

Logging Burma's Frontier Forests: Resources and the Regime

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MAJOR FINDINGS

1. Burma holds half of the remaining forest in mainland Southeast Asia. Having lost virtually all of their original forest cover, Burma's neighbors--China, India, and Thailand--rely increasingly on Burma as a source of timber. Most of the regional timber trade is illegal.
2. The rate of deforestation in Burma has more than doubled since the State Law and Order Restoration Council (SLORC), the military regime that rules the country, came to power in 1988.
3. Increased deforestation is primarily due to a rapid growth in logging in Burma's border areas. Timber exports have helped pay for the regime's arms purchases and a doubling in the size of the army.
4. Seventeen of the 20 ethnic minority armies, many of which have been in insurrection since independence in 1948, have negotiated cease-fires with the regime, but not peace agreements. The current situation of "no peace, no war" has encouraged unbridled logging in some of the border areas.
5. Wasteful and destructive logging by the regime, some of the ethnic minorities, and foreign companies along the borders with China and Thailand has resulted in extensive deforestation that has caused massive soil erosion, sedimentation of rivers, increased flooding, and acute dry season water shortages in some areas.
6. Satellite data show that forest clearing in Kachin State more than tripled between 1978-1989 and 1989-1996, and that logging is responsible for almost half the deforestation. Kachin State holds one of the region's last large tracts of relatively undisturbed forest. The rapid fragmentation of this forest, and the biodiversity conservation and watershed protection it provides, is of national and international concern.
7. Opinion is divided on whether the international community should engage the regime to support forest conservation in Burma. Only limited opportunities exist for the international community to provide effective support to local communities or to the Forest Department, or to engage the regime through Burma's signatory status to international agreements.
8. Under current political circumstances, there is no scope for direct engagement by the international community. It is therefore recommended that an independent satellite-based forest monitoring system be established to report on the state of Burma's forests, that environmental issues be included in the international dialogue about how to influence the regime, and that the international community take advantage of international agreements to request information from the regime about forest management and timber production.

1. Introduction

Burma holds more than half of mainland Southeast Asia's closed forests--forests that have caused the country to be called "the last frontier of biodiversity in Asia" (Forest Department, 1997b). Yet these forests are not inexhaustible resources. Deforestation is increasing, and an analysis of current satellite data shows that Burma's remote frontier forests are now threatened. Although agricultural conversion, fuelwood cutting, and charcoal production are the main causes of deforestation in the lowland areas of central and southern Burma, logging appears to be an important factor in the fragmentation of the remaining intact forests that cover Burma's mountainous border areas. This report focuses on the environmental implications of logging in these areas and on the political and economic forces behind this logging.

The report does not argue against logging per se. History shows that countries liquidate a portion of their natural capital to build the roads, schools, hospitals, and other services needed to develop their human resources (World Bank, 1997). The World Bank estimates that human resources form the dominant share of wealth, even in low-income countries, and that failure to invest proceeds from wealth-generating activities (e.g., logging) in a country's human resources leads inexorably to impoverishment. This is the course that Burma appears to be following. According to the U.S. Embassy in Rangoon, defense spending has increased, and health and education spending have decreased, both in real terms and as shares of government disbursements, since the State Law and Order Restoration Council (SLORC) was formed in September 1988. In fact, the ratio of military to social service expenditures is by far the highest in the region.

Instead of arguing against logging itself, the report makes the following points. First, properly managed, Burma's forest resources can make a substantial contribution to the country's development through timber production, tourism, and watershed management. Second, in the past 30 years, Burma's forests have suffered from unsustainable logging--much of it illegal. Since 1988, the trend has accelerated, most sharply in the border areas. Third, the long-term conservation of Burma's extraordinary biodiversity will require a degree of local management to ensure the implementation of policies that will be respected and supported by the population.

The report is divided into seven parts. Chapter 2 presents bibliographic and statistical data describing Burma's

forest types, documents the intensification of commercial timber production since 1962, and outlines relevant provisions of the 1995 Forest Policy. Chapter 3 presents evidence that increased timber exports, particularly since 1988, are related to the regime's increasingly desperate search for foreign exchange and growing demands from Thailand and China for wood. Most of these exports are unreported by the regime. Chapters 2 and 3 also provide background information on the declining state of forest management and biodiversity conservation in Burma. Chapters 4 and 5 focus on the border areas. Chapter 4 covers the recent history of logging along the Thai and Chinese borders and describes some of its negative environmental consequences. Chapter 5 provides a detailed analysis of the situation in Kachin State, one of the most remote and densely forested regions in Southeast Asia. Satellite data show that these forests are being fragmented by a combination of shifting cultivation and logging. Logging, according to eyewitness reports, has taken off since cease-fires were signed between Rangoon and the ethnic minority armies in 1989. Chapter 6 deals with the issue of whether the international community should engage the regime to promote forest and wildlife conservation in Burma. Chapter 7 provides conclusions and recommendations. Appendix A describes how the satellite data were processed and interpreted and Appendix B contains maps of the region.

