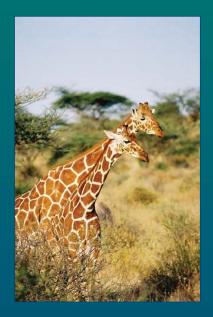
U.S. Agency for International Development

# **Biodiversity Conservation**









USAID's Biodiversity Conservation Programs, Fiscal Year 2003

August 2004

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USAID's Biodiversity Conservation Programs Fiscal Year 2003



U.S. Agency for International Development Washington, D.C. 20523

August 2004

# **EXECUTIVE SUMMARY**

The U.S. Agency for International Development (USAID) is committed to helping developing countries maintain biologically diverse habitats and environmental services, while supporting sustainable development and economic growth. For the past three decades, the Agency has helped countries maintain and manage the variety of species, genetic resources, and ecosystems in natural settings such as forests, grasslands, wetlands, and coastal, marine, and freshwater habitats. USAID currently implements many types of conservation programs including ecoregional and protected area management, community-based natural resources management, enterprise-based conservation initiatives, public-private conservation alliances, innovative long-term conservation financing, environmental education, and policy development and reform.

This document presents an overview of USAID's biodiversity conservation programs. It summarizes programs and activities implemented in Africa, Asia and the Near East, Europe and Eurasia, and the Latin America and Caribbean regions, highlighting achievements in Fiscal Year (FY) 2003. The summary descriptions of projects and activities are focused on the biodiversity conservation components of the programs.<sup>1</sup> Many of these programs support other objectives such as improved livelihoods and good governance, in addition to biodiversity conservation.

In Africa, USAID supports a range of biodiversity conservation activities at the regional and country levels with emphasis on community-based natural resource management and wildlife conservation programs. The regional programs include the natural resources program of the Africa Bureau's Office of Sustainable Development, the Regional Center for Southern Africa based in Botswana, the Central African Regional Program for the Environment and the Congo Basin Forest Partnership, and the Mountain Gorilla Habitat Conservation program. Country-level biodiversity conservation activities are being implemented in Ghana, Guinea, Kenya, Madagascar,

Malawi, Namibia, Senegal, Tanzania, Uganda, and Zambia.

In Asia and the Near East, USAID is implementing country-level programs in Egypt, Bangladesh, Cambodia, India, Indonesia, Nepal, the Philippines, and Sri Lanka. Activities in the Asia and the Near East region emphasize sound governance of forest resources; combating illegal logging; reducing conflict over forest resources; non-timber forest product enterprise development; and freshwater, coral reef, and marine protected areas management.

USAID participates in biodiversity and forestry initiatives in the temperate and boreal forests of Europe and Eurasia through Assistance for Eastern Europe and the Baltic



USAID's conservation efforts help protect habitats to better ensure the survival of plant and animal species.

<sup>&</sup>lt;sup>1</sup> Additional information on specific programs may be obtained from the Center for Development Information and Evaluation at http://www.usaid.gov/policy/cdie/ or the USAID website at www.usaid.gov. Information may also be obtained from USAID websites at http://www.usaid.gov/missions/.

States, as well as Freedom Support Act, funds. The funds support activities in Bosnia and Herzegovina, and Bulgaria. These activities focus on national park management, ecotourism development, and sustainable extraction of non-timber forest products, thereby linking biodiversity conservation efforts directly with economic growth.

In Latin America and the Caribbean, programs are strengthening protected area, ecoregional, and watershed management, and protecting critically threatened ecosystems in the region. These include the Caribbean Regional Program, the Regional Environment Program for Central America, Parks in Peril, and the Neotropical Raptor Conservation Program. Country-level programs are being implemented in Bolivia, Brazil, Colombia, Dominican Republic, Ecuador, Guatemala, Honduras, Jamaica, Mexico, Nicaragua, Panama, Paraguay, and Peru.

The USAID centrally funded programs are managed by the Bureau for Economic Growth, Agriculture, and Trade (EGAT), specifically by the Biodiversity, Forestry, Water, and Land Resources Management Teams in the Office of Natural Resources Management. Biodiversity related activities are also supported by the EGAT Office of Agriculture, EGAT Office of Environment and Science Policy, and the Global Health Bureau's Office of Population and Reproductive Health. Centrally funded programs include: the Global Conservation Program, which focuses on site-based conservation of globally significant areas of biodiversity; sustainable forest and protected area management; the Coastal Resources Management Program; environmental governance and environmental education programs; population-health-environment programs; and biodiversity research initiatives



Hook-billed kite chick peers from its nest, one of many species benefiting from the USAID-supported Neotropical Raptor Conservation Program.

including support to the Consultative Group on International Agricultural Research (CGIAR) and programs in the Middle East. In addition to the EGAT programs, USAID obligated funds toward the Tropical Forest Conservation Act (TFCA) in FY 2003, and toward public-private biodiversity conservation alliances through USAID's Global Development Alliance Secretariat.

In summary, this document presents USAID's efforts in conservation of biodiversity worldwide. It is intended to provide readers with a resource describing ongoing conservation efforts at USAID, and the achievements of these conservation efforts around the world in FY 2003.

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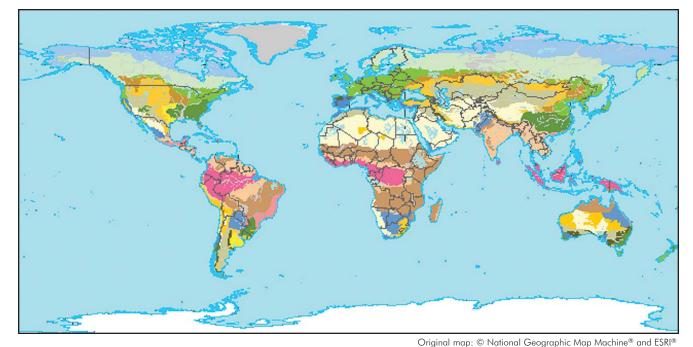
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# INTRODUCTION

The United States recognizes that the extinction of plant and animal species is an irreversible loss with potentially serious environmental and economic consequences for developing and developed countries alike. The U.S. Government, therefore, has taken a lead role in preventing biodiversity loss. It recently increased spending for biodiversity conservation, and is currently one of the largest bilateral donors of biodiversity conservation around the world.

