loss of massive official revenues, and promoted a notorious overharvest of the most valuable timber species. The value-added by the wood processing industry was also shown to be low and, for some products, negative.

In response to these studies and policy reviews, in 2002 the MLF set up a Policy Advisory Committee (MLFPAC) led by the private sector. The MLFPAC comprises representatives from the private sector, Parliament, civil society, academia, and the public sector. The MLFPAC submitted its recommendations to the MLF after extensive consultations with various stakeholders and technical inputs from the public sector. The Ministry in turn submits recommendations received from MLFPAC to the cabinet for approval. Recommendations that require parliamentary approval are then submitted to Parliament. Figure 3-1 illustrates the policy reform process.

Figure 3-1 reveals a strong lobby by the trade associations and the absence of consultation among the private sector bodies. It is hoped that over time the process will evolve to encourage broader interaction among the stakeholders, particularly private sector bodies. However, currently this is addressed through representation on the MLFPAC and the board of commissioners of the Ghana FC.

The MLFPAC recognized that a major drawback of administrative approaches is that, politically, it has proven difficult to maintain the real value of the charges. Stumpage fees are a good example. They undermines the financing of services to stakeholders. Perhaps more importantly, it is difficult to establish the correct “price”—for example, of a timber utilization contract (TUC). This is especially true when the FC has a monopoly on granting timber and wildlife rights (Rhein 2002).

Competitive price bidding for timber rights is a fundamental feature of the Forest and Wildlife Policy (MLF 1994), which called for the “award of timber rights on the basis of competitive bidding and periodic audit of forest utilization operations to ensure compliance with forest management specifications and environmental protection standards.” These reforms challenge some vested interests in the sector. To fully develop a comprehensive and rational fiscal and taxation program for the timber industry, MLF has initiated a consultative program involving all the primary stakeholders in discussion of the issue.

**Key Fiscal Policy Reforms**

The forest fiscal policy reform measures already approved by the government include the introduction of an open and transparent system of public competitive bidding for timber rights, adjustments to stumpage fees for timber, and an improved revenue collection system.

A package of taxation reforms and incentives has been prepared as part of a program for the rationalization of the timber industry, and a number of fiscal reform options require stakeholder discussion and negotiation. Lack of these measures has contributed
to low revenues to the state and resource owners, insufficient revenues for the regulation of forest resources, high collection costs and inadequate recovery, and adverse incentives for the achievement of stated forestry and developmental policy goals.
**Transparent and Efficient Allocation of Timber Resources and Competitive Bidding**

In 2001 the government revised the timber allocation procedure following requests by the timber industry, landowners, and other relevant stakeholders for a review of the TUC allocation procedures. The former allocation process was fraught with political influence and lacked fairness, equity, and transparency. The framework for allocating the resources, the Timber Resource Management Act, 1997 (Act. 547), and the accompanying Timber Resources Management Regulations (LI 1649), had serious inherent weaknesses, including the provision permitting the unlimited number and area of TUCs allocated to a single company.

In response the MLF embarked on a comprehensive review of the system, since it believes that the equitable allocation of logging permits is one of the litmus tests in ascertaining government commitment to transparency and good governance. The use of market-based instruments within an appropriate regulatory framework is also recognized to be the key to sector performance.

Currently, a competitive bidding framework has been developed on both technical and financial criteria that will be mandatory in the award of all timber rights on the basis of price offered by timber companies on both reserve and off-reserve areas. The competitive bidding framework has been based on the specific provisions of the Timber Resources Management (Amendment) Act, 2002 (Act 617), and the Timber Resources Management (Amendment) Regulations, 2003 (L.I. 1721), as well as specific policy reform directives of the cabinet.

In revising the allocation procedures, care has been taken not to crowd out the small- and medium-scale enterprises, since their level of capitalization will not enable them to compete fairly with large companies in an openly competitive market. MLF has also classified timber contractors into three groups of small, medium, and large to facilitate a fair and equitable competitive bidding process.

Thus, TUC bidding has been structured in such a way that contractors within each group would have a fair chance of getting access to the resource while paying the appropriate economic rent or value without sacrificing transparency.

The major advantages of the competitive bidding system include the following:

- Good governance promoted through the establishment of transparency and competition at all stages of granting timber rights,
- minimal corruption and other malpractices in the allocation process, and minimal industry transaction cost and the FC’s own administrative cost.
- Increased revenue: Competitive bidding will ensure that earnings from timber resources are optimized and provide a means of “mopping up” industry resource rent and equitably distributing the incremental gains for the benefit of resource owners, communities, and the country in general. Information on revenue and its distribution is currently published and posted on the Ghana FC website to encourage transparency and good governance.
• Good forest management: TUC holders will be responsible for forest management and forest protection. Exercising these responsibilities will be enhanced by
• “property rights,” as an inducement to behave responsibly; and
• the timber rights fee (TRF), as an area-based charge will be an incentive for prospective TUC holders to follow best practices.

Increased Stumpage Fees for Timber and Improved Revenue-Collection System

Despite the importance of the contribution of stumpage fees to forest revenues, the Forest Services Division has proved unable (or unwilling) to collect the full amount owed (Awudi and Davies 2001).

The World Bank estimated that in 1988 fewer than 25 percent of stumpage revenue was collected. The collection rate dropped below 20 percent in 1992 but increased again to about 92 percent in 1998 as a result of the outsourcing of the debt collection function to a debt-recovery agency.

Low stumpage collection rates are partly attributable to the inability of the Forest Services Division to collect stumpage due on the legal harvest and impose any control on the production and transport of illegal logs. This also highlights the lack of an adequate information system, and the deference of staff to the timber industry, particularly loggers.

The deferment of stumpage payments and a reluctance to chase non-payers resulted in significant debts by the mid-1990s. An agreement was reached in 1995 to pay by installments, and sporadic attempts were made to recover stumpage debts. In 1998 a government agency (which keeps 10 percent of recovered debts as its fee) was contracted to recover, if necessary through the courts, unpaid royalties (Awudi and Davies 2001).

Generally, rent capture rates have remained very low over the years in Ghana. Gillis estimated that in the early 1970s Ghanaian timber rents were, on average, 26 percent of the log output value, although for some very desirable species, rents were as high as 80 percent of the log value (Baytas and Rezvani 1993).

Birikorang (2001) calculated that stumpage fee payments in 1999 amounted to €15.7 billion, equivalent to 8 percent of potential stumpage. This is an important element in the under-pricing of forest resources and in encouraging the waste and inefficiencies that characterize logging and wood processing. This is exacerbated by the actual low collection rates and the subsequent opaque disbursement of funds amongst the traditional authorities and district assemblies. The majority of households in communities adjacent to forests perceive few tangible benefits. These conditions are powerful disincentives for the adoption of sustainable forest management practices and explain the collusion in chainsaw lumbering.

Treue (2001) estimated that low stumpage and other forest fees and taxes resulted in lost mean annual forest revenue of up to US$11 million between 1993 and 1996. He
further indicated that appropriate political interventions would help address the imbalance and lead to sustainable financial incentives for protection and sustainable forest management. This can be done by redistributing the wealth from timber exploitation by implementing market mechanisms. This however requires political commitment.

MLF has initiated measures to increase stumpage fees to be implemented over a period of nine months during 2003. On average, this will result in an increase from US$3 to US$12 per cubic meter. It is expected that revenue will increase by about €14.8 billion annually when the full increases are implemented. These increases have caused industry to react strongly and culminated in the commissioning of a study on fiscal policy and taxation within Ghana’s forestry sector.

**Export Levies on Air-dried Lumber**

Export levies have been imposed on air-dried lumber. Although the law was passed in 1994, it was not until September 1997 that it could be implemented because of resistance and lobbying from the timber industry. This levy is targeted at reducing harvesting on timber with low-resource life in Ghana’s forests and at redirecting mills toward further domestic processing. These levies are currently imposed on nine primary species at various levels (Table 3-1).

Comparative statistics on annual log production for the species attracting levies indicate substantial reductions in the volume of harvesting within three years of implementing the policy. The levels of reduction in log production reflect the intensity of the levy, showing the effectiveness of the policy intervention.

**Log Export Ban**

The log export suspension was introduced at a time of high demand for logs by the Far East prior to the Asian crisis. This high demand led to harvesting levels that were not sustainable and created a problem for monitoring and effective control of log production. The suspension was a temporary measure to allow monitoring systems to put in place and ensure that domestic industry had access to raw material to continue the availability of employment. A number of studies have raised questions about the rationale for the continued suspension. The Ghana Timber Association, a loggers group, has lobbied for the removal of the suspension, while the Ghana Timber Millers Organization has lobbied for the continued maintenance of the suspension because of growing domestic demand for logs, which studies have shown exceeds the annual allowable cut. The challenge for the MLF and the FC will be to balance the interests of the two groups while optimizing revenue from the harvesting of logs. As mentioned, logs are undervalued, resulting in low stumpage values.

**Taxation Reforms**

The timber industry makes a significant contribution to the total tax revenues collected. For example, in 2002 the Internal Revenue Service collected US$5.5 million (approxi-
TABLE 3-1. EXPORT LEVIES ON AIR-DRIED TIMBER

<table>
<thead>
<tr>
<th>Species</th>
<th>Levy (percent)</th>
<th>Log Production 1996</th>
<th>Log Production 2000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Afromosia</td>
<td>30</td>
<td>919</td>
<td>19</td>
</tr>
<tr>
<td>Hyledua</td>
<td>15</td>
<td>2,539</td>
<td>145</td>
</tr>
<tr>
<td>Odum</td>
<td>15</td>
<td>66,720</td>
<td>24,857</td>
</tr>
<tr>
<td>Edinam</td>
<td>10</td>
<td>22,583</td>
<td>11,527</td>
</tr>
<tr>
<td>Mahogany</td>
<td>10</td>
<td>20,814</td>
<td>7,011</td>
</tr>
<tr>
<td>Makore</td>
<td>10</td>
<td>59,550</td>
<td>26,170</td>
</tr>
<tr>
<td>Sapele</td>
<td>10</td>
<td>21,904</td>
<td>12,769</td>
</tr>
<tr>
<td>Utile</td>
<td>10</td>
<td>7,351</td>
<td>2,709</td>
</tr>
<tr>
<td>Wawa</td>
<td>10</td>
<td>435,788</td>
<td>288,846</td>
</tr>
</tbody>
</table>

Source: Timber Industry Development Division of the Forestry Commission, Ghana.

mately €49.1 billion). This is in addition to the non-revenue taxes collected by the FC and the MLF.

Generally, the tax policy prevailing in the timber industry is no different from the other sectors of the economy except the mining industry. Under the Income Tax Act, 2000 (Act 592), taxes are imposed on income from business, employment, and investment. Box 3-1 presents a summary of the taxes imposed on the timber industry.

All taxes administered by the FC and/or the MLF are considered operational expenses incurred wholly, exclusively, and necessarily in the production of income and, therefore, allowed as a deduction against the person’s income before ascertaining the chargeable income of that person.

Tax incentives applicable to the timber industry are no different from those prevailing in other industries in the country. The tax incentives include the following:

- All outgoings and expenses wholly, exclusively, and necessarily incurred by the industry are deducted prior to tax.
- Research and development expenditure not subject to tax
- Capital allowance
- Foreign exchange loss
- Carryover of losses
- Location incentive.

The inability of past government’s to rationalize taxes and update stumpage rates according to existing regulations had actually reduced to almost one-third the revenues that should have been collected in 2000/2001. It was realized that the system could not be improved simply by fine-tuning taxation rates, but only by a thorough review and upgrade.
In the interim, however, the cabinet has approved a series of measures to rationalize and consolidate forestry industry taxation without sacrificing national revenue objectives, including the following:

- A review of the current taxation rate of 8 percent payable on exports of veneers, plywood, boules, and other wood products classified as “nontraditional” exports and deemed unjustifiable. The new decision is that exports of all unfinished products, including veneers, boules, and so on, should receive the full corporate tax rate of 32.5 percent. Only the income from export of finished products, such as knockdown furniture, should receive the nontraditional export rate of 8 percent. This however requires a legislative amendment.

- A review of location tax exemptions and rebates enjoyed by wood processing and logging companies located in southern Ghana. Only companies situated in the Volta, northern, upper east, and upper west regions areas that are mainly outside the timber-producing zone are to be granted location incentives.
An overhaul of the forest taxation system should not necessarily entail large increases in the overall taxation level that most forest companies currently pay. Such an overhaul would focus primarily on rationalizing the multiplicity of taxes while expanding the taxpayers’ basis, rebalancing upstream and downstream taxes and bringing into the open the hidden costs and informal payments that logging companies must currently pay to obtain permits and stay in business.

**Constraints to Developing and Implementing Forest Fiscal Policy Reforms**

Until recently, the central government and its related agencies and, for that matter, the public sector had the sole prerogative to raise or determine, collect, and review forest fees through an act of Parliament. The engagement of the MLFPAC has facilitated the consultative process. However, the strong political lobby of the trade sometimes constrains the implementation of fiscal policies, particularly in periods of depressions in the world tropical timber trade.

Land and forest policy are closely interlinked and influence fiscal and taxation measures; changes in land and forest policy reflect the balance of power between central and local government and the traditional authorities. However, the development of both land and forest policy have not provided the necessary framework to facilitate fiscal reform to reflect current demands. Box 3-2 presents the current key policy issues that constrain taxation and fiscal reforms and that need to be addressed within the forestry sector.

**Resource Pricing and Review Mechanism**

Prior to 2002, forest resource pricing was not based on market forces. For example, forest fees and charges, including stumpage fees, were only reviewed in April 2003 after five years, since they were last set in 1998 by the Timber Resources Management Regulations, 1998 (LI 1649). Stumpage fees and other charges and fees were not indexed to the value of the cedi, meaning real values for forest products were not realized over time. The legal process required to review these changes is cumbersome and does not enhance the adjustment of fees and charges to reflect the economic levels. For example, available records indicate that although the nominal rate for timber tree species doubled between 1992 and 1997, in constant cedi terms their stumpage rates halved over the same period. It is estimated that the FC may have lost about US$6 million in revenue within that period (Forestry Commission 2001). Box 3-3 presents key issues of stumpage rates that need to be addressed.