1.1 Physical Geography

Burma has a total area of 676,553 square kilometers (km²) and is situated in the northern part of mainland Southeast Asia, with an elongated length of 2,100 kilometers (km). High mountain ranges form a continuous barrier along the western border with India and Bangladesh, and extend southward parallel with the coast almost to the Irrawaddy Delta. (See Figure 1, Appendix B.) In the northeast, the border with China follows the high crest of the Irrawaddy-Salween divide, then bulges eastward to enclose the mountainous Shan Plateau that borders Laos and Thailand. West of the Shan Plateau lies the fertile, heavily populated Irrawaddy Valley, with its largest tributary, the Chindwin, joining it from the northwest. The Salween flows south from China, cuts through the Shan Plateau, and empties into the Gulf of Martaban near Moulmein. The west Arakan and southern Tenasserim coasts consist of narrow plains and parallel mountain ranges of moist forest, with an extensive delta and mangrove areas around the mouth of the Irrawaddy.

Burma's climate varies greatly from the temperate north and high-altitude zones to the equatorial regions far south. Annual rainfall ranges from over 5,000 millimeters (mm) along the coast to less than 800mm in the rain-shadow of the Central Dry Zone where mountains running along the Arakan coast block the heavy monsoon rains. Most of the rainfall arrives between mid-May and October; a cold season occurs from November to January, followed by a hot season from February to mid-May.

1.2 Human Development

In 1993, Burma's population was estimated at 44.6 million, based on the most recent census, which was conducted in 1983. Three quarters of Burma's population live in rural areas, predominantly as subsistence farmers. (See Figure 2, Appendix B.) The population comprises about 28 million (60 percent) Burmans from southern and central Burma, and about 17 million (40 percent) members of ethnic groups that inhabit the arc of mountains along Burma's borders. The largest ethnic groups are the Karen (9 percent), Shan (7 percent), Chin and Mon (2 percent each), and Kachin and Wa (1 percent each).

Living standards have deteriorated steadily during the 35 years of military rule. Recent health and education surveys show that the leading indicators of human development--infant mortality (9.4 percent), under-5 mortality (14.7 percent), maternal mortality (14 percent), under-3 malnutrition (32.4 percent), primary school completion (27 percent), and income on a purchasing-power-parity basis (US\$700)--are much worse than the regional average and, in some cases, have deteriorated sharply since 1987 (UNICEF, 1995). Conditions are generally worse in the seven states where the majority of the ethnic minorities reside. For example, infant mortality rates in ethnic Karen regions and in eastern Shan State are estimated at 20 percent and 30 percent, respectively (Smith, 1994). There are not sufficient funds for basic health and education services because of a persistent government refusal to allocate any part of its foreign exchange earnings to the nonmilitary sector. Education and health represented 12 percent and 4 percent, respectively, of legal central government expenditures in 1995, or less than one third of defense expenditures (U.S. Embassy, 1996).

Burma's absolute and relative decline is captured by the United Nations Development Programme's (UNDP's) Human Development Index. According to the index, which combines purchasing power, literacy, and life expectancy, Burma is a "low human development" country, ranked 133 out of 174 countries--81 places behind Thailand, 12 places below Vietnam, and just 5 places above Laos (UNDP, 1996). The World Bank, the Asian Development Bank, and the International Monetary Fund are currently prohibited from lending to Burma because of the regime's excessive military expenditures, lack of macro-economic transparency, and human rights abuses.

1.3 Recent Political and Economic History

After gaining independence from Britain in 1948, the Union of Burma was considered the country in South-East Asia most likely to succeed economically. Real growth of gross domestic product (GDP) averaged more than 6 percent between 1950 and 1960, and Burma was the world's second largest rice producer, with an abundance of mineral wealth and extensive forest cover. In addition, the country had a high literacy rate, a free press, and an elected parliament. Yet, Burma also contained more than 40 ethnic groups, and problems of cohesion soon surfaced. Within 2 months of independence, the Communist Party of Burma rebelled, and shortly thereafter, the Karen, Burma's largest ethnic minority, began their struggle for independence.