Human activities such as logging, mining, and exploitation of plant and animal resources, as well as conversion of natural habitats to agricultural lands, are causing habitat degradation and driving species extinction. However, there is growing awareness among leaders in the United States and in developing countries of the serious consequences of species extinction and habitat loss. They recognize that the conservation of biodiversity does not require the sacrifice of economic opportunities. National governments are, therefore, becoming increasingly committed to taking action to halt the trends of deforestation and extinction.



#### **Natural Landscapes of the World**



USAID programs are demonstrating a variety of approaches that combine conservation with development. These efforts offer the possibility of slowing and even reversing habitat degradation and species loss, while bringing real economic benefits to the rural poor.

# **U.S. Interest in Biodiversity Conservation**

The high priority placed by the U.S. Government on biodiversity conservation is reflected in Section 119 of the Foreign Assistance Act that instructs USAID and other appropriate international organizations to make a special effort to continue, and increase assistance for, sound wildlife habitat management and plant conservation programs.<sup>2</sup>

Biodiversity conservation links directly with other international development efforts of the United States, and with major U.S. national interests: national security, economic prosperity, law enforcement and humanitarian response, and issues related to health and population. For instance, conflicts over scarce and vital natural resources can generate severe stress, in some cases stimulating insurgencies, ethnic clashes, and mass migration.

Empowering local governments and communities to manage natural resources is an opportunity to promote more effective democracies and just societies, while simultaneously ensuring that intact ecosystems continue to provide communities with the environmental services upon which they depend.

The World Summit on Sustainable Development in 2002, and the World Conservation Union's (IUCN) World Parks Congress in 2003, placed high importance on these and other linkages. The World Summit drew attention to the important contribution of biodiversity to environmental services, human health, economic growth, and human security. It recognized the roles of poverty, poor governance, and

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Deforestation is a major threat to jaguars. USAID aims to conserve threatened species by supporting efforts that prevent habitat loss.

political instability as significant limiting factors in achieving biodiversity conservation. The World Parks Congress also emphasized the need to address issues of poor governance, conflict, and poverty as important aspects of biodiversity conservation. Linkages such as these play an important role in many USAID programs, where ties between conservation and development programs are proving mutually beneficial.

# **USAID's Strengths in Biodiversity Conservation**

Linking biodiversity and development is one of USAID's strengths. The Agency recognizes that while biodiversity is a global resource, it is also a critical local resource, providing watershed protection, refuge for pollinators, direct economic opportunities, and local cultural needs. USAID is particularly strong in integrating conservation efforts with other sectors and development initiatives, such as economic growth, agriculture, natural resources management, population, health, and democracy and governance. These efforts simultaneously address multiple environmental and development challenges, making many of the biodiversity conservation projects more sustainable. Such integrated conservation efforts are illustrated in Madagascar, where the mission's programs in biodiversity conservation and sustainable management of environmental services are closely linked with the provision of better health services such as safe drinking water and sanitation in protected area buffer zones.

The Agency's dynamic partnerships with other conservation organizations are a critical component of program success. USAID programs are implemented through a variety of partners, including governments, non-governmental organizations (NGOs), and private organizations. In this way, Agency programs help build in-country capacities of governments and local organizations, thus contributing to both civil society strengthening and conservation goals.

# **History of USAID Support for Biodiversity Conservation**

USAID has funded biodiversity conservation programs for nearly 30 years. The Agency's assistance for biodiversity conservation began in the 1970s, with missions directing small amounts of funds primarily toward conservation of natural forests. In 1978, USAID joined with the Department of State to support a U.S. Strategy Conference on Tropical Deforestation. This was followed by the Agency's support to a U.S. Strategy Conference on Biological Diversity in 1981.<sup>3</sup> Soon after the second conference, the Environment Division of USAID's Office of Science and Technology became a separate Office of Forestry, Environment and Natural Resources within the newly-created Science and Technology Bureau. The new office worked with the U.S. Department of Interior to set up a federal interagency working group on biodiversity conservation, which operated between 1982 and 1985. The biodiversity conference and operations of the working group resulted in increased attention to biodiversity conservation issues among U.S. federal agencies, NGOs, and Congress. In 1986, Sections 118 and 119 were added to the Foreign Assistance Act, and the first Biodiversity Conservation directive of \$1 million appeared in the FY 1986 Appropriations Act. The first Tropical Forestry and Biodiversity Report to Congress was submitted at the end of FY 1986.

During the 1970s and early 1980s, most biodiversity conservation activities operated either as portions of larger projects or as small grants for conservation activities. Programs focused on conservation in protected areas, although as early as the 1980s some programs began supporting conservation in natural forests outside protected areas. For instance, in 1980, the Agency launched a pilot effort emphasizing natural forest management in Niger, where a community-based natural forest management program improved vegetative regeneration without the introduction of exotic species.

In the late 1980s and 1990s, USAID began to provide biodiversity research grants that promoted innovation and the development and testing of novel approaches through several programs, such as the Biodiversity Support Program, the Innovative Science Research, Technical Support project, and the Pacific Islands Marine Resources project. These research programs undertook analysis to determine the most effective conservation practices and developed numerous concepts and tools for conservation practitioners. Subsequently, the Agency shifted from support of basic research to more applied programming.

<sup>&</sup>lt;sup>3</sup> See USAID policy paper "Environment and Natural Resources" at: www.usaid.gov/policy/ads/200/envirnat/envirnat.pdf



Madagascar's protected area network is being expanded to include 100 percent of the country's biodiversity within the National Park system, such as Ranaomafona National Park.