**Distribution of Forest Revenue**

Another fiscal policy constraint is the inequitable distribution of the economic rent of timber, which has led to resource under valuation. The distribution of economic rent
Box 3-2. Key Issues in Land and Forestry Policy Reform

1. Land and forest timber rights that have influenced fiscal and taxation measures but have not provided an incentive for sustainable forest management (or plantation establishment).

2. The financing of the FC, sharing of stumpage with other institutional stakeholders, and reserve forest management accountability issues that remain to be resolved satisfactorily.

3. Introduction of competitive bidding included in the Government of Ghana/International Monetary Fund agreement but yet to be fully implemented.

4. Lack of a comprehensive database of concessions, permits, and so forth, and audit of forest management and condition.

5. Currently unknown status of the initial allocation of 42 TUCs; unclear legal status of timber utilization permits and salvage permits.

6. Whether existing concessions will be converted to TUCs (with social responsibility agreements (SRAs) and timber-right-fee payments, or equivalent, and performance bonds).

7. Whether sizes of TUCs are viable for forest management or cost effective.

8. Whether a clearer distinction can be made between commercial and community timber rights (as suggested by Act 617). Question of whether chiefs and communities can declare areas within reserve and off reserve to be “dedicated or community forests.” Whether in such off-reserve areas communities or farmers can harvest, use, or sell timber trees (for “local” use, including chainsaw lumber production).

9. Plantation development: ownership, rights and obligations, and benefit-sharing arrangements to be defined and backed by law.

Box 3-3. Key Issues in the Review of Stumpage Rates

1. Inventory analysis suggests realignment of species for required stumpage. Options are still to be discussed.

2. Stumpage adjustment included in the Government of Ghana/International Monetary Fund agreement, although measures yet to be fully implemented.

3. Adjustment of stumpage expected to bring weighted average fee to US$12 per m³, which is still low: previously, a range of US$25–50 per m³ was under consideration in the mid-1990s.

4. Continuation of stumpage indebtedness. Present status of stumpage arrears (arrears unrecoverable, to be recovered) to be determined. Requirement to clear arrears is included in competitive bidding for TUCs and plantation timber but not applied consistently to property marks renewal.

5. Whether ratio of shares between FC and other stakeholders should be readjusted for reserve and off reserve.

6. Whether portion of FC’s stumpage revenues should be hypothecated for plantation fund, financing of log tracking, community forestry committees, and forestry research.
was skewed in favor of the industry and state forest institutions, with landowning communities receiving negligible amounts with unacceptable delays (sometimes up to about two years) through a system that was impracticable and lacked transparency. The economic rent of the wood resource collected by the government and paid to the forest-owning communities decreased with the devaluation of the cedi, providing higher profit opportunities to the formal industry (timber processing sector) and little incentive to improve efficiency of the industry or prevent illegal felling of trees in the forests (Awudi and Davies 2001). Table 3-2 shows the distribution of the country’s stumpage (economic rent or forest rent).

The low level of the share of revenue that goes to both government (resource manager) and the landowner (resource owners) does not encourage good forest practice and commitment by the community to guard and protect the resource from illegal activities.

**Weak Regulatory and Institutional Framework**

Lapses in fiscal policy implementation and regulatory controls that have led to a general decline in forestry sector performance since the 1990s represent another fiscal policy constraint. The timber industry dominated the scene and was allowed to pay undervalued prices (stumpage) for the wood resource to the detriment of the resource owners and the government. The Ghana Timber Association estimates that the cost of wood delivered to the mill (for lower value species) was approximately ¢200,000 (US$28) per m³, which is a low log delivery cost, particularly when compared with a weighted average export value for lumber of US$330 per m³. Fiscal revenues also declined in dollar terms in reference to overall logged volumes, since stumpage fees (denominated in the Ghanaian currency) were not adjusted to reflect adjustments in the exchange rate. This situation is attributable to, for instance, stumpage fees charged per cubic meter, which declined from US$12.0 in 1997 to US$2.7 in 2002.

**Table 3-2. Potential Stumpage and Its Distribution**

<table>
<thead>
<tr>
<th></th>
<th>1991</th>
<th>1999</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated total potential stumpage</td>
<td>US$28 million</td>
<td>US$42 million</td>
</tr>
<tr>
<td>Distribution of stumpage:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Government and landowners</td>
<td>5%</td>
<td>13%</td>
</tr>
<tr>
<td>Loggers</td>
<td>54%</td>
<td>5%</td>
</tr>
<tr>
<td>Processors</td>
<td>41%</td>
<td>82%</td>
</tr>
</tbody>
</table>

The plethora of forestry and wildlife fees, and the attendant lack of efficiency in collection of these fees, means that the real values of stumpage and the other miscellaneous forest fees have fallen as the costs of fee collection have grown. There has therefore been insufficient logistical support for fee-collection tasks (Awudi and Davies 2001). No specific data on the extent of this problem exists, but the low revenue recovery is indicative of inefficiencies in the system.

Currently, legislation, regulations, and codes of practice, which are in place to promote fiscal and taxation measures, are either inadequate or not properly enforced because the forestry sector agencies and some revenue-generating agencies under the Ministry of Finance and Economic Planning are weak, under-resourced, and suffering from low morale. There is also the problem of lack of effective intra- and intersectoral coordination among these agencies.

Table 3-3 shows current forest charges collected by the Forestry Commission (FC). Wood product exporters pay some additional charges. Many of these charges were established around the time of national independence and have seen very little revision despite the changes in the exchange rates and policy direction.

**Narrow Species Base**

Another major problem has been the dependence of the timber industry on a few species, resulting in the “creaming” of the most valuable species in commercial quantities and leaving a large number of species not commercially exploited. In the past this has led to considerable unmanaged and uncontrolled overcutting of the high-forest resource by formal and informal operators—for example, chainsaw operators. This situation, however, is currently being addressed through the introduction of variable stumpage rates that favor the lesser used species. Moreover, the production and export of these species have been supported by exemptions from export levies and grants under a project sponsored by the European Union.

**Inefficient Processing Sector**

The wood processing industry has in effect been heavily subsidized (low stumpage rates and under pricing of timber) as well as highly protected indirectly through the log export ban and import tariffs. This has led to overcapacity and low efficiency levels throughout the wood processing industry, which fell from 68 percent in 1990 to 52 percent in 1995 and to 37 percent in 1999. The rate of conversion of timber through chainsaw lumber production was as low as 20 percent.

Inevitably, the low product recovery rates in the wood industry subsector led to unsustainable levels of timber exploitation to compensate for more revenue at the expense of resource sustainability. Box 3-4 presents key issues that need to be addressed further to rationalize the industry and ensure the implementation of market-based mechanisms.
### BOX 3-4. KEY ISSUES TO RATIONALIZE THE INDUSTRY AND IMPLEMENT MARKET-BASED MECHANISMS

1. The present MLF position is that the ban remains. The decision could be revisited after the ongoing reforms are completed, measures for log tracking are implemented, and the situation is adequately reviewed. Previous arguments against lifting the ban included the need to improve the efficiency of the wood processing industry and the introduction of competitive bidding. MLF acknowledges that the ban depresses local log prices, which in turn makes formal wood processors unable to compete with informal chainsaw lumber, partly also the result of inefficiencies in domestic mills.

2. The regulation that the MLF can direct TUC holders to supply the domestic market has not been successful. MLF is unable to provide price support. If the prices were right, the mills would supply the domestic market.

3. The MLF estimates that chainsaw lumber provides employment for 50,000 and generates €1.8 billion in income (informal payments).

4. The negative and positive impacts of chainsaw lumber production on the rural poor are poorly understood and not quantified.

5. MLF accepts that chainsaw production cannot be controlled by legal measures and seeks to “accommodate” operators “under the law” to engage in alternative livelihood programs, as well as encourage small-scale processing with mobile mills, which would require granting some form of timber right.

6. Difficulties can be foreseen in the MLF approach, which is also unlikely to offset local benefits of chainsaw lumber production. The point is to distinguish between community-based and “organized” lumber production.

7. Forest revenues and benefit-sharing arrangements, namely, plantation development and natural forests (to landowners per the constitution) are not equitable.

8. A need exists to link stumpage revenues with regulatory and management costs on a TUC and reserve basis.

9. There is a lack of clear statutory obligations about forest management standards, which can be linked to auditing and performance bond. An independent group, including the Ghana Institute of Professional Foresters and civil-society observers, may need to check compliance.

10. The MLF request that the FC grant annual TUCs to mobile mills to provide lumber to local markets will require a log-tracking scheme to ensure compliance.

11. The government’s strategy for the wood processing sector has encouraged value-added production. Policy instruments chosen have been interventionist rather than market-based. This stems from the Economic Recovery Program (1983–88) in which the forestry industry had a significant role in boosting export earnings and growth.

12. A need exists to consider competitive bidding for export licenses, air-dried lumber, boules, and lesser used species, as well as selected logs. The reserve price would simply be the FC 3 percent levy.

13. Ghana Timber Association (GTA)/Ghana Timber Millers’ Organization (GTMO) have periodically questioned the justification of export levies by the FC but have not been able to support their claims with concrete reasons.
# Table 3-3. Summary and Determination of Forest Charges

<table>
<thead>
<tr>
<th>GFS Code</th>
<th>Royalties and Forest Fees</th>
<th>Determination of Charges</th>
<th>Frequency of Revision</th>
</tr>
</thead>
<tbody>
<tr>
<td>920-005-001</td>
<td>Compensation payments</td>
<td>Negotiation</td>
<td>By negotiation between community and contractor</td>
</tr>
<tr>
<td>920-005-002</td>
<td>Mineral prospecting registration fees</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-003</td>
<td>Fines</td>
<td>Set by courts</td>
<td>Legislative instrument</td>
</tr>
<tr>
<td>920-005-005</td>
<td>Miscellaneous (inspections, sale, abandoned logs)</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-006</td>
<td>Permits: major forest produce</td>
<td>Administrative</td>
<td>Irregular; based on royalty formula</td>
</tr>
<tr>
<td>920-005-007</td>
<td>Sale of minor forest produce</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-008</td>
<td>Concession rent</td>
<td>Legislative instrument</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-009</td>
<td>Royalties from concessions/TUCs</td>
<td>Legislative instrument</td>
<td>Irregular; based on formula since 1999</td>
</tr>
<tr>
<td>920-005-011</td>
<td>Sale of major forest produce</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-012</td>
<td>Silvicultural fees</td>
<td>Administrative</td>
<td>Discontinued</td>
</tr>
<tr>
<td>920-005-013</td>
<td>Taungya fees (agroforestry)</td>
<td>Administrative</td>
<td>Discontinued</td>
</tr>
<tr>
<td>920-005-043</td>
<td>Restocking fees (teak thinning)</td>
<td>Administrative</td>
<td>Discontinued</td>
</tr>
</tbody>
</table>
Table 3-3. Summary and Determination of Forest Charges (Continued)

<table>
<thead>
<tr>
<th>GFS Code</th>
<th>Royalties and Forest Fees</th>
<th>Determination of Charges</th>
<th>Frequency of Revision</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Off Reserve</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Compensation payments</td>
<td>Legislative instrument</td>
<td>Since 1995, negotiation between farmer and contractor</td>
</tr>
<tr>
<td>920-005-014</td>
<td>Royalties from concessions/TUCs</td>
<td>Legislative instrument</td>
<td>Irregular; based on formula since 1999</td>
</tr>
<tr>
<td>920-005-015</td>
<td>Sale of minor forest produce</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-016</td>
<td>Sale of major forest produce</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-019</td>
<td>Processing fees</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-020</td>
<td>Reregistration fees</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td>920-005-043</td>
<td>Restocking fees (teak thinning)</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td></td>
<td>Other</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Registration fees (property mark)</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td></td>
<td>Sale of LMCs</td>
<td>Administrative</td>
<td>Irregular</td>
</tr>
<tr>
<td></td>
<td>Export levy (AD lumber)</td>
<td>Legislative instrument</td>
<td>Formula since 1985 (percent FOB value)</td>
</tr>
<tr>
<td></td>
<td>Export levy (FPIB) and (TEDB)</td>
<td>Legislative instrument</td>
<td>Formula since 1985 (percent FOB value)</td>
</tr>
<tr>
<td></td>
<td>Wildlife</td>
<td>Legislative instrument</td>
<td>Irregular (recently reviewed in 2002)</td>
</tr>
</tbody>
</table>

Challenges and Opportunities

Fiscal and Taxation Measures

It has been noted that low institutional capacity of MLF-sector agencies has hampered the successful implementation of the fiscal and taxation reform measures that have been approved by the cabinet.

Constraints to implementation of the component have been numerous, including low staff morale, inadequate focus on poverty alleviation and capacity development at the local level, inefficient program management, and ineffective monitoring and evaluation systems.

Above all, sector agencies have persisted with a “business as usual” approach—dictated by timber industry interests—with fiscal and regulatory statements that have lagged behind formal policy statements. Consequently, the imbalance between the industry’s capacity and forest resources is widening, the Forest Services Division and forest communities are losing substantial revenues, domestic consumers of timber products are penalized by protectionist measures, and efforts to gain support of forest communities for sustainable forest management are undermined.

Despite the challenges, a number of positive results have been achieved. For example, even though overcutting has not been completely controlled, it has been reduced considerably. Inefficiency in the timber industry has not been completely addressed, but it is hoped that the implementation of competitive bidding, increases in stumpage fees, and the introduction of appropriate incentives, coupled with strict enforcement of existing rules and regulations on forestry management, will force the industry to become efficient.

Distribution of economic rent of timber in natural forest is still skewed in favor of the industry and state forest institutions, with landowning communities receiving negligible amounts of money, primarily because of the current constitutional provisions. However, with the increases in stumpage fees and attendant increases in the Social Responsibility Agreement, the amount of resources going to local communities will be substantially enlarged. Moreover, fiscal revenues have increased to a range of 90–97 percent within the last three years, and stumpage fees, which are now currently adjusted to reflect exchange rate adjustments, have increased.