In 1962, the prospect that negotiations underway between Rangoon and leaders of the ethnic minorities might lead to the creation of a federal system, which would have given more power to the ethnic states, triggered a military coup and the installation of General Ne Win as dictator. After ruling by decree for 12 years, General Win promulgated a new constitution in 1974 that provided for a unitary state composed of seven divisions in Burma proper and seven minority states, all of which were to be controlled from Rangoon, the capital city. Yet the failure to allow a meaningful degree of ethnic autonomy led to continued fighting that, until the recent cease-fires, killed about 10,000 people a year, most of whom were civilians, with large fluctuations in the number of deaths depending on the intensity of the fighting. The civil war has also generated more than a million refugees. Another million or so have been forcibly displaced by the regime for security reasons (Smith, 1994).

From 1962 to 1988, the military dictatorship imposed a centrally planned economy aimed at national self-sufficiency, which it styled the Burmese Way to Socialism. Manufacturing and trade were monopolized by the regime, and farmers' surpluses in Burma's largely agricultural economy were purchased and distributed at prices set by the regime. National income stagnated and, in the mid-1980s, started to decline. In 1987, Burma was officially recognized as a "least developed nation" by the United Nations.

In August 1988, following a poor harvest and the third of Ne Win's demonetizations of much of the local currency, antigovernment demonstrations erupted throughout Burma and swiftly developed into a broad-based prodemocracy movement, of which Aung San Suu Kyi, daughter of the leader of Burma's struggle for independence in the 1940s, emerged as one of the central figures. In the face of this movement, Ne Win resigned; in September 1988, however, the military reacted by bloodily suppressing the prodemocracy movement and transferring power to the State Law and Order Restoration Council (SLORC).

The SLORC is a collective decision-making body with 21 members and 3 acknowledged leaders: Army Commander-in-Chief General Than Shwe, Army Deputy Commander-in-Chief General Maung Aye, and Director of Defense Services Intelligence Lieutenant General Khin Nyunt. Little is known about the precise way in which decisions are made within the SLORC, or even the extent to which the top three leaders have absolute vetoes or qualified vetoes.

The SLORC permitted a relatively free election in May 1990 but failed to honor its results--an overwhelming rejection of military rule--or to cede power to the victorious National League for Democracy (NLD) led by Aung San Suu Kyi, who won the Nobel Peace Prize in 1991 for her unflagging efforts to pursue democracy and ethnic reconciliation by peaceful means. Instead, the SLORC attacked the elected NLD representatives through intimidation, detention, and house arrest.

Unfortunately, the SLORC's repression of human rights continues. According to Amnesty International, 1996 was Burma's worst year for human rights.

On November 15, 1997, the SLORC was officially dissolved and renamed the State Peace and Development Council (SPDC), a move apparently designed to win international legitimacy. The council consists of 19 officers, many of whom are regional commanders, rather than the generals that had dominated the SLORC.

Forests and forest history of the Leningrad region in some ways resemble regions further south. Keeping it in the study is useful in order to demonstrate some principle differences. The studied region in N Sweden consists of the counties Gästrikland and Ångermanland. Introduction of five-year plans for Soviet socio-economic development led to a very strong focus on increasing harvest volumes and the role of forest legislation as a safeguard of sustainable forest use was weakened. (Algvare 1966; Shubin et al. 1998). Still, two legislative components, both introduced in the 1940s are worth mentioning. First, forest zoning was introduced. Logging Burma's Frontier Forests book. Read reviews from world's largest community for readers. Increased investment by Asian logging companies from Malaysia... Goodreads helps you keep track of books you want to read. Start by marking "Logging Burma's Frontier Forests: Resources and the Regime" as Want to Read: Want to Read saving... Want to Read. Burma's eastern borderlands have long been of concern to the lowland state for a number of reasons. In the premodern, colonial and postcolonial periods, the people located between rival Burmese and... Logging Burma's frontier forests: Resources and the regime. Washington, DC: World Resources Institute, 1998. Google Scholar. Callahan, M. "Political authority in Burma's ethnic minority states: Devolution, occupation, and coexistence." Policy Studies 31 (2007). Google Scholar. Facilitated by organized crime, illegal logging threatens to destroy Myanmar's forests. But a national energy crisis and the ensuing fuelwood demand pose an equal threat. Far from the frontier forests, it's easy to imagine illegal loggers as a rogue group of bandits with chainsaws. But in reality, the men cutting trees are the timber-trade equivalent of the street-corner drug dealer. They're just a small part of a larger organized crime ring, akin to the druglords of Mexico. Under the socialist government, military leaders awarded lucrative logging contracts to themselves and their friends. On paper, the Forest Department set an annual limit for how much timber they could extract.