The early 1990s saw the development of new and diverse ways of financing conservation programs. In 1990, the Enterprise of the Americas Initiative began promoting debtfor-nature swaps in the Latin America and Caribbean region and creating environmental trust fund projects. In 1992, the first major debt-for-nature swap in Guatemala was completed as part of USAID's Maya Biosphere Natural Resources Management Project. Programs began to seek private-sector solutions for conservation finance, some of which involved the engagement of private businesses through the development of ecotourism. In another pioneering venture, USAID supported Cultural Survival Enterprises to develop marketing mechanisms for non-timber rainforest products for Southeast Asia, Central Africa, and South America that promoted harvesting of forest resources using sustainable management techniques. These initiatives, while innovative at the time, remained limited in number.

As USAID programs in tropical forestry and biodiversity conservation expanded and became prominent components of USAID's portfolio, significant changes resulted in how projects were designed and implemented. By the mid-1990s, many biodiversity programs began to shift from the protected area focus to Integrated Conservation and Development Programs. The Integrated Conservation and Development Programs evolved as a method to address concerns of human development and biodiversity conservation, and to make them synergistic in ways that would draw public and financial support for both.

In parallel with these transitions, USAID programs began to experience shifts in program implementation. Rather than implement programs through host country national governments, the Agency worked increasingly with NGOs and local communities. In turn, NGOs worked with government agencies to introduce institutional and policy reforms, making policies more favorable for conservation. To improve local capacity for program implementation, innovation, and quality of program design, many programs began to emphasize human resource development, and capacity building of NGOs and local communities. Programs also promoted cooperation among donors, government agencies, NGOs, and local communities.

# **USAID Biodiversity Conservation Budget Trends**

Between 1985 and 1986, a Washington-based small grants program began funding projects in biodiversity conservation. The first new central biodiversity project was developed in 1987 and launched with a formal signing ceremony between the USAID Administrator and the President of the World Wildlife Fund early in 1988; this project became known as the Biodiversity Support Program.

The Agency's sustained biodiversity conservation funding began with \$5 million in FY 1987 and increased to \$90 million in FY 1992, as shown in Figure 1. These amounts include all funding sources: Development Assistance (DA), Assistance for Eastern Europe and the Baltic States (AEEB), Economic Support Funds (ESF), and the Freedom Support Act (FSA). Levels of biodiversity funding fluctuated in subsequent years; however, since FY

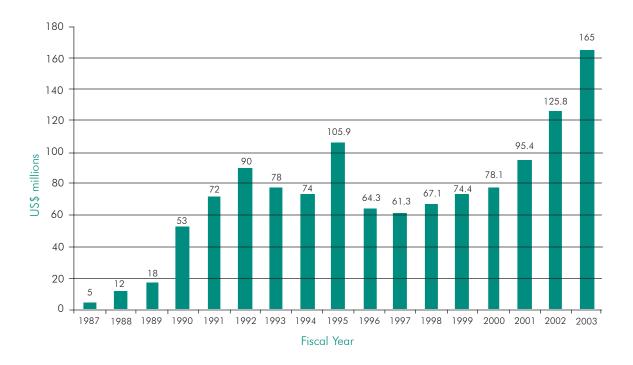
1997, USAID funding for biodiversity has experienced a steady increase, reaching \$165 million in FY 2003.<sup>4</sup> Approximately \$156 million of the FY 2003 funding represented DA funds, including the \$20 million transferred to the Department of Treasury for the Tropical Forest Conservation Act (TFCA).

In FY 2003, Congress directed USAID to invest \$145 million in DA funds for activities that "directly protect biodiversity, including forests." This included the \$20 million for the TFCA, and represents the highest directed level for the Agency in biodiversity to date.

### **Current U.S. Funding for Biodiversity Conservation**

The majority of the U.S. bilateral development assistance for biodiversity conservation is channeled through USAID. In addition to USAID, other U.S. agencies including Department of Treasury, Department of State, the Fish and Wildlife Service, the USDA Forest Service, and the National Park Service manage funds to support conservation-focused biodiversity activities in developing countries (see Table 1).

As shown in Table 1, in FY 2003, USAID obligated close to \$165 million toward biodiversity conservation and tropical forestry, including funds obligated toward the Tropical Forest Conservation Act (TFCA - for additional information on the TFCA, see page 73). Of the \$107.5 million appropriated to the Global Environment Facility from the Department of Treasury, approximately \$40 million supported biodiversity projects. The Fish and Wildlife Service's International Affairs Program had \$15.5 million appropriated to activities related to the protection of endangered species, of which \$3 million was appropriated through the Neotropical Migratory Bird



#### Figure 1. USAID Assistance for Biodiversity Conservation, 1987-2003 (all accounts)

 $^{4}$  An appropriation is an act of Congress permitting federal agencies to incur obligations for specified purposes. An obligation represents the 5 amount of funds made available for use (which may be different from the amount actually expended that year).