MLF wishes to initiate a review of forest taxation and fiscal measures, which will engage key stakeholders and lead to a negotiated agreement between the wood processing industry and the government for the reform and rationalization of the fiscal regime that is consistent with SFM. This initiative will also facilitate the development of an efficient and competitive wood industry and introduce transparency and fairness in the sharing of forest rent among constitutional stakeholders while ensuring adequate revenues for financing forest services and an enhanced sector contribution to government revenues.
As a first step, and to create a common understanding of the issues, stakeholders will use secondary data, literature (national and international reports and statistics), and earlier studies to accomplish the following:

- Examine trends in the underlying cost structures and incentive frameworks for the forest industry (both timber operators and wood industry processors) and, specifically, the incidence of forest pricing and taxation and competitive advantage of different forest commodity systems. This involves, among other things, stumpage fees, concession and timber rights fees, export levies, development taxes, and so forth.
- Determine the cost of log production (natural forest and plantation) and processing. This will include logging and marketing costs from different timber rights arrangements, that is, concessions and permits including salvage permits.
- Quantify both informal payments and other transaction costs in the supply chain to domestic and international log and wood product markets.
- Quantify the impact of forest pricing and taxation for each commodity system and distribution of revenues. The analysis will show the profitability and protection of each system and, hence, the extent of the divergence (if any) between private (financial) and social (economic) costs and benefits; that is, to what extent have government and market failures driven a wedge between financial and economic profitability.
- Assess the efficiency of the forest industry in the sustainable production of logs.
- Examine the influence of extrasectoral policies and instruments on the performance of the forestry sector, such as exchange and interest rates, taxes and subsides, and trade liberalization.

On this basis of a number of hypotheses, practical proposals and reforms will be developed. Each would be expected to show the impact upon (a) industry competitiveness, (b) revenue distribution to forestry sector stakeholders and the net contribution of the sector to government revenue, and (c) stimulation of sustainable forest development and the resource base. It would then be expected that an agreement and program of implementation for the reforms would be negotiated.

**Monitoring, Enforcement, and Governance**

*Monitoring and Information Systems*

Periodic monitoring, review, and evaluation to detect, prevent, and remedy nonconformities to fiscal policy reform are important hallmarks of the forest management system in Ghana. Monitoring and evaluation will be carried out by measuring and documenting the results of policy actions and operations according to a predetermined schedule and defined procedures.

The 1994 Forest and Wildlife Policy unambiguously calls for the “award of timber rights on the basis of competitive bidding and periodic audit of forest utilization operations to
In response to this policy guideline, the FC has introduced a number of measures to ensure transparency and accountability in its actions. This means that not only regular financial audits are carried out, but also that the performance of the FC is evaluated. This can be done internally and, in some cases (such as timber rights), externally. The point is to ensure that the commission is demonstrably well managed and has its affairs in order.

On information flows, the FC has indicated that good records and reporting procedures are essential for the achievement of sustainable forest management and for the efficient operation of the forestry sector. A two-way reporting procedure has been established within the forestry sector. The FC headquarters is required to make information available to the regional and district offices and request basic production and revenue data from field offices.

**Law Enforcement and Governance**

The following are the key issues being addressed in law enforcement and governance:

**Transparency**

- Establishing databases on forestry issues, such as concession holders and boundaries, in the public domain to strengthen good governance
- Strengthening the capacity of the public, private, and civil sectors to communicate on issues relating to forest law enforcement, including broader land-use issues
- Developing the role of civil society in ensuring broad participation and transparency in the development and implementation of forest policies and laws
- Guaranteeing stakeholder participation through joint forest resource monitoring and evaluation activities at local, national, and international levels

**Legislative Reform**

- Reviewing legal frameworks for the forestry sector to ensure they are consistent with environmental laws and other aspects of land use
- Ensuring that traditional, customary, and informal laws of rural institutions are considered when developing national legal frameworks
- Developing inventories of existing land tenure rights and rights relating to trees and wildlife to ensure that they are recognized in national legal frameworks
- Ensuring that the legitimate interests of all stakeholders are taken into account in developing a legal framework for forests (including the decentralization and devolution of responsibilities)
- Recognizing that good governance requires that information on legal questions is freely available, penalties are applied, and law enforcement institutions are well represented locally and subject to rigorous internal and external scrutiny
Capacity Building

- Strengthening the capacity of all organizations concerned with forests to implement sector laws while fostering coherence among these institutions by, for instance, building bridges between forest departments and other natural resource agencies.
- Strengthening selected national and regional training organizations in all aspects of forest management with special emphasis on issues related to law enforcement and good governance.
- Ensuring that appropriate measures are taken to motivate and reward forestry law enforcement staff.

The recent national Africa Forest Law Enforcement and Governance (AFLEG) consultation workshop produced an emerging consensus on key issues and the ongoing policy reforms. Dealing with illegal logging and trading in timber and other forest products requires the following:

- Clearer definitions of illegal activities and more stringent penalties backed up by stronger enforcement measures. New legislation: the Forest Protection (Amendment) Act, 2002 (Act 624), rationalizes the structure of fines and penalties for the sector, and the FC’s program of workshops for magistrates, police, and customs staff helps to inform the law enforcement agencies.
- Improved regulation, particularly the open and transparent bidding for timber rights, supported by performance contracts for timber companies, a log tracking system, and improved incentive structures (pricing and taxation reform) to encourage sustainable forestry management.
- A commitment to invest in alternative livelihoods and employment opportunities for affected rural communities and households as a necessary complementary activity.
- The public disclosure of concession holdings and other information on forest resources and their management.

The main lesson is that better governance requires a considerable increase in public and civil-society capacity. Skills training and enhanced conditions of service are essential to improve performance across public sector agencies. Governance will continue to be undermined unless the ongoing institutional reform and organizational change programs initiated by the Natural Resources Management Program (NRMP) are strengthened.

Conclusions

The present forestry revenue system has not had a highly positive impact on sustainable forest management (SFM) in Ghana. Fiscal policies have not provided the incentives necessary for SFM: forest revenues for forest owners are not maximized (the economic rent is not adequately captured or shared among stakeholders), and good forest management practices and cost-effective regulation are not encouraged.

This is the result of an absence of fiscal instruments (and by corollary the reliance on administrative instruments), institutional weakness (inadequate regulatory controls), and
REFORM OF FOREST FISCAL SYSTEMS

weak property rights. Without policy and institutional reforms, there will be no incentive for loggers to change practices, wood processors to be more efficient, or communities to protect forests.

For the forest revenue system to be an incentive for SFM in Ghana, four fiscal reforms are required:

1. Review the log-export suspension in the medium- to long-term, taking into account private sector investments in plantations and modernization of the industry.
2. Substitute the administrative allocation of timber rights with competitive bidding.
3. Revise stumpage on a regular basis.
4. Consolidate and rationalize fees, levies, and taxes in the forestry sector.

The first reform will primarily affect the waste in the economic rent. The second and third measures will improve resource pricing and help to regulate timber demand and supply. The fourth will enhance industry efficiency and profitability. All these reforms need to be backed by effective institutions and regulations.

Finally, improved forest revenue efficiency and effectiveness are predicated on the institutional and regulatory reform process that has commenced and on the effectiveness of the implementing agencies. Most of these inefficiencies are institutional—the Forest Services Division and the Timber Industries Development Division have regulatory functions, which often overlap, and impose and collect fees and taxes. In addition to these fees, loggers, processors, and exporters often face considerable transaction costs, which are not taken into consideration in determining fees and taxes.

**Recommendations for Further Action**

For effective reform of forest fiscal systems, the following areas require further consideration and discussion:

- Develop mechanisms to adjust or review fiscal and taxation regimes to reflect current demands. The dependence on parliamentary approval is cumbersome and sometimes creates a constitutional limitation—only Parliament can approve the introduction or revision of taxes. This process requires a review that allows for quick introduction and implementation of fiscal and taxation measures.
- Establish transparent and efficient criteria for the allocation of resources to stakeholders (both tax and nontax revenue). This will involve building coalitions among stakeholders and creating mechanism for effective information dissemination to facilitate the reform process.
- Implement institutional reforms to minimize the multiplicity of agencies and lack of inter- and intrasectoral coordination among them. Governments must support the development of capacity in the forestry sector, particularly that of the private sector. The MLF will establish a mechanism for interministerial collaboration
within public sector agencies (Ministry of Finance and Economic Planning, MLF, Ministry of Trade and Industry, and so forth). The MLF will further seek to widen the decision-making process and create a mechanism for consultations and dialogue with the private sector, nongovernmental organizations, civil society, landowners, and other relevant stakeholders. This mechanism and structure will encourage transparency and dialogue with the civil society and among groups in the private sector to facilitate good governance, poverty reduction, and sustainable forest management.

• Adopt long-term fiscal and taxation planning. A crisis management approach to fiscal and tax administration must be avoided at all cost. Reforms will seek to create a balance between national revenue objectives and forestry sector development objectives. The MLF will undertake a study of the cost structure to determine the level of taxation for industry in order to avoid overtaxation of the forest industry and promote increased investments in further processing of wood products.

• Review the administration and collection of tax and nontax forest revenue. The large number of agencies currently involved in collecting forest taxes has resulted in inefficiency in the collection and loss of revenue. In conjunction with other sector ministries (Finance, Trade, Internal Revenue Service), the MLF will introduce efficiency in fiscal and tax administration. Computerized systems will replace manual and paper-based systems of tax collection and accounting.

• Focus attention on capacity building within the forestry sector and train staff to improve tax collection rates. The government will seek to institute a system to control and monitor the flow of forest resources to maximize revenue capture—for example, log and product tracking and linkage to a national forest information system. The feasibility of collecting revenue from nontimber forest products would be given due consideration.

References


REFORM OF FOREST FISCAL SYSTEMS


End Notes
1. See, for example, Grut et al. (1991) and Grut (1997) for specific reference to Ghana.
2. Repetto and Gillis (1988) defined rents as the residual after all production costs, including normal return to capital, are subtracted from the value of timber output.
3. Stumpage value represents the value of standing timber after all production costs have been deducted. It is also the maximum amount, in a competitive market, that a TUC holder will be willing to pay for harvesting a tree or stand.
CHAPTER 4: INDONESIA BACKGROUND PAPER

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Introduction

This chapter presents an overview of the types of levies and methods of revenue collection that currently prevail in Indonesia’s forestry sector. It discusses the issues and problems that beset the forest fiscal reform process, including the lack of an adequate information base. It briefly discusses Indonesia’s new law, the *Penata Usahaan Hasil Hutan* (Forest Product Administration), proposed to be implemented in 2004. A major departure from existing practices, this law would potentially establish a more robust method of revenue collection, as revenues would be collected prospectively based on cruising reports from concessionaires indicating the volume of legally extractable commercial timber *within* a specified area, rather than retrospectively.
based on the volume of logs carried out of the area. Finally, the chapter explores the next steps to be taken and proposes questions that need answers. This discussion represents the culmination of an initial step in a process that will hopefully continue in Indonesia. Since this process has only just begun, it is evident that the real work still lies ahead.

In posing questions rather than providing answers, the chapter proposes no analyses and postulates no conclusions, since those must be based on a comprehensive body of data and information, a large part of which is still unavailable. Instead, it briefly attempts to identify the reality of the situation based on the limited information currently available. It also articulates possible future actions that would enable the process to move forward.

**Indonesian Revenue Collection System**

This section describes the primary revenues levied on Indonesian timber and on timber producers, processors, and timber product traders, and how they are collected, redistributed, and used.

**Types of Taxes and Levies**

Based on Indonesian Regulation No. 34 of 2002, paragraph 3, section 48, the government attaches three basic fees to the operation of forest concessions. In practice, these revenues are also applied to the operation of land-clearing permits, which were formerly a larger source of raw material for Indonesia’s factories than the timber concessionaires.

- **Iuran Izin Usaha Pemanfaatan Hutan** (IIUPH), or Forest Utilization Business Permit fees (previously called **Iuran Hak Pengusahaan Hutan**). This fee is based on the area of the forest allocated in the permit. It is paid once at the granting of the concession, typically costing US$3 to US$10 per ha. The Ministry of Forestry collects the IIUPH and redistributes 80 percent of it to the region (16 percent to the province and 64 percent to the producing district or kabupaten) and 20 percent to the central government.

- **Dana Reboisasi** (DR) or Reforestation Funds. This is a fee per cubic meter of wood harvested. It varies by region and species group. The rate in place since 1999 has been US$16 per m³ for the higher priced species harvested in Kalimantan, collectively grouped under the name meranti. These funds are allocated to the country’s provinces (40 percent) and to the central government (60 percent).

- **Summary of DR rates according Indonesian Regulation SK 858, 1999:**
  - **Meranti**: US$16 per m³ from Kalimantan and Maluku, US$14 per m³ from Sumatra and Sulawesi, US$13 per m³ from Nusa Tenggara and Papua.
  - **Rimba campuran**: US$13 per m³ from Kalimantan and Maluku, US$12 per m³ from Sumatra and Sulawesi, US$10.50 per m³ from Nusa Tenggara and Papua.

- **Pajak Sumber Daya Hutan** (PSDH) or Forest Resource Tax (previously called **Iuran Hasil Hutan**). This is a royalty on logs charged on the basis of volume and
collected by the Ministry of Forestry. The PSDH varies by region and species and is calculated by multiplying the check price (local market price for the lowest quality log, established twice a year by decree of the Ministry of Trade and Industry) by a “rent capture” factor set by the Ministry of Forestry at 10 percent. These revenues are allocated as follows: 80 percent to the region (16 percent to the province, 32 percent to producing kabupaten, and 32 percent to other kabupatens), and 20 percent to the central government.

- Summary of PSDH rates according to Indonesian Regulation SK 510, 1999:
  - Meranti: US$6.25 per m³ for the entire country except Nusa Tenggara and Papua, where it is US$5.17 per m³.
  - Rimba campuran: US$3.75 per m³ for the entire country except Nusa Tenggara and Papua, where it is US$2.76 per m³.

Collection of Revenues

Throughout the 1970s, until the ban in 1985, Indonesia exported logs to stimulate development of the local primary wood-based industry. In 1990, the government imposed a prohibitively high tax on sawed timber (between 300 and 400 percent). Intended to promote the domestic value-added industry, the measure rendered exports entirely unprofitable. These measures effectively worked as a check on log exports for most of the last 25 years.

In the late 1990s, in compliance with World Trade Organization regulations, Indonesia was not allowed to ban the export of forest products or impose nontariff barriers. In 2002, in an attempt to control illegal trade, which directly stimulates illegal logging, Indonesia banned log exports once again. It therefore has no taxes on the export of logs. However, it does levy taxes, directly or indirectly, on timber concessionaires, although DR and PSDH are collected from mills that purchase round wood from concessionaires, who are frequently vertically integrated with the mill owners.