Table 1: U.S. Government International					
Biodiversity	Conservation	Funding F	Y 2003*		

USAID	\$164,952,913
Department of Treasury	\$39,775,000
Fish and Wildlife Service	\$15,500,000
Department of State	\$6,500,000
Forest Service	\$3,500,000
National Park Service	\$946,000

\* Biodiversity programs were supported by the National Oceanic and Atmospheric Administration, the Department of Agriculture, the Department of Interior, and the Department of State's Bureau of Oceans and Environmental and Scientific Affairs. The biodiversity funding levels for these agencies were not available at the time of preparation of this report. Conservation Act. In FY 2003, \$6.5 million was appropriated to the Department of State toward international conservation programs through the International Organizations and Programs Account. Funds supported international organizations and programs, such as Convention on International Trade in Endangered Species (CITES), Ramsar Convention, and International Tropical Timber Organization, as well as the United Nation's Environment Program and the World Heritage Convention. Approximately \$3.5 million was appropriated to the Forest Service International Programs to support biodiversity conservation in forests. Finally, close to \$1.0 million was appropriated to the National Park Service in FY 2003 for the establishment and management of parks in other nations.<sup>5</sup>

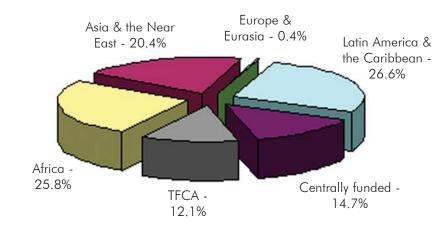
USAID's biodiversity programs are working to conserve species and habitats in more than 45 countries, with more than 30 USAID missions whose objectives include biodiversity conservation activities in terrestrial, coastal, marine, freshwater, and wetland areas. Most of USAID's spending on biodiversity is through its in-country missions. The remainder of USAID funding for biodiversity conservation is managed directly by the Agency's Washington-based regional bureaus and EGAT, as well as the TFCA and the Global Development Alliance Secretariats. The EGAT Bureau's Office of Natural Resources Management manages most of the EGAT biodiversity funds, primarily through the Biodiversity Team. The Forestry, Water, and Land Resources Management Teams also manage programs that support biodiversity conservation. In addition, the Global Health Bureau's Office of Population and Reproductive Health supports integrated population-health-environment programs, while EGAT's Office of Environment and Science Policy and Office of Agriculture support biodiversity conservation, primarily through applied research grants.

Approximately 95 percent of USAID funding for biodiversity conservation represent Development Assistance funds, while the remaining five percent represent the AEEB, ESF, and FSA funds. Funding figures provided in this report include all funding sources, unless indicated otherwise. Also, funding levels provided in this report represent biodiversity funding only, and are typically components of larger programs. Biodiversity components of the programs were identified based on three criteria: programs and activities had clearly defined biodiversity objectives, programs had target biodiversity results, and sites of program implementation were chosen with biodiversity significance as a prominent criterion.

Figure 2 shows the breakdown of FY 2003 obligations by region. In FY 2003, the Latin America and the Caribbean region accounted for 26.6 percent of USAID biodiversity funding, the Africa region accounted for 25.8 percent, the Asia and the Near East region accounted for 20.4 percent of these funds, while 14.7 percent of the funds were spent on global biodiversity programs through Washington. Only 0.4 percent of the biodiversity funds were channeled to the Europe and Eurasia region in FY 2003. The remaining 12.1 percent of the funds were obligated toward the TFCA. Relative to FY 2002, obligations for biodiversity programs in FY 2003 increased by approxi-

<sup>&</sup>lt;sup>6</sup> <sup>5</sup> Figures were obtained from Allgood et al. 2003. The International Biodiversity Budget (Compilation of materials contributed by Conservation International, The Nature Conservancy, Wildlife Conservation Society, World Resources Institute, and World Wildlife Fund), with the exception of the Forest Service International Programs figure, which was obtained through personal communication with U.S. Forest Service staff.

mately 39 percent in the Africa region due to the Administration's \$12 million increase for the Congo Basin Forest Partnership that built on the existing \$3 million Central African Regional Program for the Environment. Investments in other regions remained generally stable. The total USAID biodiversity obligations were higher in FY 2003 when compared to FY 2002, due in part to the TFCA obligations. Support for TFCA has historically been provided through Treasury; however, in FY 2003, funds were appropriated to USAID and then transferred to Treasury.





While USAID supports biodiversity conservation programs in a range of ecosystem types, a significant proportion of projects provide funding for biodiversity activities in forested habitats, thereby simultaneously supporting both biodiversity and forest conservation objectives. In FY 2003, forestry-related biodiversity activities accounted for approximately 62 percent of the total funds obligated for biodiversity conservation. The Foreign Assistance Act, Section 118 Report for FY 2003 provides details on the Agency's tropical forestry programs.<sup>6</sup>

In the Asia and the Near East region, approximately 59 percent of the funds obligated toward biodiversity conservation were in forest ecosystems. Major differences in spending were in the Philippines and Bangladesh, where biodiversity conservation in coastal and freshwater ecosystems respectively formed major components of the non-forestry biodiversity funds. In the Africa region, nearly 70 percent of the funds obligated toward biodiversity conservation were in forest areas. Major differences in the forestry and biodiversity programs in the Africa region were due to the emphasis on management of wildlife and game reserves and the management of savanna, coastal, and marine ecosystems, reflected in biodiversity programs in Namibia, Tanzania, and Zambia. In the Latin America and Caribbean region, the overlap in biodiversity and forestry was approximately 57 percent. Major differences in the forestry and biodiversity programs were in the Regional Environmental Program for Central America that includes a large coastal zone management component, Ecuador that includes marine and grasslands components, Panama with emphasis on watershed management, and Mexico with a large coastal zone management program. Programs in Bolivia, Colombia, and Honduras, on the other hand, had a greater forestry than biodiversity focus due to programs in areas that had little or no significance for biodiversity conservation. The greatest overlap between forestry and biodiversity programs was in the Europe and Eurasia region where 100 percent of funds obligated toward biodiversity conservation were in forests.

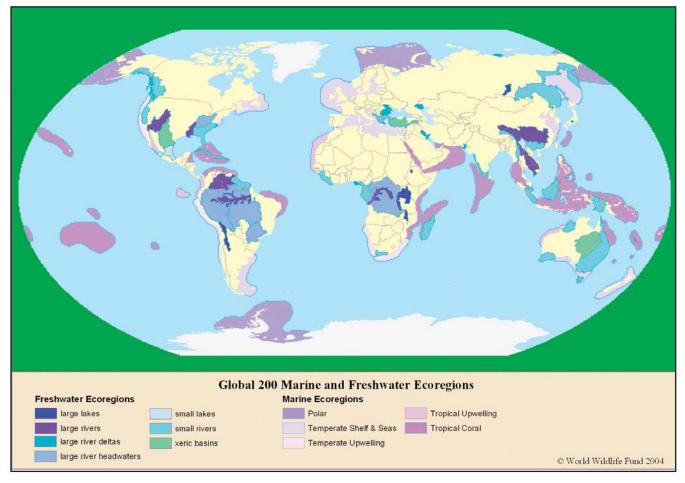
Figures presented here include funding from all accounts: DA, AEEB, FSA, and ESF.