There are two types of mills: one that is integrated with the concessionaire and one that is not. In the first case, the DR and PSDH are paid by the mill on behalf of the concessionaire. In the second case, the DR and PSDH are paid directly by the concessionaire. The DR and PSDH only provide fee levels paid by sawmills and plywood mills based on their consumption of relatively higher quality old-growth natural forest timber. These levels do not apply to the relatively lower fees paid by pulp mills for their consumption of (mostly) lower quality old-growth natural forest timber.

Sawmills, plywood mills, and pulp mills usually accept only timber that is covered by an SKSHH (transportation document). Although these are authentic transport documents, they do not actually ensure that the logs in the shipment come from a legal source, though this may be the preferred belief. Whatever the degree of legality provided by the SKSHH, there is no guarantee that the timber in the shipment came from sustainable sources. The willingness of timber mills to pay taxes on any logs covered by
an SKSHH explains the reason. From the initial data reviewed, it appears that total timber revenues collected by the government vastly exceed the amount that should theoretically be available from the low annual allowable cut set by the Ministry of Forestry. Figure 4-1 illustrates the process used to collect revenue.

Other Taxes

In recent years, problems with the forest fiscal system in Indonesia have been compounded by a decentralization process. Although Law 25 of 1999, dealing with fiscal balance between the central government and the regions, does not extend authority to the region to levy new charges and taxes, some regions appear to have interpreted the spirit of Law 22 of 1999, dealing with regional governance, as a mandate to manage natural resources, including the forests and the function of revenue capture.

These special levies are collected and spent locally. With more than 400 districts in the country, half of which are still forested, these levies vary greatly from district to district, and little information exists on actual figures. It is difficult to know the legal status of this situation or the exact amounts of these levies because most district leaders do not communicate with the central government.

Timber concessions and mills are also thought to pay a corporate income tax of 35 percent on all profits earned after the timber revenues are paid. When reporting to tax authorities, however, timber concessionaires are believed to be underestimating how much they were paid by mills for their timber, while timber mills tend to exaggerate the amount they paid to concessionaires for timber. Meanwhile, the tax authorities do not appear to be particularly diligent about cross-checking between these two conflicting figures. As a result, national tax authorities collect very little in corporate income taxes from concessionaires and mills. Taxes are levied on the export of some types of processed timber, but they are not considered particularly significant. Table 4-1 shows the actual revenues collected from timber in recent years.

Negatives and Positives

What are Indonesia’s major constraints to forest fiscal reform? What are the steps that can be taken to address these constraints?

Optimal Timber Revenue Levels

Are revenues currently set at “optimal” levels? This is the key question if we are to understand whether the state is capturing an adequate level of rent from the forest. Rent would be much more effectively handled if collected by the government rather than by
**Figure 4-1. Revenue Collection Process**

**Table 4-1. Timber Revenues Collected (1997–2002)**

<table>
<thead>
<tr>
<th>Year</th>
<th>PSDH</th>
<th>DR</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1997</td>
<td>656,139,051,686</td>
<td>1,322,068,368,207</td>
<td>1,978,207,419,893</td>
</tr>
<tr>
<td>1998</td>
<td>693,409,735,003</td>
<td>1,805,700,000,000</td>
<td>2,499,109,735,003</td>
</tr>
<tr>
<td>1999</td>
<td>808,669,600,250</td>
<td>1,353,187,500,000</td>
<td>2,161,857,100,250</td>
</tr>
<tr>
<td>2000</td>
<td>1,041,944,156,876</td>
<td>1,216,585,200,000</td>
<td>2,258,529,356,876</td>
</tr>
<tr>
<td>2001</td>
<td>891,490,878,244</td>
<td>2,251,405,745,678</td>
<td>3,142,896,623,922</td>
</tr>
<tr>
<td>2002</td>
<td>803,539,455,580</td>
<td>2,003,200,000,000</td>
<td>2,806,739,455,580</td>
</tr>
<tr>
<td>Total</td>
<td>4,895,192,877,639</td>
<td>9,952,146,813,885</td>
<td>14,847,339,691,524</td>
</tr>
</tbody>
</table>

*Source: Department of Forestry, internal documents, undated.*
concessionaires. However, this is not happening. If Indonesia is capturing less rent than it should, it would likely trigger misappropriation of funds, as the extra profit will not be pocketed by the concessionaire alone, but would also be unofficially appropriated by political elites or redistributed through a downstream network, preventing the appropriation of these funds for the welfare of the state.

Low levels of rent capture may also elevate logging to an activity with highly excessive profits, attracting overinvestment in the sector. Moreover, low rent capture limits the resources available to forest departments for their functions of protection, conservation, monitoring, and enforcement, which in turn will encourage illegal logging, encroachment, and other forest crimes.

### Evaluation of Optimal Revenue Levels

Data are insufficient to accurately evaluate whether current revenue rates achieve optimal levels. It might be best to simply evaluate meranti, which is still the highest volume, highest value timber in Indonesia and the species that is reviewed by analysts who evaluate levels of timber resource rent capture in Indonesia.

The Ministry of Forestry’s assumed domestic/blended price for meranti is US$62.50 per cubic meter. In fact, this price is too low, as meranti now sells for much more than this on both the domestic and export markets, although Indonesia itself does not export meranti logs. However, the International Tropical Timber Organization (ITTO) reports that meranti is exported at much higher prices in neighboring Sarawak, suggesting that Indonesian meranti also carries a higher value domestically than has been determined by Indonesian authorities (Table 4-2).

**Table 4-2. Meranti Export Prices in Sarawak**

<table>
<thead>
<tr>
<th></th>
<th>1998</th>
<th>1999</th>
<th>2000</th>
<th>2001</th>
<th>2002</th>
</tr>
</thead>
<tbody>
<tr>
<td>Export price</td>
<td>123</td>
<td>144</td>
<td>153</td>
<td>133</td>
<td>145</td>
</tr>
</tbody>
</table>

*Source: ITTO.*

Assuming the government-assigned meranti price is correct, by subtracting from US$62.50 all production, transportation, capital, and depreciation costs paid by the concessionaire for getting one cubic meter of timber from the forest to the point of sale (in Indonesia, usually a factory gate), Brown (1999) places this cost at US$17. Other sources place it at a significantly higher $45 (URS 2002). It is necessary to calculate definitive
costs of extraction, but experts disagree on this amount. However, using the figure from the Department for International Development, subtracting $17 from $62.50 leaves $45.50.

Then subtract normal profit for the concessionaire. Many assume that 30 percent return on investment is sufficient. Since the concessionaire invests $17 in producing a cubic meter of timber, a 30 percent return on that cost would be $5. Subtracting that additional amount from $45.50 leaves $40.50. This, then, is the economic rent of a cubic meter of meranti, according to one possible set of assumptions, although much more research is needed before these figures can be termed definitive.

Next, assess how much the Indonesian government actually collects in taxes from that cubic meter of meranti. The maximum is US$22.25 per cubic meter ($16 for the DR, $6.25 for the PSDH), for meranti harvested in Kalimantan or Maluku. Thus, the government captures only $22.25/$40.50 of available resource rent, or 55 percent, and far less if we assume the higher timber prices provided by the ITTO, and less still if we use the high extraction costs assumed by URS. The fact that kabupatens now collect revenues from timber is not accounted for. Once that additional amount is taken into account, government rent capture would be even higher.

Given the great uncertainty over timber prices, timber extraction costs, and current fees levied by kabupatens, which are either unknown or disputed, it is impossible to make a definitive claim as to whether current Indonesian timber revenues are set at optimal levels or not.

**Indonesia’s New Law: The Penata Usahaan Hasil Hutan**

Indonesia has taken the initiative in preparing an improved method of collecting revenues. Rather than collecting retrospectively from mills, the Ministry of Forestry has passed a new law, to be implemented in 2004, to collect these revenues prospectively, directly from timber concessionaires. If successful, and if provincial-level forestry offices cooperate, this would increase timber revenues, since collection would be based on the volume of legally extractable commercial timber within a specified area rather than the (smaller) percentage of trees that concessionaires now remove from the forest. To ascertain the accuracy of cruising reports, the district forestry office would undertake verification on the basis of a 10 percent representative sample within the area indicated.

**Next Steps**

As mentioned previously, the process is only just beginning. The reality of the situation is yet to be fully understood because many of the facts have not been ascertained, and existing information is insufficient to support analysis or recommendations. The proposals below attempt to define the first steps in a process that will eventually reach the desired objectives.
Gathering Data

It cannot be stressed enough that without baseline information, including facts and figures, a thorough understanding and assessment of the current reality is not possible. The following questions address some of the most pressing information gaps:

- What is the real domestic market price of Indonesian timber on which revenue calculations should be based? Is it as low as $62.50/m³, as opined by the Ministry of Industry and Trade? If so, how does this square with the ITTO’s statement that the same timber is being exported from neighboring Sarawak for twice that price?
- What is the cost of extracting a cubic meter of timber from the forest (including the costs of capital, depreciation of machinery, and selective replanting now required under the law)?
- Assuming concessionaires carry the full costs of the above, and this constitutes their entire cost of investment, how much “normal” profit should the government permit them to earn on this amount? Thirty percent is a standard used in the literature, but it could be set at more, or less, than this amount.
- How much are kabupaten-level officials levying on nationally authorized timber felling or land clearing licenses? Is the central government prepared to recognize these levies, or at least factor them into its own revenue calculations to ensure that timber concessionaires do not have to pay twice?
- Besides the better known national timber taxes and lesser known district-level timber taxes, what other forms of levy do timber concessionaires and factories have to pay, prorated per cubic meter of timber?

Much more research needs to be done to provide the base-level data required to conduct a comprehensive analysis. Although now in dispute now, these are simple concepts, and it should not require large sums of time and money to come up with these numbers. Sometimes, when great amounts of money are at stake, the gathering of such information becomes highly politicized. To ensure the accuracy of data, it might help to have multistakeholder research teams gather the data. Such teams would include industry; the Ministries of Forestry, Industry and Trade, Finance, and Interior; nongovernmental organizations with some degree of economic sophistication; and an extremely wide level of participation from district and provincial governments. Historically, ministries in Jakarta have had difficulty incorporating nongovernmental organizations and local government into policy deliberations.

There is little agreement between the central, provincial, and district governments about monitoring and enforcement of timber fiscal policy and the division of revenues collected.

Challenges of New Methods of Revenue Collection

In view of the planned new law, with its prospective collection of timber revenues based on the cruising reports of commercially valuable timber in as yet unlogged or uncleared areas, unresolved factors would still need to be addressed:
• How to ensure (as required by law) that before switching over to the new system concessionaires pay taxes due under the old system. For example, in both central Kalimantan and Papua, provincial forestry offices have not been collecting revenues from timber concessionaires (and factories), but have instead been extracting 2 percent nonrefundable annual payments for the amount not yet paid to them. Thus, if a timber concessionaire owes $1 million dollars a year in revenues over each of three years, that person would pay the provincial forestry office $20,000 the first year, $40,000 the second year, $60,000 the third year, and so on indefinitely. In effect, the concessionaire would never pay the timber revenues actually owed. This practice allows timber concessionaires to escape from paying taxes and prevents timber revenues from flowing to the central government and being redistributed back to the provinces and kabupatens.

• Because new timber revenues will be collected prospectively, based on cruising reports from concessionaires themselves, of existing commercial timber prior to harvest, can concessionaires be trusted with this responsibility? If so, how can the provincial forestry office cross-check the tree maps of the concessionaires? Will the proposed verification by the district forestry offices on a representative 10 percent area be an effective enough mechanism?

These questions have no obvious answers. As an initial attempt at coming to grips with the reality of the situation, the process has begun, and now it is important to ensure that it continues.

References

CHAPTER 5: HONDURAS BACKGROUND PAPER

General Context of the Forestry Sector

The Republic of Honduras is located in Central America with a surface area of 112,489 km², equivalent to 11.3 million hectares. Table 5-1 shows the distribution of land uses.

Because of the rapid 2.5 percent annual population growth, and the 53.7 percent of the population living in rural areas of the country, the roundwood forests have traditionally been considered a land reserve for farming and livestock use (see table 5-2). However, the pine forests have not significantly diminished in land area as a result of the system of selective land exploitation, lack of management, migratory agriculture, extensive livestock, and a high incidence of fires. The annual rate of deforestation is estimated to be 86,000 hectares. Twenty-three percent of the country’s territory conforms to the National System of Protected Areas, which is composed of approximately 105 areas under 11 categories of management, including biosphere reserves, national parks, and wildlife refuges. The Hombre reserves, the Río Plátano Biosphere (795,235 ha), and Tawahka (243,126 ha) have been designated fiscal territories administered by the AFE–COHDEFOR.

Forestry Sector Retrospective

TABLE 5-1. USE OF THE SOIL (2002)  
*(in thousands of hectares)*

<table>
<thead>
<tr>
<th>Description</th>
<th>Surface</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lands with Forest Cover</td>
<td>5,989.6</td>
<td>53.2</td>
</tr>
<tr>
<td>Roundwood Forest</td>
<td>2,917.8</td>
<td></td>
</tr>
<tr>
<td>Mangrove</td>
<td>54.3</td>
<td></td>
</tr>
<tr>
<td>Wide Leaf</td>
<td>2,863.5</td>
<td></td>
</tr>
<tr>
<td>Pine Forest</td>
<td>2,512.7</td>
<td></td>
</tr>
<tr>
<td>Dense</td>
<td>695.2</td>
<td></td>
</tr>
<tr>
<td>Sparse</td>
<td>1,817.5</td>
<td></td>
</tr>
<tr>
<td>Mixed Forest</td>
<td>559.1</td>
<td></td>
</tr>
<tr>
<td>Other Uses</td>
<td>5,259.6</td>
<td>46.8</td>
</tr>
<tr>
<td>Agriculture, Ranching Zones,</td>
<td></td>
<td></td>
</tr>
<tr>
<td>and Other</td>
<td>3,607.4</td>
<td></td>
</tr>
<tr>
<td>Deforested Area</td>
<td>1,652.2</td>
<td></td>
</tr>
<tr>
<td>Roundwood</td>
<td>1,311.3</td>
<td></td>
</tr>
<tr>
<td>Mangrove</td>
<td>243.5</td>
<td></td>
</tr>
<tr>
<td>Pine</td>
<td>97.4</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>11,249.2</td>
<td>100.0</td>
</tr>
</tbody>
</table>

*Note: A new forest map is currently being updated. These lands do not include rivers, lakes, or lagoons.*

*Sources: Figures taken from the 1995 base forest map; Centro de Informacion y Estadisticas Forestales (CIEF)/AFE–State Forest Administration, Forest Development Corporation (AFE-COHDEFOR).*

*I. 1970–1973*

**Legal and Institutional Framework.** The forestry sector is regulated by Legislative Decree No. 117-61 of May 17, 1961. That law was repealed by Decree No. 85-1971, which is the Forest Law that has been in effect since February 10, 1972.