<sup>&</sup>lt;sup>6</sup> The Tropical Forests reports for FY 2003 and previous years may be obtained from CDIE (http://www.usaid.gov/policy/cdie/), and from http://www.usaid.gov/our\_work/environment/forestry/forest\_pubs.html.

### **Current and Future Trends in USAID's Biodiversity Conservation Programs**

The diverse array of current biodiversity conservation programs builds on foundations and approaches developed in the 1990s. Programs are increasingly landscape focused with emphasis on ecoregional planning. They emphasize conservation of natural systems, with the belief that preserving endangered species is best carried out by preventing the loss of natural habitats. Programs are also increasingly emphasizing conservation in coastal, marine, freshwater, and wetland areas. The Agency currently supports conservation programs outside of forest ecosystems in more than 25 countries.

Learning from the Biodiversity Support Program, programs emphasizing a threats-based approach to conservation. This approach accentuates the need to identify key threats to conservation, prioritize these threats, and develop activities to abate them. The threats-based approach recognizes that biodiversity loss is caused by human actions, and that threats can be best addressed and mitigated if all stakeholders work together to develop sustainable solutions. While the Integrated Conservation and Development Programs had begun to address the human dimension of conservation, many of the development and conservation elements were implemented



#### **Marine and Freshwater Ecoregions**

in parallel and often not linked. The threats-based approach allows programs to focus on threats critical to addressing conservation concerns.

USAID also witnessed a trend toward integrating conservation activities among sectors. For instance, linkages are being made between conservation and the population and health sectors. Several mission conservation pro-

grams are now funded under the Economic Growth, and the Democracy and Governance programs. These linkages are increasingly possible given the variety of cross-sector topics in the Agency's conservation programs, including community-based conservation, sustainable natural resource use, economic incentives for conservation, conservation finance, and policy development and reform. Cross-sector linkages allow for the simultaneous achievement of goals in multiple sectors.

Increasingly, USAID programs are addressing issues in environmental governance that create incentives or remove barriers for local communities to conserve biodiversity and other natural resources. The decentralization and devolution of natural resources management and biodiver-



Maasai girl in Tanzania carrying firewood demonstrates people's dependence on natural resources.

sity conservation responsibilities to local governments and communities are important components of many mission programs. Many of these programs also emphasize concerns regarding equity in the distribution of conservation benefits.

Moreover, USAID biodiversity conservation programs promote approaches that emphasize institutional strengthening of national and local governments and NGOs, increased involvement of stakeholders, local participation, and transparency in program implementation. This focus has led to growing interest in working with indigenous communities as well as with large corporations that have logging and mining concessions in high biodiversity areas.

In addition to the trends noted above, USAID is committing more long-term funding for projects. Some projects described in this report have been funded for as long as ten years, a situation rarely encountered in the 1980s. The Agency promotes innovative, self-sustaining financing mechanisms that include and extend beyond private sector investment in ecotourism. For instance, programs are increasingly seeking solutions through new forms of private-sector involvement (as illustrated in the Global Development Alliances on page 15), creation of conservation concessions, and payment for ecosystem services such as carbon sequestration, and water quality and quantity. Increasing numbers of endowments are being capitalized through funds generated by debt-for-nature swaps. USAID is also exploring financial support for ex-situ conservation, particularly when it complements insitu conservation initiatives, and when measures for ex-situ biodiversity conservation take place in the country or region of origin of those plants or animals.

# **POLICY DEVELOPMENT**

#### **USAID** in National and International Environmental Fora and Policy Reform

Effective natural resources management requires a policy environment that supports conservation and discourages unsustainable or destructive practices. While much of USAID's work in biodiversity conservation is sitebased, the Agency also supports policy dialogues within host countries, between countries, and at the international level.

USAID supports site-based biodiversity conservation efforts with institutional and policy reform at the country level. Policy reforms in partner countries have included the creation and strengthening of departments of parks and wildlife conservation, the creation of national systems of protected areas, the establishment of protected area management structures, and the development of national environmental action plans. The Agency has also assisted host countries' introduction, implementation, and raising awareness of policies that provide incentives for biodiversity conservation on private lands. USAID has supported the decentralization and devolution of natural resources management rights and responsibilities to local communities in many partner countries.

The program descriptions provided in this report illustrate specific examples of national policy reforms. For example, in Namibia, USAID helped community organizations gain legal recognition and rights over natural resources. This has increased local responsibility and ownership over natural resources including wildlife, thereby increasing incentives to sustainably manage them. In Paraguay, the mission encourages decentralization of natural resources management to local municipalities and works to strengthen local institutions to effectively manage forests and protected areas. In the Dominican Republic, USAID helped the Secretariat of Environment and Natural Resources draft a biodiversity law for submission to the Dominican Congress. In the Philippines,



*Community Forestry Agents in Guinea are empowered to manage local natural resources as a result of policy reforms promoting decentralization.* 

the Agency supported the national government in developing TFCA agreements with the United States, promoting conservation efforts while easing foreign debt.