Until 1973, the institutional management corresponded to the General Director of Forest Resources, Hunting, and Fishing of the Ministry of Agriculture that was created in 1950.

**Forest Policies.** Forest Law No. 85-71 determined that the forests to be managed under the law’s regulations must yield sustainable and multiple use over a functional economic and social ecological base. This law was not implemented because of institutional weakness, introduction of artificial concepts not understood by general society or by the forestry service itself, and the executive’s lack of political will to support collateral measures—application of the law and education of the community.

**Control Instruments.** The Forest Map of Honduras was developed in 1962 with the assistance of the Food and Agriculture Organization of the United Nations (FAO). It is
CHAPTER 5: HONDURAS BACKGROUND PAPER

The only reference base for evaluation and comparison of changes related to deforestation and forest degradation.

The Model Forest District was a program managed by the FAO on a 1,400 hectare surface, in the Jutiapa National Forest (in the municipality of Salama, Department of Olancho). The program was initiated in 1969 but not finished until 1978. The extraction of round logs for the industry was the only purpose of the Jutiapa National Forest. The program was conducted without the required technical prerequisites and with no effective state control (see Attachment B). Because the management plan had not been implemented, there were no tangible results.

The official annual average for forest extraction in the Model Forest District amounted to 2.1 million cubic meters. Part of it was destined for the sawmill and exportation of round logs; the gross volume was estimated at 4 million of m³, considering that 50 percent was waste cuttings left in the forest. Attachment A presents the statistics relative to the volume extracted and destined for the sawmill industry.

**Fiscal Instruments**

**Taxes on forest industries.** Legislative Decree No. 57 of March 28, 1963, is applicable to natives and legal residents, sawmill plant owners, and other forest industry personnel that may have operated in the country before obtaining the annual operating licenses required by Article 100 of the Forest Law, Legislative Decree No. 117 of May 1961. This tax covers the following:

- Lps. 0.12 for each piece that enters the industrial plant
- Lps. 0.00375 a cent for laminate
- Lps. 0.0150 for a gallon of turpentine
- Lps. 0.12 for 100 kilograms of tannin

Legislative Decree No. 3 of February 20, 1958, establishes a rate of Lps. 0.01 for a box of matches containing 40 sticks.

**Sales tax (ISV).** Legislative Decree No. 24 of December 20, 1963, is a 3 percent levy on secondary wood products; the law exempts lumber, sawed wood, firewood, and cork.

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<table>
<thead>
<tr>
<th>Table 5-2. Demographics (2001)</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>(in thousands of persons)</em></td>
</tr>
<tr>
<td><strong>Population</strong></td>
</tr>
<tr>
<td>Urban</td>
</tr>
<tr>
<td>Rural</td>
</tr>
<tr>
<td>Total</td>
</tr>
</tbody>
</table>

*Source: Honduran Central Bank; cited in Cifras 2001–2002*
Tax on rent (ISR). Legislative Decree No. 25 of December 20, 1963, imposes taxes on utility companies and general producers using the same scale as the sales tax of between 3 percent and 40 percent.

Import and export duty. Law No. 80 of April 5, 1955, imposes duty fees on imports of up to 350 percent tariff related to the various export tariffs for certain products (sugar, meat, and beef on the hoof).

Direct income from exploitation of the forest

Legislative Decree No. 85-71 (Forest Law) approved means for exploitation of the national forest with the intent of capturing income for the state. Concessions for the extraction of round logs of an established limited volume assignment are made depending on the capacity of the forest. The Ministry of Natural Resources granted, for example, concessions for 1 million cubic meters over a 20 year period. The established price structure was as follows:

- Lps. 3.00/m³ = US$1.50/species nonclassified roundwoods
- Lps. 2.00/m³ = US$1.00/conifers

Commercial use licensing. Used for selective cutting of round log extraction and granted by the General Director of Forest Resources, Hunting, and Fishing. The price is set by standing tree based on Lps. 2.00 up to Lps. 3.00.

The mode approved for exploitation of private forests and lands owned by the rural community with the purpose of collecting income for private and government municipalities was the following:

The acknowledgement of receipt. This is for private forests extended by the General Director of Forest Resources, Hunting, and Fishing and based on documents that accredit the previous physical inspection of the land to determine the capacity of the forest property. The designation of volume is done by tree and does not establish any service payment to the state by the landowner.

Use license. This is for communally owned forest lands granted by the General Director of Forest Resources, Hunting, and Fishing as requested by the municipal government for obvious commercial purposes. The average quantity authorized is from 1,000 to 10,000 trees without reference to any sales price for the condition of the possession of the land and without any effective payment for service to the state. For all these modes of forest exploitation, verification of use is carried out by counting the cut tree stumps.

For the 1970–73 period no figures exist for recovered income by means of the different fiscal instruments; it is not thought to be significant because of the scarcity of export control systems, low valuation of the timber, and permissive export schemes. Nor do figures exist for fiscal income or for a budget for forest service operations financed by the central government.
II. 1974–1991

**Legal and Institutional Framework.** Important forest decisions were made to rationalize the exploitation of forestry resources for the national benefit. Law No. 103-74 of January 10, 1974, created the Honduran Forest Development Corporation (COHDEFOR) as a semi-autonomous legal institution with 3 million lempiras in assets. Its functions remain oriented toward the use, industrialization, commercialization, control, and supervision of forestry resources.

**Forest Policies.** Legislative Decree No. 85-71 and Law 103 created the COHDEFOR, prohibited further granting of cutting permits (concessions, use licenses, and acknowledgements of receipt), and maintained the conceptual integrity of sustainable resource management and aspects of other forest regulations such as national property, forest protection, and control of industries. Between 1974 and 1991, the COHDEFOR’s principal regulations were the following:

- The state assumed control of the country’s forestry resources without considering land possession.
- Wood was exported and wholly commercialized internally, including products for resin distillation.
- Forest-based investments by industrial or commercial businesses were under the control of the state (49% private capital and 51% State).
- Introduction of the legal concept of the Social Forest System which defines the sustainable use of forests for the “campesinos” (Rural population), under the modality of workers associations (chapter 5 of Law 103).
- The concept of the Inalienable Public Forest Patrimony was introduced.
- The COHDEFOR received all economic benefits generated by the sale of standing wood.

**Control Instruments**

**Forest management.** Until the end of the 1970s, the traditional form of forest exploitation prevailed. There was no previous development of forests much less implementation of management plans.

**Sustainability focus.** The focus of sustainability was distorted in response to the primary industry’s raw material requirements and the demand of the international wood market. The demand of sawed wood was reflected in volumes of wood distributed by the industry and the forest region without consideration of the rate of forest growth or its recovery, such as the total surface of commercial forest (see Attachments B and C).

**Annual cutting permit quotas.** During the 1980s management and primary industry established annual cutting permit quotas as a result of the dramatic reduction of the commercial forests.

**Tributary areas.** These areas consisted of allotted delimited surfaces of the forest for a single industry, guaranteeing it a supply of raw materials in exchange for industry’s
execution of the management plan and protection of the forest against fires. Fifty tributary areas have been designated, of which 50 percent have presented management plans with only one being approved and none implemented.

Given the limitations of the COHDEFOR’s control and supervision, the prevailing strategy gave the impression of a forest concession, although little was asked in exchange for a great deal. Development of other industries ceased. The rural resident groups of the Social Forest System (AMIS), promoted by the COHDEFOR to subordinate these groups to the industries’ product commercialization partners, reacted strongly. Integrated management areas of the Social Forest System exist to motivate the leadership in the rural community, which has the principal interest in the development of the forest.

In general, the COHDEFOR has not developed a strategy that integrates the private owners and the municipalities in the management of its forest areas. Rather, the COHDEFOR discouraged municipal participation by preventing their direct participation in an equitable manner involving the benefits from the sale of the wood.

Fiscal Instruments Applied by Central Government

**Taxes on forest industries.** Legislative Decree No. 3 of February 20, 1958, set a rate of Lps. 0.01 for each box of matches of 40 sticks. This law remains in effect. Legislative Decree No. 57 of March 28, 1963, also remains in effect.

**Sales tax (ISV).** Legislative Decree No. 24 of December 20, 1963, set a tax rate of 3 percent of the secondary wood products and exempted lumber, sawed wood, firewood, and cork. This law was amended by Legislative Decree No. 873-79 of December 26, 1979, which exempted charcoal, wood pulp, and arts and crafts made from wood. Thus, Decree No. 85-84 of December 24, 1984, changed the tax rate on sales (ISV) to 5 percent, and a later law, Decree No. 18-90 of March 3, 1990, modified the ISV rate to 7 percent, maintaining the status of wood products.

**The tax on rent.** Legislative Decree No. 25 of December 20, 1963, is still in effect and applies a rate of between 0 percent and 40 percent for indigenous peoples. Two rates are used for businesses: a 15 percent rate for small and midsize businesses and a 35 percent rate for larger businesses.

**Import tariff.** Legislative Decree No. 80 of April 5, 1955, was amended by Decree No. 213-87 of November 29, 1987, which set the tariff between 1 percent and 90 percent. It too has been recently amended by Decree No. 18-90 that set the tariff between 5 percent and 20 percent.

**Import surcharge.** Legislative Decree No. 85-84 of May 24, 1984, established a 5 percent rate on all imports except medicines and reinvestment.

**Export tax.** Legislative Decree No. 80-55 of April 5, 1955, placed various tariff quotas on sugar, meat, and livestock on the hoof. It was repealed by Decree No. 873-79 of
December 26, 1979, that set a fixed tariff of 1 percent for exports in general and increased the tariffs on sugar, meat, and livestock on the hoof. Decree No. 213-87 of November 29, 1987, added a property tax to other specific products like minerals.

**Municipalities.** Legislative Decree 134-90 of October 29, 1990 (Municipalities Law) levied a tax on industries and commercial and service enterprises, and imposed a tax of Lps. 0.15 up to Lps. 0.30 per 1,000 on native or legal residents who perform predetermined activities, operate commercial industries, or engage in other services for profit within the jurisdiction of the respective municipality. The law also imposed a tax of between 1 percent and 2 percent on the commercial value generated by extraction and exploitation of resources by natives or legal residents. This tax must be paid for extraction or exploitation of quarries, minerals, hydrocarbons, and forest derivatives, as well as for fishing, hunting, or extraction of maritime species in seas and lakes up to 200 meters deep and in rivers. In addition, individuals must pay Lps. 2.50 per ton from these percentages for mineral material extracted. Legislative Decree No. 48-91 of May 7, 1991, reduced to 1 percent the tax on mineral extraction and applied a rate of US$0.50 per ton of mineral (waste) extracted.

**AFE–COHDEFOR**

**Direct income from forest exploitation.** Legislative Decree No. 103-74 of January 10, 1974 (Forest Law), approved exploitation of the forests in general through purchase contracts, sale of forest products, and the exportation of wood and its derivatives for the purpose of collecting direct income by COHDEFOR (Table 5-3).

The prices shown in Table 5-3 correspond to the sale of round wood logs under the terms of the contract in conifer and roundwood forest types, without regard to ownership of the land. A refund of Lps. 2.00/M³ for private and rural community landowners is established under the concept of land rent. In the plan, the state considered using the income generated by the forestry sector to finance agrarian reform, rural development in general, and good forestry resource management. No statistics are available on the fiscal income generated by each instrument or the total forestry sector combined.

**Table 5-3. COHDEFOR: Price Structure for Forest Product Sale**

*(in lempiras/cubic meters)*

<table>
<thead>
<tr>
<th>Description</th>
<th>Period</th>
<th>Pine</th>
<th>Roundwoods</th>
<th>Rent for land</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wood in pieces</td>
<td>1974–79</td>
<td>5.00</td>
<td>150.00</td>
<td>2.00</td>
</tr>
<tr>
<td></td>
<td>1979–85</td>
<td>12.00</td>
<td>200.00</td>
<td>2.00</td>
</tr>
<tr>
<td></td>
<td>1986–89</td>
<td>24.00</td>
<td>300.00</td>
<td>2.00</td>
</tr>
<tr>
<td></td>
<td>1990–91</td>
<td>36.00</td>
<td>450.00</td>
<td>2.00</td>
</tr>
</tbody>
</table>

*Source: Office of Volumetric Control, AFE–COHDEFOR.*
III. 1992–2002

Institutional and Legal Framework. In 1992 it was determined that the state-owned forest resource model had not worked as anticipated. It was therefore amended again by the Law for Modernization and Agricultural Sector Development (LMDSA), Legislative Decree No. 31-92 of April 6, 1992. This law reorganized the public agricultural sector, superseding all previous laws. The forestry sector was established as a subsector with the Secretary of Natural Resources as the head of the agricultural sector. The State Forest Administration of the AFE–COHDEFOR maintained its role as the implementing and oversight body for forest policy.

As a result the forests were returned to the owners who were also made responsible for regeneration activities in those forests. Furthermore, COHDEFOR was no longer in charge of the elaboration and execution of management plans or of economic activities such as investments into forest-based industry and marketing of forest products. As the agency responsible for the management of the national forests and the administration of protected areas, COHDEFOR was given administrative and supervisory functions.