In addition to supporting policy reform in host countries, the Agency participates in international fora, treaties, and conventions concerning biodiversity conservation, such as the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), the Convention to Combat Desertification, the U.N. Framework Convention on Climate Change, the Ramsar Convention on Wetlands, and the Convention on Biological Diversity (see Box 1). Through its programs and activities, the Agency helps countries meet their obligations to the international environmental agreements to which they are parties. USAID also provides scientific, policy, and technical assistance at the

### **Box 1: International Conventions**

The United States is a Party to many multilateral environmental agreements. USAID supports the goals of the international and national environmental agreements through its mission and centrally funded programs and activities. Specific agreements include:

The United Nations Convention to Combat Desertification (CCD) is an international Convention that addresses the problems of land degradation in the world's arid, semi-arid, and dry sub-humid forests and savannahs. The Convention calls for a bottom-up participatory approach to address land degradation. Many of USAID's community-based natural resources management programs directly support the Convention's goals and objectives. The U.S. ratified the Convention in 2000. More information is available at http://www.unccd.int.

The Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) is an international agreement between governments to ensure that the survival of wild animals and plants is not threatened by international trade. The Convention has been in force for almost 30 years. Today, the Convention accords protection to more than 30,000 species of flora and fauna, of which close to 1,000 are listed under strictest protection. The U.S. ratified the Convention in 1974. More information is available at http://www.cites.org.

The United Nations Framework Convention on Climate Change (UNCCC) is the centerpiece of global efforts to combat global warming. Adopted in 1992 at the Rio Summit, the Convention aims to stabilize greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system. The U.S. ratified the Convention in 1992 along with 153 other nations. More information is available at http://unfccc.int/

The Ramsar Convention on Wetlands (Ramsar) signed in Ramsar, Iran, in 1971, is an intergovernmental treaty that provides a framework for national action and international cooperation for the conservation and wise use of wetlands and their resources. The United States is one of 138 Parties to the Convention. More information is available at http://www.ramsar.org

The United Nations Convention on Biological Diversity (CBD) was launched in 1992 at the United Nations Conference on Environment and Development (the Rio Summit). The three main goals of the Convention are: the conservation of biodiversity, sustainable use of the components of biodiversity, and sharing the benefits arising from the commercial and other use of genetic resources in a fair and equitable way. The Convention is legally binding, and countries that join it are obliged to implement its provisions, such as reporting on what has been done to implement the accord and effectiveness of these activities. The United States signed the treaty in 1993 but has not yet ratified the Convention. Almost all USAID-assisted countries have ratified it. USAID works to help countries implement their National Action Plans. More information is available at http://www.biodiv.org.

fora, and engages in inter-agency discussions that form U.S. positions for international negotiations. USAID helps U.S. government agencies understand the implications of U.S. positions in the developing world.

The Agency participates in national and international working groups that inform the national and international conventions, and conservation related processes. For instance, the Agency actively engages in the International Coral Reef Initiative, a partnership among governments, international organizations, and NGOs that aims to reduce the degradation of coral reef ecosystems. As part of the initiative's Coordination and Planning Committee, USAID advances coral reef-related policies in international fora. The Agency and the U.S. State Department serve as co-chairs of the International Working Group and leaders on the U.S. Coral Reef Task Force. USAID's activities support the international charge of the Executive Order to assess the U.S. role in the international trade of coral reef species, develop strategies for mitigating the negative impacts of trade, develop and implement activities for the protection and sustainable use of coral reef resources worldwide, and implement the International Coral Reef Initiative's Framework for Action through expanded cooperation with the initiative's partners. In addition, the International Working Group of the Task Force presents opportunities to coordinate U.S. government policies and programs that promote coral reef conservation and best management practices.

USAID is a member of the National Invasive Species Council, an inter-departmental council of eleven federal

agencies that provides national leadership on invasive species and helps coordinate and ensure complementary and effective federal activities against the proliferation of invasive species.<sup>7</sup> A number of USAID missions are engaged in invasive species detection, elimination, and mitigation activities. Through a series of country studies and coordination conferences in Africa, South and Southeast Asia, and the Pacific, USAID supported efforts to help nations manage invasive species.

The Agency supports activities and programs that contribute to raising awareness of specific biodiversity concerns in international fora. For instance, USAID support to the Lake Basin Management Initiative and LakeNet served to raise awareness of the importance of lakes, their freshwater resources, and biodiversity at the World Water Forum in FY 2003.<sup>8</sup> Also in FY 2003, USAID supported the participation of



USAID participation in the Ramsar Convention on Wetlands supports the conservation of wetlands such as Cuero Salado Wildlife Refuge in Honduras.

developing country delegates at the 5th IUCN World Parks Congress on Protected Areas that convened in Durban, South Africa. Organized every ten years by IUCN, the Congress assesses the state of protected areas and define the agenda for protected areas for the next decade. The 2003 Congress, entitled "Benefits beyond Boundaries" addressed gaps within the protected area systems by identifying under-represented ecosystems, defining tools to improve management effectiveness, seeking new legal arrangements, promoting sustainable finance for conservation, and identifying partnerships. A main contribution of the 2003 Congress was its message to the Convention on Biological Diversity, providing recommendations for future actions to achieve the Convention's objectives. Of the Congress' many recommendations and calls for action, a significant number related to indigenous peoples, community-conserved areas, local governance issues, conservation finance, poverty concerns, and the spiritual and cultural values of protected areas.<sup>9</sup>

Finally, the Agency has a legal mandate under Title XIII (International Financial Institutions Act) to analyze the environmental impacts of multilateral development bank proposals. Multilateral development bank project loans and policy prescriptions in developing countries are intended to reduce poverty and encourage economic development. However, large-scale projects such as the development of roads, irrigation facilities, hydroelectric

<sup>b</sup>eter Hearne, USAID/Honduras

<sup>&</sup>lt;sup>7</sup> Additional information on the National Invasive Species Council and its work is available at http://www.invasivespecies.org.

<sup>&</sup>lt;sup>8</sup> Information about the World Water Forum is available at http://www.world.water-forum3.com

<sup>&</sup>lt;sup>9</sup> Additional information about the World Parks Congress is available at http://www.iucn.org/themes/wcpa/wpc2003/index.htm

dams, and oil and gas projects often have major negative environmental and social consequences. USAID supported reviews address the adverse impacts on the environment, natural resources, public health and indigenous peoples, and provide recommendations to eliminate or mitigate adverse impacts.

In cases where USAID has concerns about the biodiversity impact of an activity such as Peru's Camisea natural gas project, the Agency works closely with the Treasury Department and other U.S. Government agencies to engage both multilateral development bank staff and project sponsors to remedy deficiencies prior to their approval.

Through its collaboration with host country governments, participation in international fora and work with the multilateral development banks, USAID aims to create a policy environment supportive of biodiversity conservation and improved natural resources management.



USAID's efforts to prevent habitat loss help conserve both flora and fauna.

# PARTNERSHIPS FOR CONSERVATION: THE GLOBAL DEVELOPMENT ALLIANCE

#### Partnerships for Conservation: the Global Development Alliance

The private sector is an increasingly important part of resource flows to the developing world. In the 1970s, 30 percent of resources from the United States to the developing world were from private sources and 70 percent came from official development assistance. Today, 80 percent of resource flows from the United States to the developing world are private and 20 percent are public. The Global Development Alliance (GDA) is a mechanism that seeks to expand the impact of foreign assistance by mobilizing the resources of the public sector with those of the private sector and NGOs through public-private alliances.

Significant opportunities exist for conservationists, industry, and local governments to jointly plan future development in a manner that is beneficial to all stakeholders and the environment. USAID has been able to interact constructively with industrial and agricultural partners on biodiversity issues. In FY 2003, more than 15 biodiversity-relevant alliances were funded by the Agency. USAID support to these alliances totaled approximately \$22.3 million. Non-USAID partners, including private businesses, added more than \$100 million to these alliances. A partial list of alliances is provided in Table 2, and three are described below. Examples from the Asia and the Near East Bureau, Bulgaria, Brazil, the Central American Regional program, Guinea, Madagascar, Malawi, Nepal, and Tanzania are provided in their respective region's descriptions in this report as well.

In Indonesia, the Illegal Logging Alliance combats illegal logging and promotes the sustainable harvest of forests. USAID's Indonesia mission, the Asia and the Near East Bureau, and retailers such as The Home Depot, IKEA, and Carrefour formed this alliance with the Government of Indonesia and local and international NGOs. Coordinated by The Nature Conservancy and World Wildlife Fund-Indonesia, the alliance aims to increase the supply of Indonesian wood products from well managed forests, demonstrate practical ways to differentiate legal and illegal supplies of wood, strengthen market signals to combat illegal logging, and reduce access to financing and investment funds for companies engaged in destructive or illegal logging. The alliance has obtained commitments from the Government of Indonesia, concessionaires, and pulp and paper companies to halt logging in areas of high biodiversity. These areas include Tesso Nilo on Sumatra, which is known to have the highest level of plant biodiversity in the world, and East Kalimantan, which is home to the last viable population of orangutans in that region. USAID's contribution to the alliance has been exceeded four-fold (over the life of the project) by corporate partners and the conservation community.

In Brazil, the Atlantic Forest Alliance contributes to the conservation and restoration of biodiversity in the Brazilian Atlantic forest region. USAID has partnered with the Instituto BioAtlantica, an alliance of Conservation International, Aracruz Cellulose, DuPont Brasil, Petrobras, and Veracel, to promote conservation measures taken by private firms on their large land holdings. Efforts include the establishment of plant nurseries, reforestation of native tree species, and linking official protected areas with forest reserves on private lands. In addition, the alliance will develop and test a protected area system for privately held lands, potentially protecting and restoring 80,000 or more hectares of private lands in the Central Atlantic Forest corridor. The alliance will ensure that critical ecosystem services continue to be provided to local communities and land holders. The Brazilian pulp and paper industry will provide five times the Agency's contributions to the alliance over the life of the project.

In Central Africa, the Conservation in the Congo Basin program seeks to promote community-based conservation tailored to the unique ecological and socio-political characteristics of forest dependent communities in the Congo Basin. USAID has partnered with the Jane Goodall Institute and will bring together Congo Basin African governments, local communities, bilateral and multilateral donor agencies, the private sector, international foundations and other conservation NGOs. The program will identify pilot locations in Central Africa having exceptional primate habitat, beginning with the Democratic Republic of Congo and develop community-based conservation programs to promote health, education, economic growth, improved management of natural resources and wildlife conservation. Funding for the program has been secured from USAID's Bureau for Global Health and the Global Development Alliance. Additional funding is being sought from the private industry and conservation NGOs, as well as other foundations.

#### USAID **Non-USAID** Program Country **USAID Source** Amount Leverage Marine Aquarium Trade Program The Philippines GDA Sec. 821,000 815,000 Ecomadera: Marketing for Comm. Forestry Ecuador GDA Sec. 125,000 225,330 Rainforest Alliance for Sust. Econ. Growth Mexico, C. Am., Colombia GDA Sec./CAR 7,500,000 70,000,000 Community Forestry Support Program Cambodia, India GDA Sec. 500,000 430,000 100,000 Imp. Cap. for Forestry Best Practice Mgmt Bolivia GDA Sec. 133,000 Conserving Brazil's Atlantic Forest Region Brazil GDA Sec. 100,000 141,891 Congo Basin Conservation in the Congo Basin GDA Sec./GH 1,300,000 6,900,000 Training Center for Amazonian Forest Mgmt Brazil Brazil/EGAT 75,000 1,062,668 Ecotourism Alliance (SENCE) Sri Lanka ANE 900,000 1,980,000 Community Forest Alliance for Cambodia Cambodia ANE 1,200,000 2,400,000 Madagascar Biodiversity Trust Fund Madagascar Madagascar 2,000,000 2,300,000 Inst. Strength. & Cons. in Tarangire-Manyara Tanzania Tanzania 1,450,000 2,410,000 Simandou Conservation Alliance Guinea Guinea 920,000 920,000 Combating Illegal Logging in Indonesia Indonesia ANE 3,000,000 6,185,000 Lesser Known Species Program Peru/LAC 550,000 550,000 Peru Peru Cordillera Azul National Park 5,250,000 Peru 5,628,752 Total \$22,291,000 \$102,851,641

 Table 2: Public-Private Alliances for Biodiversity Conservation FY 2003\*

\* Since the alliances are dynamic entities, these numbers are regularly updated and will change as additional data become available. Non-USAID leverages provided in this table represent FY 2003 obligations only, and may in some cases be only portions of the total contributions over the life of the project.