Forest Policies. Among the main policies, the following were established:

• Return of the forest to the landowners
• Privatization of productive activities and the forest’s commercial assets
• The AFE–COHDEFOR’s responsibility for administration of the national forest lands and the organization’s conversion into an entity of private forestry and communal landowners
• Use of the forests within the framework of approved management plans
• The sale of wood from public forests accomplished by means of public auction
• Determination of the rights of the populations living in national forests

Control Instruments. The following principles were established as control instruments:

• Strengthening of the AFE–COHDEFOR to efficiently and appropriately manage its supervisory function of the forest conifers and roundwoods by the forestry industry. The sale of wood is based on square feet and done according to the principles of sustainable forest management.
• Establishment of a budget for the AFE–COHDEFOR within the national budget that is adequate to cover the cost of its functions. This will prevent the situation of an institution dependent on income from forest exploitation and assure that adequate decisions are made from the sustainable resource management perspective.
• Initiation of the system of auctions and establishment of norms for the national forests that increase the value of the natural resource.
• Provision of the incentive for higher value-added processing of timber through increasing the price of raw materials thereby inducing a downward pressure in the profit margins of lower value-added products (such as sawn timber).
• Establishment of management plans in the roundwood forest that incorporate the rural community by means of the Forest Social System.
• Transformation of the wood industry by means of a policy based primarily on maintaining the price of the raw material at international market levels. Further-
more, a strategy of subsidies has not been considered. Instead, technical support, credit, and the formation of work projects for the sector have been offered through private programs such as the Foundation for Investment and Development of Exports.

- Establishment of a single code to simplify forest legislation, which is currently integrated with multiple laws and regulations.

**Fiscal Instruments Applied by Central Government**

**Tax on forest industries.** Legislative Decree No. 3 of December 2, 1958, was repealed by Decree No. 287-93 of February 16, 1993. Decree No. 57 of March 28, 1963, remains in effect.

**Sales tax (ISV).** Legislative Decree No. 24 of December 20, 1963, maintained the 7 percent rate and has been amended by Decree No. 135-94 of October 12, 1994, which exempts charcoal wood, natural fiber brooms, and arts and crafts. Only lumber and sawed wood were taxed. Decree No. 131-98 of April 30, 1998, changed the rate to 12 percent and maintained the status of the exemptions. Finally, Decree No. 51-2003 of April 3, 2003, maintained the 12 percent rate and taxed all forest products except national flowers and arts and crafts.

**Import tariff.** Legislative Decree No. 18-90 of March 3, 1990, established the tariffs between 5 percent and 20 percent and was amended by Decree No. 222-92 of December 10, 1992. It serves as a basis to establish the current tariffs in accord with Central America between 0 percent and 15 percent.

**Import surcharge.** Legislative Decree No. 85-84 of May 24, 1984, established a rate of 5 percent for the Custom’s administrative service and was amended by Decree No. 17-94 of April 13, 1994, which reduced the rate to 0.5 percent. Decree No. 131-98 of April 30, 1998, repeals this rate.

**Export taxes.** Legislative Decree No. 873-79 of December 26, 1979, set a tariff of 1 percent on exports in general and imposed a tax on various products like sugar, meat, and livestock on the hoof. It was amended by Decree Nos. 56-98, 131-98, and 11-2000. Together, these laws eliminate all export taxes in order to make the offered exports competitive.

**Municipalities.** The rates of Legislative Decree 48-91 of May 7, 1991, amend the Municipality Law, and they remain in effect.

**Fiscal income and income from AFE–COHDEFOR.** Table 5-4 shows the fiscal income collected as tax on rent, sales tax, and tax on forest production for the period 1998–2002.

**Direct income from forest exploitation.** Legislative Decree No. 31-92 of April 6, 1992, Agreement No. 1039-93 (Regulation to Title VI, Forest Aspects), and Articles 10 and 12 establish the mechanism for auction of public forests and take as reference price Lps. 72.00/m³, modified in accordance with the prices reached in the following auctions (see Attachment D):
• Resolution No. GG-486-96 resolves to set the price of forest products in the national forest and determine a rate for forest service technical operatives in private and community-owned forest at an average of Lps. 40.00/m³.
• The income generated has been and continues to be collected and used directly by the AFE–COHDEFOR to finance its operational budget (see Attachment E).
• No numbers are available for the fiscal income generated by each instrument or the total forestry sector combined.

Areas Suggested for Fiscal Reform
- **Ownership of the land.** This includes a land office and registry of property to regulate large extensions of forest and the population residing there.
- **Community property and environmental services.** These include key topics such as water and hydro-energy and ecotourism, all related to the management of hydrographic rims, and incorporates community and municipal government participation, as well as states that join together to obtain direct benefits.
- **Fiscal reforms related to the legal standard.** These reforms establish single and coherent forestry legislation with other laws such as the Water Law, Environmental Law, and the Territorial Ordinance Law. This aims to have a real impact on sector improvement at the macro and micro levels, such as the imposition of a tax on the idle lands to stimulate production and rational use of the soil without discouraging private initiative. Similarly, this means strengthening the finances of the AFE–COHDEFOR and local governments by making them participants to the obligations and benefits originating from sustainable management of forestry resources.
- **Forest incentives.** These incentives are designed to promote reforestation, grants of long-term contracts, and integration of industrial processes with the participation of the communities located in the areas of activity and, in addition, management in protected areas with the support of community organizations and NGOs.

### Table 5-4. Forestry Sector Collections

<table>
<thead>
<tr>
<th>Year</th>
<th>ISR</th>
<th>ISV</th>
<th>Individual Forest Tax</th>
</tr>
</thead>
<tbody>
<tr>
<td>1998</td>
<td>60.6</td>
<td>49.7</td>
<td>0.2</td>
</tr>
<tr>
<td>1999</td>
<td>68.3</td>
<td>62.4</td>
<td>0.8</td>
</tr>
<tr>
<td>2000</td>
<td>73.9</td>
<td>69.1</td>
<td>0.2</td>
</tr>
<tr>
<td>2001</td>
<td>69.8</td>
<td>48.8</td>
<td>0.3</td>
</tr>
<tr>
<td>2002</td>
<td>79.8</td>
<td>78.7</td>
<td>0.4</td>
</tr>
</tbody>
</table>

*Sources:* Ministry of Environment and Natural Resources (MARENA)/AFE–COHDEFOR, Director General of Budget (DGP/SEFIN).
• Aggregate value.
• Promotion of nonwood products.
• Use of smaller diameters.

End Notes
1. Planning and Management Evaluation Unit (UPEG)/Ministry of Finance (SEFIN) and UPEG/AFE.
2. Lps: Honduran Lempira [1 Lps = $0.0558 (March 2004)].
3. Source: Office of Volumetric Control, AFE–COHDEFOR.
### ATTACHMENT A. TOTAL ANNUAL REPORTED PRODUCTION FOR SAWN PINE (1970–73)

<table>
<thead>
<tr>
<th>Year</th>
<th>Volume (Thousands of $M^3$)</th>
<th>Volume (Millions of P.T.)</th>
<th>Annual Variation PT.</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1970</td>
<td>327.8</td>
<td>139</td>
<td>–</td>
<td>–</td>
</tr>
<tr>
<td>1971</td>
<td>556.6</td>
<td>236</td>
<td>+ 97</td>
<td>41</td>
</tr>
<tr>
<td>1972</td>
<td>617.9</td>
<td>262</td>
<td>+ 26</td>
<td>10</td>
</tr>
<tr>
<td>1973</td>
<td>719.3</td>
<td>305</td>
<td>+ 43</td>
<td>14</td>
</tr>
</tbody>
</table>

*Source: CIEF.*
### ATTACHMENT B. HISTORICAL SUMMARY OF USE OF PINE AND DECIDUOUS ROUNDWOOD (1974–91)

*(in thousands of M³)*

<table>
<thead>
<tr>
<th>Year</th>
<th>Pine</th>
<th>Roundwood</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1974</td>
<td>813.7</td>
<td>19.4</td>
<td>833.1</td>
</tr>
<tr>
<td>1975</td>
<td>831.0</td>
<td>43.0</td>
<td>874.0</td>
</tr>
<tr>
<td>1976</td>
<td>1,073.3</td>
<td>39.8</td>
<td>1,113.1</td>
</tr>
<tr>
<td>1977</td>
<td>1,162.60</td>
<td>34.1</td>
<td>1,196.7</td>
</tr>
<tr>
<td>1978</td>
<td>1,108.90</td>
<td>24.3</td>
<td>1,133.2</td>
</tr>
<tr>
<td>1979</td>
<td>1,125.20</td>
<td>35.8</td>
<td>1,161.0</td>
</tr>
<tr>
<td>1980</td>
<td>1,041.50</td>
<td>41.1</td>
<td>1,082.6</td>
</tr>
<tr>
<td>1981</td>
<td>1,029.80</td>
<td>27.3</td>
<td>1,057.1</td>
</tr>
<tr>
<td>1982</td>
<td>916.60</td>
<td>15.5</td>
<td>932.1</td>
</tr>
<tr>
<td>1983</td>
<td>851.70</td>
<td>21.5</td>
<td>873.2</td>
</tr>
<tr>
<td>1984</td>
<td>799.70</td>
<td>18.4</td>
<td>818.1</td>
</tr>
<tr>
<td>1985</td>
<td>817.20</td>
<td>21.4</td>
<td>838.6</td>
</tr>
<tr>
<td>1986</td>
<td>768.00</td>
<td>26.2</td>
<td>794.2</td>
</tr>
<tr>
<td>1987</td>
<td>920.70</td>
<td>37.7</td>
<td>958.4</td>
</tr>
<tr>
<td>1988</td>
<td>888.60</td>
<td>39.4</td>
<td>928.0</td>
</tr>
<tr>
<td>1989</td>
<td>828.50</td>
<td>50.9</td>
<td>879.4</td>
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<tr>
<td>1990</td>
<td>708.60</td>
<td>43.6</td>
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</tr>
<tr>
<td>1991</td>
<td>667.60</td>
<td>37.1</td>
<td>704.7</td>
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</tbody>
</table>

*Source: CIEF.*
### Attachment C. Total reported sawed pine production (1974–91)

<table>
<thead>
<tr>
<th>Year</th>
<th>Volume (Thousands of M³)</th>
<th>Volume (Millions of P.T.)</th>
<th>Annual Variation</th>
</tr>
</thead>
<tbody>
<tr>
<td>1974</td>
<td>672.2</td>
<td>285</td>
<td>-20</td>
</tr>
<tr>
<td>1975</td>
<td>478.8</td>
<td>203</td>
<td>-82</td>
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<tr>
<td>1976</td>
<td>582.5</td>
<td>247</td>
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</tr>
<tr>
<td>1977</td>
<td>610.8</td>
<td>259</td>
<td>+12</td>
</tr>
<tr>
<td>1978</td>
<td>615.6</td>
<td>261</td>
<td>+2</td>
</tr>
<tr>
<td>1979</td>
<td>566.0</td>
<td>240</td>
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<tr>
<td>1980</td>
<td>544.8</td>
<td>231</td>
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<td>1981</td>
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<td>1982</td>
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<td>1983</td>
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<td>1984</td>
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<td>+26</td>
</tr>
<tr>
<td>1988</td>
<td>419.8</td>
<td>178</td>
<td>-13</td>
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<tr>
<td>1989</td>
<td>393.9</td>
<td>167</td>
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<tr>
<td>1990</td>
<td>377.4</td>
<td>160</td>
<td>-7</td>
</tr>
<tr>
<td>1991</td>
<td>365.6</td>
<td>155</td>
<td>-5</td>
</tr>
</tbody>
</table>

Source: CIEF.

*(in square feet)*

<table>
<thead>
<tr>
<th>Year</th>
<th>Lots Offered</th>
<th>Lots Adjudicated</th>
<th>Average Price Base (LPS/M³)</th>
<th>Average Price Sale (LPS/M³)</th>
<th>Income Affected (Lps.)</th>
<th>Total Area Affected (HA)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1993</td>
<td>10</td>
<td>8</td>
<td>26,077.3</td>
<td>21,463.2</td>
<td>75.5</td>
<td>1,730,360.0</td>
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<tr>
<td>1994</td>
<td>6</td>
<td>4</td>
<td>27,925.4</td>
<td>22,536.5</td>
<td>128.7</td>
<td>5,369,314.0</td>
</tr>
<tr>
<td>1995</td>
<td>18</td>
<td>11</td>
<td>87,044.8</td>
<td>28,761.6</td>
<td>185.8</td>
<td>10,262,703.0</td>
</tr>
<tr>
<td>1996</td>
<td>29</td>
<td>27</td>
<td>164,720.4</td>
<td>158,337.3</td>
<td>270.5</td>
<td>46,676,108.0</td>
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<td>1997</td>
<td>67</td>
<td>55</td>
<td>461,754.5</td>
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<td>36</td>
<td>18</td>
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<td>65,443.8</td>
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<tr>
<td>1999</td>
<td>66</td>
<td>23</td>
<td>314,183.1</td>
<td>98,747.3</td>
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<td>23,720,774.0</td>
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<td>2000</td>
<td>135</td>
<td>40</td>
<td>540,926.1</td>
<td>131,715.0</td>
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<td>35,698,117.5</td>
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<tr>
<td>2001</td>
<td>256</td>
<td>64</td>
<td>731,841.0</td>
<td>208,955.1</td>
<td>185.5</td>
<td>46,051,454.1</td>
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<tr>
<td>2002</td>
<td>100</td>
<td>40</td>
<td>205,890.0</td>
<td>125,963.0</td>
<td>186.8</td>
<td>24,274,557.0</td>
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<tr>
<td>Total</td>
<td>723</td>
<td>290</td>
<td>2,762,345.5</td>
<td>1,252,342.2</td>
<td></td>
<td>24,794.5</td>
</tr>
</tbody>
</table>

*Source: CIEF.

*(in current lempiras)*

<table>
<thead>
<tr>
<th>Year</th>
<th>Income</th>
<th>Outlays</th>
<th>Surplus Reserves (Deficit)</th>
<th>Percentage of Surplus (Deficit)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1991</td>
<td>43,094,489.72</td>
<td>38,371,366.00</td>
<td>4,723,123.72</td>
<td>11</td>
</tr>
<tr>
<td>1992</td>
<td>32,504,163.92</td>
<td>40,942,844.00</td>
<td>-8,438,680.08</td>
<td>-26</td>
</tr>
<tr>
<td>1993</td>
<td>30,223,045.74</td>
<td>43,207,970.00</td>
<td>-12,984,924.26</td>
<td>-43</td>
</tr>
<tr>
<td>1994</td>
<td>25,775,623.64</td>
<td>36,087,326.00</td>
<td>-10,311,702.36</td>
<td>-40</td>
</tr>
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<td>1995</td>
<td>43,551,831.23</td>
<td>44,965,283.00</td>
<td>-1,413,451.77</td>
<td>-3</td>
</tr>
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<td>1996</td>
<td>63,268,831.40</td>
<td>75,214,357.00</td>
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<tr>
<td>1997</td>
<td>99,226,030.53</td>
<td>107,357,797.00</td>
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<td>1998</td>
<td>93,920,566.50</td>
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*Note:* Income and outlays for 2003 correspond to the period January–June.

*Source:* CIEF.
CHAPTER 6: AIDE-MÉMOIRE ON THE INTERNATIONAL WORKSHOP ON REFORMS OF FOREST FISCAL SYSTEMS TO PROMOTE GROWTH, POVERTY REDUCTION, AND SUSTAINABLE FOREST MANAGEMENT

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October 19–21, 2003

World Bank, Washington, D.C.

The International Workshop on Reform of Forest Fiscal Systems took place October 19–21 at the World Bank in Washington, D.C. The workshop brought together 21 participants from seven countries (Brazil, Cambodia, Cameroon, Ghana, Honduras, Indonesia, and Nicaragua) representing finance ministries, forest departments, academia, and the private sector. A number of observers from bilateral donor and international development agencies also attended the meeting. The objectives of the workshop were to promote learning among developing countries and engage in frank discussions on the political economy of forest fiscal reforms.
The importance of mobilizing forest revenues and maximizing their contribution to broader policy objectives is increasingly recognized. The importance of well-designed and effectively implemented forest fiscal systems, specifically concession and revenue systems, has been long appreciated. Issues of resource tenure and security, royalties (their value and method of collection), and benefit distribution set the fundamental parameters of the private sector's use of an often publicly owned asset. Experience shows that a well-designed and effectively implemented concession and revenue system, particularly one emphasizing incentives to sustainable forest management and investment in value-added processing industries, can be a much more effective instrument to increase the forestry sector's contribution to growth and development than a narrow regulatory-based approach.

An active debate on concession policies and forest fiscal systems has taken place for a number of years. Several countries, encompassing a diverse range of forest types and associated industries, are implementing or considering new approaches to allocate rights to utilize forests. Although each of these countries’ situations are different, in all cases the objective is to identify practical ways to use forests sustainably and make a more positive contribution to national poverty reduction objectives (as defined in Poverty Reduction Strategy processes or similar policy statements) through stimulating growth and providing regular and enhanced revenue flows to governments. The workshop provided a valuable forum to facilitate these discussions.

The German Technical Cooperation (GTZ), the Program on Forests (PROFOR), the U.K. Department for International Development (DFID), and the World Bank Institute (WBI) organized and funded the workshop.

**Opening Remarks**

Jim Douglas, Forests Team Manager, World Bank, welcomed participants to the workshop and chaired the opening remarks. Kevin Cleaver, Director of the Agriculture and Rural Development Department, World Bank, said the workshop would provide an opportunity for technical discussions, possibly foster a learning network on forest fiscal systems, and lead to better collaboration with development agencies. Dan Biller, Environmentally and Socially Sustainable Development Program Leader, WBI, stressed capacity building for policy formulation and highlighted the WBI’s work on markets for biodiversity, natural resource management conflict resolution, and compliance and enforcement in natural resource management.

**Objective and Focus**

Tapani Oksanen, the workshop facilitator, reviewed the main objectives of the workshop:

- Engage key policymakers in selected countries to review the experience of forest fiscal reforms.
• Share lessons learned on emerging best practice and define strategies to move from current policies to best practice.
• Define concrete steps to move forward the forest fiscal reform process in the participating countries.
• Disseminate the results of this experience to other countries and stakeholders.

The discussion encompassed components of a forest fiscal system: timber royalties, concession fees (industrial and community), forest-related taxes and fees, export duties and fees, exemptions, and other incentives such as grants or preferential interest rates. Beyond considering forest fiscal systems for revenue maximization and efficient revenue collection, the workshop looked at forest fiscal instruments as tools to promote sustainable forest management, other forestry policy objectives, and broader societal goals, including poverty reduction, gender equality, and good governance.

The workshop focused on three key themes:

1. How to define the mix of fiscal instruments and set the right levels?
2. How to use revenues collected?
3. How to manage the politics of forest fiscal reform processes?

**Country Case Study Presentation Highlights**

Countries prepared and presented at the workshop case studies on the status of their forest fiscal reform processes.

**Ghana**

In Ghana the forestry sector provides 6 percent of gross domestic product (GDP), 11 percent of export earnings, 100,000 jobs, and 75 percent of energy consumed. As a part of structural adjustments in the 1980s, trade liberalization and deregulation of the forestry sector created a too rapid and unsustainable growth in the forestry sector.

In 1995 Ghana began its forest policy reform process with a log export ban. Since 1995, reforms have included a competitive bidding procedure for resource allocation, revision of stumpage rates to reflect international market prices, an export levy on lumber according to species, a value-added tax for domestic sales, removal of import duties on logs, and a levy on veneer and lumber exports.

Constraints to implementing forest fiscal reform in Ghana have included the strong influence of the industry lobby; skewed distribution of forestry revenue to industry, leaving little incentive for landowners (both government and communities) to manage forests; a weak regulatory and institutional framework characterized by too many fees (approximately 30) inefficiently collected; and an inefficient processing sector.

Remaining challenges in Ghana include increasing financial flows to communities, improving monitoring and information systems, and enforcing laws. Recommendations
for successful fiscal reform encompassed regular adjustment of taxes, institutional reform to enhance interagency coordination, long-term fiscal and taxation systems to allow for long-term planning for the private sector, improved monitoring effectiveness, and increased transparency and stakeholder consultations. Legislating forest fiscal policy is important for consistency of policy when ministers change office.

**Cameroon**

Cameroon’s second largest export, after oil, is timber, which may soon surpass oil. The forestry sector comprises a few large operators and many small-scale and informal operators. Forestry sector reforms have focused on broadening the tax base and improving enforcement through decentralization. In 1999 Cameroon established a Forestry Revenue Enhancement Program that constitutes a collaborative framework between the Ministries of Finance and Environment and Forestry. This new partnership, along with the reforms, has significantly increased forestry revenues. A bidding system was established, area taxes were increased, forest concession management plans were made mandatory. A system of bank guarantees to cover fiscal and environmental obligations was also initiated. This reform has contributed to overall economic growth and possibly to poverty alleviation. Ten percent of area taxes collected are transferred to local communities, contributing to poverty alleviation efforts. How effectively this money is being invested in rural area services is not yet clear, however. In addition, Cameroon established a special forest development fund.

The private forestry industry in Cameroon contends the reforms have reduced the profitability of many enterprises and suggests that some of the fees could be fine-tuned. For example, the area tax penalizes larger concessions and should be adjusted to exclude areas of the concession not logged. Similarly, the usage tax should be based on the value of the species and quantity logged, and a log tax levied on mills is a disincentive to processing. Moreover, the bidding process is viewed as insufficiently informed about the quality of forest concessions, resulting in imbalances in domestic supply of round timber. Finally, industry feels that fiscal policy must fight tax evasion generally and provide incentives for legal operations and good governance.

**Indonesia**

In 1985 a log export ban was put in place to stimulate domestic industry. In the 1990s high export taxes were levied on sawed timber to further encourage processing. Taxes and levies in Indonesia now include a one-time, area-based utilization fee, a reforestation fund fee based on cubic meters harvested, and a forest resource tax of 10 percent of log check price. Since 2001, forest management has been decentralized and regions now impose taxes, such as corporate taxes, timber export taxes, and processed timber export taxes, without informing the central government. Starting in 2004 fees will be paid before trees are felled, in accordance with a “cruising report,” based on the expected harvest.
In Indonesia illegal logging poses many problems in lost revenues and skewed timber markets and incentives. This also results in an inability to calculate the real cost of timber extraction. Better monitoring and data and information are needed to inform fiscal policy, optimize fees, and address illegal activities.

Cambodia

In Cambodia, forests contribute around 5 percent to GDP and provide 90 percent of rural energy. In 1992 Cambodia introduced a concession-based forest management system that resulted in problems that led to the suspension of logging activities in 1994. Subsequently, concession agreements were renegotiated, and an interministerial technical working group was established. A long-term management plan is required for each concession, along with an approved annual harvesting volume and a block management plan for harvesting.

The Ministry of Economy and Finance and the Ministry of Agriculture, Fisheries, and Forests (MAFF) hold annual forest revenue planning meetings. MAFF sets quotas for forest product export, and a round timber export ban encourages local processing. An export tax is paid to the government budget and a payment of 1 percent FOB value goes to a fund for tree planting. Efforts are being made to prevent illegal logging, including a bar-code system for tracking logs, and independent forest monitoring.

Honduras

Forests cover 53.2 percent of Honduras’ surface area, and the forestry industry is the fourth most competitive industry in the country. Honduras’ forest fiscal system has developed through stages. Between 1974 and 1991, the Forest Development Corporation (COHDEFOR) was authorized to oversee fee collection, state investments, forest management, purchase and sale contracts, domestic forest product marketing, and exports. From 1992 to 2002 productive and commercial activities were separated, with COHDEFOR the owner of national forests and timber sold through public auction administered by COHDEFOR. Honduras is now in the process of simplifying its forest legislation and reforming the forest fiscal system to promote protection of environmental services, incentives for reforestation, increased value added, non-timber forest product promotion, and use of smaller wood diameters.

Nicaragua

Nicaragua’s forest area covers 43 percent, or 5.7 million hectares, of its territory, and approximately 3.8 million hectares of that area could be used for commercial forest production. In Nicaragua the forestry sector has been challenged by policy with contradictory goals for conservation and industry, resulting in illegal activity that constitutes up to 70 percent of all logging. In June 2003, new legislation was passed establishing a system for preservation and sustainable development that will help address the current
chaotic situation in the sector. Now there is only one law for forests, the forest resources have been returned to landowners, and the forest administration is being decentralized.

The new law encourages export through fiscal incentives and establishes a national fund that will provide fiscal incentives to help develop legal operations. Such incentives exempt plantations from municipal and sales taxes and grant up to 100 percent tax deductions for reforestation costs. However, the forest fiscal policy incentives and objectives have created controversy in the context of the national fiscal simplification process underway. The remaining challenges are to improve the registration and control system to combat illegal logging. The private sector is pleased by the new law, but it is concerned about internal debt and the long-term stability of the forest fiscal rules.

Brazil

In Brazil the forestry sector accounts for 7.1 percent of exports, 2 million jobs, and 4 percent of the GDP. Although 70 percent of the Amazon is publicly owned, Brazil does not have a concession system. Brazil is assessing its forest fiscal policy in the context of its national forest program (NFP). Plantations total less than 1 percent of Brazil’s forest area but produce 60 percent of industrial round wood. Integrated businesses such as pulp and paper and steel industries are subject to fewer taxes and do not pay for forest resource use. In Brazil, paying for forest resource use is a new concept, and earlier efforts to improve sustainability in the forestry sector through regulations and monitoring and assessment have resulted in land conversion for agricultural use to avoid regulations.

Now policies motivate forest producers to develop sustainable practices and markets by offering technical assistance, information and technology, subsidies, and innovations such as the clean development mechanism. The next steps to promote this approach include allocating public lands for protection and production, national forest information systems, and the development of a third-party logging control system. Brazil may have as much as 50 percent illegal logging. However, an environmental crimes law has deterred some illegal operators fearful of going to prison.

Case Study Discussion

In discussion following the case studies, auction systems were a topic of interest. Indonesia considered following Malaysia’s system of setting and auctioning an annual area to be harvested. However, implementing this system would require detailed information on the forests and how many trees could be extracted from each hectare. Indonesia is considering auctioning concessions that would be revoked as a result of poor performance. Ghana is adopting a competitive bidding system.

Indonesia noted that effectively monitoring and regulating illegal activity poses an international problem because of the involvement of other companies and illegal trading and markets that consume the illegally harvested timber. Cameroon suggested curbing
illegal logging by ensuring that documents relating to logging are coherent, personalizing documents to companies, and establishing a log tracking system (Cameroon is implementing a bar-code system).

In discussion of the use of domestic prices versus international prices in setting royalties and other payments, it was suggested that international prices are more reflective of the real value of wood. An approach to calculate the price based on a “basket” of local, regional, and international prices was also suggested.

Facilitator Observations from Case Studies and Discussion

Based on the country case study presentations, the following key points and issues were identified:

- Countries are at different stages in their reform processes as well as in the analysis underlying such reforms.
- The mix of fiscal instruments considered varies from a narrow focus on timber concessions to a broader focus on a wide range of forest tenure arrangements and products.
- Forest fiscal systems have contributed to raising funds; the next step is determining how to use fiscal systems to attain policy goals.
- Improved transparency and accountability in the use of forestry revenues for social and community development are needed.
- Royalties and payments are increasingly determined on the basis of market values.
- The mix of fiscal instruments and systems for setting levels is complex and difficult to administer in a transparent manner.
- Some countries emphasize incentives for sustainable forest management, but they sometimes conflict with overall government fiscal policies.
- Only in a few countries are forest fiscal reforms linked to broader sectoral processes such as NFPs.
- Ensuring compliance and eliminating illegal competition are seen as key to successful reform.
- Increasing revenue collection from formal operators combined with failure to control illegal or informal operators creates imbalances.
- Private sector expectations for fiscal reform differ from those of government, and the creation of a stable and competitive environment for investments is emphasized.
- Reform should be backed by an act of Parliament to ensure long-term stability.
- There are a few promising examples of partnerships among ministries responsible for the forestry sector and finance/economy.

Discussion of Key Themes

Following the case study presentations, workshop participants met in groups to discuss the three key themes of the workshop. The outcomes of the discussions were reported at the plenary session the following morning (October 21st).
1. Mix of Fiscal Instruments

The group discussion centered on the following questions:

- What is the right mix of instruments that meets the basic criteria of economic efficiency, is administratively feasible, and supports broader social and environmental objectives?
- What is the most appropriate basis and mechanism for determining forest-related fees and other fiscal instruments and their right levels?
- What provisions can and should be made to introduce specific incentives into the forest fiscal system for sustainable forest management and other identified policy objectives?
- How can we minimize inconsistencies among the different instruments and mechanisms?

In general, participants noted that an effective mix of instruments depends on the country context, since what is effective in one country is often different from what works in another.

An area tax was deemed appropriate for various instruments because of the high recovery rate and low administration cost for implementation. A stumpage tax indicates extractive activity, but how to set the price remains an uncertainty; differentiating the tax by species was stressed. Export taxes applied to unprocessed timber were viewed as a useful incentive to encourage value-added products domestically.

Market-based approaches were preferred as the bases and mechanisms for determining forest-related fees, and clear administrative procedures and third-party involvement were considered helpful in assuring a transparent process. To minimize inconsistencies among instruments, clear policy objectives, clearly defined roles, and stakeholder dialogue were emphasized.

In discussion on implementing an area tax, clear, verifiable procedures for concession management and auctions were stressed as essential to assure “clean” results and avoid corruption.

In Nicaragua, property ownership issues pose potential complications because forests are not nationalized, and land ownership can be claimed after living on an area of land for more than 10 years, a situation that could potentially result in conflicting ownership claims. Conversely, in Cameroon the government owns all land and can thus allocate all land for conservation or intensive use.

In discussion on why high taxes on log exports may be preferred to an export ban, it was noted that although one purpose of a ban is to encourage value added through processing, if domestic processing capacity is poor, such a policy can be detrimental.
2. How to Allocate Revenues

This group discussed using collected revenues to support the objectives identified, and the pros and cons of different arrangements, such as the following:

- Allocating resources through the central government budget versus more decentralized structures
- Sharing revenue among communities, local government, and central government
- Earmarking revenue for specific uses like monitoring and law enforcement

As allocation objectives the group cited the promotion of sustainable forest management, good governance, poverty reduction, and environmental initiatives, and identified the government (federal, state and province, and local), landowners, and communities as stakeholders in allocation.

The group also emphasized the need for improved transparency and accountability as well as guidelines for revenue use at the local level and incentives for local officers to motivate enforcement and combat corruption.

Countries shared their general structure for resource allocation:

- Cameroon: 50 percent goes to the federal government, 40 percent to local councils, and 10 percent to villages where exploitation occurs.
- Cambodia: 20 percent of revenue goes to the Forest Department.
- Indonesia: tax and nontax revenues are differentiated, with nontax revenues used for reforestation.
- Honduras: revenue from timber sales goes directly to COHDEFOR.
- Brazil: except for the forest recovery fee, all revenues are allocated to the federal budget.
- Nicaragua: resource allocation is decentralized to strengthen local communities; in the Atlantic region, 25 percent goes to local communities; 25 percent to the regional government, 25 percent to the municipality of indigenous peoples, and 25 percent to the federal level. The allocation is different for other parts of the country.

Regarding decentralization, it was noted that delegation of roles without clear rules can undermine effectiveness or resource use.

The group recommended that allocations be based on clear criteria and take into account projects and programs required to achieve objectives at the national, regional, local, and community levels. If funds are earmarked, they should be for a specific, targeted use and only for a certain period of time.

The discussion also emphasized that revenue distribution should not be legislated because circumstances can change; it was suggested that resources for municipalities should be determined at the regional level and only used for investment in forests.
3. Managing the Politics of a Forest Fiscal Reform Process

The group discussion on the politics of forest fiscal reform posed the following questions:

- What processes are used to define and implement appropriate forest fiscal systems, and how do we identify who should participate?
- How do we identify “champions,” build coalitions, and sequence reforms to overcome private sector and political vested interests?

The group noted that internal and external drivers influence fiscal reform:

- Internal: NFPs, national budget and fiscal requirements, enhancement of instruments, and legislation
- External: conditionality from donor agencies, global influence on trade, and the competitive environment

A ministry generally initiates a reform process, which is subsequently cleared with other ministries or institutions. The process is then opened for broader consultation, taken to the council of ministers or cabinet and Parliament, and finally implemented. The identification of stakeholders to participate in the reform process should be guided by an analysis of issues and of development partners as well as identification of beneficiaries, losers, and interest groups.

To build coalitions to support reform, it was suggested that effective “lobbying” mechanisms should be established, that trade-offs should be balanced in a mutually beneficial way, and that decision-making should be made transparent. Strategies to overcome vested interests in the public and private sectors include timing the reform to avoid elections, keeping the public well informed, encouraging competitive and transparent rather than administrative and discretionary pricing of resources, and balancing the interests of different groups, that is, national versus subnational groups. In conclusion, a level playing field should be established for all stakeholders.

On the issue of measures for automatic review of fiscal reforms without referral to Parliament resulting in a reduction of the influence of various lobbies, it was suggested that the lobbies are in fact stronger at the administrative and ministerial level than in Parliament. It was also noted that implementation of forest fiscal reform must take into account other national reform processes, increased access to information might encourage stakeholders to work together, and improved dialogue between forest experts and politicians may facilitate reform.

Next Steps: Perspectives of Country and Development Agencies

Country Perspectives

Brazil plans to develop a system for forest concessions in the Brazilian Amazon. The system will comprise two types of concessions: 100 million hectares under a system of forest conservation unit concessions and 150 million hectares under public land concessions. A law regarding the forest conservation unit system was recently submitted to...
Congress for debate and approval. A workshop with broad stakeholder participation to develop a draft concession model and define an appropriate legal framework was held in November 2003. A key stakeholder at the workshop was the attorney general, who mediated the discussion and provided guidance on legal solutions. The public land concession system is expected to be tested and implemented in 2004.

Honduras noted a number of lessons learned: the fact that forests contribute to GDP must be well articulated to strengthen the argument for allocating more funds to forest management and protection; environmental service such as climate regulation and ecosystem services should be valued in economic terms and compensated for; and revenues captured should be distributed in a more equitable manner.

The forestry sector needs to be included in broader national fiscal policy reform negotiations. There should be broad stakeholder participation in forest fiscal policy reform, and forest fiscal policy should be harmonized with the laws of other sectors. Additionally, politicians need to be educated about the forestry sector and its role in development and poverty reduction.

Concerning future actions, Honduras cited approval of the new forest bill; development of the national dialogue; improvement of information and awareness on forests’ contribution to the national economy, quality of life, and poverty alleviation; and linking forest fiscal reforms to the national poverty reduction strategy. Additional measures include conducting social audits to inform reform and reviewing and updating fiscal regulations on an ongoing basis to ensure they reflect changing situations.

Fiscal reforms in Nicaragua’s forestry sector are part of a larger societal public policy reform process that has been ongoing for the last decade. Under the new forest law, specific regulations are being developed under the general regulations and must be standardized within the national development plan. Steps to accomplish this will be taken once Nicaragua has completed the heavily indebted poor country (HIPC) process for debt relief.

Nicaragua’s next steps include establishing monitoring and follow-up mechanisms as a result of fiscal reform, finalizing agreements with municipalities to guarantee the success of fiscal reform and improve governance, continuing an open dialogue with civil society and the private sector, and developing a communications strategy to inform civil society and the media about reforms. Finally, agricultural and forestry sector policies must be harmonized.

Cambodia outlined several issues that included opposition to reform by forest concessionaires, limited human capacity and lack of good equipment, and a lack of trust among stakeholders (government, donor, and nongovernmental organizations, and the public and private sectors). As a next step, Cambodia plans to work with the public to define a procedure to formulate forest, budget, and taxation laws, as well as which stakeholders will be involved at what level. At the technical level, the plan for sustainable forest management, the forest revenue management system, and agreement on
land concessions need to be implemented, monitored, and audited to improve transparency and good governance. Cambodia would like to improve human capacity, increase research, and strengthen communication among stakeholders to improve cooperation and identify win–win policies.

As an important next step to better inform sector policy, Indonesia stressed the need for an inventory of forestry sector operations as well as detailing producers, scale of production, production type, type of permits issued (central or district), and type of fees. Reviewing mechanisms for revenue collection and the optimality of the fiscal systems and collecting better information on the cost of production and on setting an acceptable profit level for the private sector are also important tasks.

Cameroon identified short-term, midterm, and long-term actions. In the short term, a national workshop will be held on the results of this workshop. A review of the results of fiscal reforms during 1999–2003 will be conducted, and the log-tracking system will be implemented. Midterm priorities will be developing a tax targeted at NTFP and the informal sector and raising revenues for the national fund for environmental activities. In the long term, collaboration with subregional partners will ensure coherence of forest policies in central Africa to harmonize fiscal policies. Such harmonization would help to regulate transboundary timber movements, a priority for the private sector in Cameroon.

Ghana identified problems with illegal logging and related market price distortions for forest products and services and the large number of agencies involved in the collection of forest fees. Ghana emphasized building capacity for accurate media coverage of forestry sector issues, effectively balancing national revenue objectives and forestry sector objectives, and improving information dissemination to facilitate the reform process. Ghana’s next steps will be to broaden the decision-making process and dialogue with stakeholders, develop mechanisms for interministerial collaboration, study cost structures to set appropriate taxes for industry, and institute a log and product tracking system to improve revenue collection.

**Perspectives of donor and development agencies**

The International Monetary Fund (IMF) noted the workshop discussions emphasized taxes over other revenue instruments and commented on the importance of property ownership, land tenure policy and associated rights, and responsibilities in meeting the two objectives of capturing forest revenues and promoting sustainable forest management. The IMF recommended sharing success stories and good practices in gaining fiscal dividends and raising awareness of the large costs to society of poor fiscal policy management.

The U.K.’s Department for International Development (DFID) emphasized developing the relationship between finance ministries and forest agencies. DFID believed assistance and capacity building to initiate a log-tracking system would be appropriate, but
cautioned that the costs of maintaining such a tracking system should be ultimately absorbed into the market. DFID encouraged the development of a learning group on forest fiscal systems and suggested that participants could share their experience at the upcoming session of the U.N. Forum on Forests in 2004.

German Technical Cooperation (GTZ) stressed that forest fiscal reform must be considered within broader development frameworks and emphasized improved dialogue and political bargaining among forestry sector stakeholders. As part of a program on environmental fiscal reform sponsored by the Organization for Economic Cooperation and Development, a meeting was held in Berlin in November 2003 with forest as one of the pilot sectors in the program. GTZ may be able to provide assistance to fiscal reform processes through ongoing support to NFPs. Moreover, a new GTZ program to support COMIFAC (the Conference of Forest Ministers in Central Africa) could support a process for regional fiscal policy harmonization in central Africa.

In closing the workshop, Jim Douglas of the World Bank commended participants for discussing not only how to collect revenue, but how much revenue to collect and how it should be allocated among various uses. Noting that concession management systems’ have typically focused on input-based regulation resulting in inefficient management, Mr. Douglas suggested a closer examination of outcome-based regulatory systems as a topic for future discussions. He supported a learning group and suggested that PROFOR could provide a platform for such information sharing. He also expressed the World Bank’s willingness to support activities such as a side event on the reform of forest fiscal systems at the 2004 U.N. Forum on Forests.
ANNEX 1: FINAL PARTICIPANT LIST

International Workshop on Reform of Forest Fiscal Systems

October 19–21, 2003
World Bank, Washington, D.C.

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ANNEX 2: AGENDA

International Workshop on Reform of Forest Fiscal Systems

October 19–21, 2003
World Bank, Washington, D.C.

Day 1 Sunday, October 19
6:30 p.m. Cocktails
7:00 p.m. Dinner and Welcome (Lombardy Hotel)

Day 2 Monday, October 20
8:30–9:00 a.m. Registration (with coffee), participant per diems
9:00–9:30 a.m. Welcome: Kevin Cleaver (ARD), Dan Biller (WBIEN)
Introduction of participants; workshop objectives
(Tapani Oksanen)
9:30–11.00 a.m. Country presentation (Ghana)
Country presentation (Cameroon)
Open discussion
11:00–11.30 a.m. Coffee
11:30–1:00 p.m. Country presentation (Indonesia)
Country presentation (Cambodia)
Open discussion
1:00–2:00 p.m. Lunch
### Day 2 continued  
**Monday, October 20**

<table>
<thead>
<tr>
<th>Time</th>
<th>Activity</th>
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<tbody>
<tr>
<td>2:00–3:30 p.m.</td>
<td>Country presentation (Honduras)</td>
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<td>Country presentation (Nicaragua)</td>
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<td>Country presentation (Brazil)</td>
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<td>Open discussion</td>
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<td>3:30–4:00 p.m.</td>
<td>Coffee</td>
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<td>4:00–5:30 p.m.</td>
<td>Breakout groups on three key themes:</td>
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<td>• Mix of fiscal instruments: Impacts on key stakeholders,</td>
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<td></td>
<td>balancing economic and environmental objectives, and</td>
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<td></td>
<td>administrative and political feasibility</td>
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<td>• Use of revenues raised: General budget, forestry management (e.g.,</td>
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<td></td>
<td>monitoring and enforcement), and nonproductive uses (legal political</td>
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<td>patronage and illegal corruption)</td>
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<td>• Managing the fiscal reform process: Role of key</td>
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<td>stakeholders for and against reforms, building coalitions</td>
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<td>and identifying champions, sequencing, overcoming private</td>
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<td>sector and political vested interests</td>
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### Day 3  
**Tuesday, October 21**

<table>
<thead>
<tr>
<th>Time</th>
<th>Activity</th>
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<tbody>
<tr>
<td>9:00–9.15 a.m.</td>
<td>Summary of first day and feedback</td>
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<td>9.15–11.00 a.m.</td>
<td>Report back and discussion on thematic breakouts</td>
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<td>Discussion</td>
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<td>11:00–11:30 a.m.</td>
<td>Coffee</td>
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<tr>
<td>11:30–1.00 p.m.</td>
<td>Breakout groups of country teams to agree on next steps</td>
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<td>1:00–2:00 p.m.</td>
<td>Lunch</td>
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<tr>
<td>2:00–3:00 p.m.</td>
<td>Plenary presentation and discussion of country teams’ next steps (four</td>
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<td></td>
<td>teams followed by discussion)</td>
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<tr>
<td>3:00–3:30 p.m.</td>
<td>Coffee</td>
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<tr>
<td>3.30–4.30 p.m.</td>
<td>Plenary presentation and discussion of country teams’ next steps –</td>
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<td></td>
<td>continued (three teams followed by discussion)</td>
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<tr>
<td>4.30–5.00 p.m.</td>
<td>Comments by external agencies: Ideas for follow-up</td>
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<tr>
<td>5.00–6.00 p.m.</td>
<td>Closing discussion: Next steps and follow-up activities</td>
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