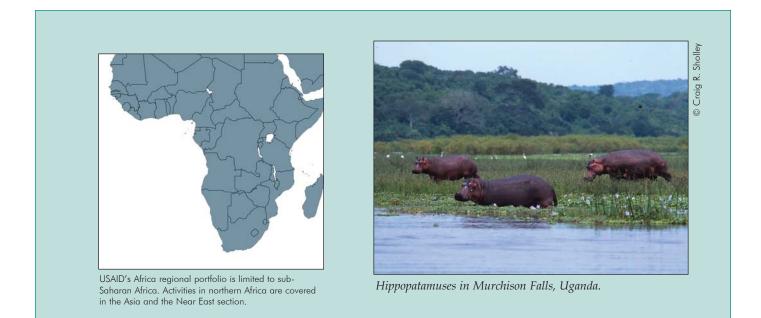
# **A**FRICA

The African continent is home to the world's largest concentration of large animals, the world's second largest tropical rainforest, and important desert, wetlands, and coral reef ecosystems. These diverse habitats support an impressive array of flora and fauna, including more than 50,000 known plant species, 1,000 mammal species, and 1,500 bird species. The richness and diversity of ecosystems is central to the livelihoods of rural Africans, an estimated 70 percent of whom depend on natural resources for their livelihoods.

In recognition of the important role of natural resources and biodiversity in Africa, USAID supported biodiversity conservation activities in more than 25 countries across the continent, with more than \$42 million in funding in FY 2003.

The region received an impressive increase in funding in FY 2003 due to the launching of the Congo Basin Forest Partnership (CBFP), a collaboration of 29 governmental and international organizations, announced by Secretary of State, Colin Powell at the World Summit on Sustainable Development in Johannesburg, South Africa in 2002. USAID contributed \$15 million to the partnership through the Agency's Central African Regional Program for the Environment (CARPE). Program activities aim to improve the management of the region's forests and protected areas, and develop sustainable livelihoods for the 60 million people who live in the Basin.

In addition, with support from USAID, several countries in the region, notably Namibia and Madagascar, implemented innovative community-based approaches to improve the management of natural resources and conserve biodiversity.



### Central African Regional Program for the Environment/Congo Basin Forest Partnership

FY 2003 Obligation: \$15.450 million (DA and ESF)

One of the least developed regions of the world, the Congo Basin holds massive expanses of closed canopy tropical forest, second in area only to the Amazon Basin. However, unsustainable timber exploitation, shifting cultivation, urban expansion, decades of conflict, and other human pressures pose increasing threats to this globally-significant forest resource. At the present annual rate of deforestation, these forests could be decimated in the next 50 years, posing a serious risk of loss of biodiversity. CARPE, a long-term USAID initiative, addresses the issues of biodiversity loss and deforestation in Central Africa.

CARPE works in nine central African countries: Burundi, Cameroon, Central African Republic, Democratic Republic of the Congo, Equatorial Guinea, Gabon, Republic of Congo, Rwanda, and São Tomé e Principé. The program is implemented by a team of U.S.-based NGOs and U.S. government agencies working in collaboration with the region's governments and local NGOs.



The Congo Basin holds massive expanses of closed canopy tropical forest.

CARPE was significantly enhanced and expanded in FY 2003 as a result of CBFP, from \$3 million annually to \$15 million in FY 2003. Also in FY 2003, CARPE's management moved from Washington to Kinshasa, Democratic Republic of the Congo. This move allowed CARPE to shift from a focus on research toward greater activity implementation. Partner activities focus on protected area management, large-scale landscape management, promoting economic development and alleviating poverty, and improving natural resources governance. CARPE serves as the primary mechanism through which the U.S. Government contributes to the CBFP. CARPE/CBFP activities focus on 11 key landscapes in the Congo Basin. In FY 2003, CARPE/CBFP partners identified NGOs to serve in a leadership role for each of the 11 landscapes. The lead NGOs consulted with partners, host-country officials, and local organizations to determine the initial activities to be undertaken in the landscapes.

The development of the CARPE/CBFP partnerships in the 11 landscapes has permitted CARPE, through its partners, to program resources and activities to bonobo (pygmy chimpanzees) conservation. This primate was previously outside the CARPE geographic range of intervention. With this expansion, all of the megafauna in the Congo Basin will be under the scope of CARPE conservation activities.

Partners are working in close collaboration to significantly expand their conservation programs in the 11 key Congo Basin forest landscapes. In addition, they have committed to providing matching funds from private sources to enhance and complement activities funded through the U.S. Government's contribution. Other donors will provide significant additional contributions through the framework of the CBFP.

CARPE/CBFP focused on developing a solid partnership structure among a network of partners in FY 2003 and held a workshop to facilitate this process. Many of the actors working in the region have been established for years and have historically focused on their own specialized programs. The workshop was a first step toward creating partnerships and fostering intense collaboration and coordination in the region.

Partners include: African Wildlife Foundation, Conservation International, Wildlife Conservation Society, World Wildlife Fund, World Resources Institute, National Aeronautics and Space Administration, Peace Corps, Smithsonian Institution, U.S. Department of Agriculture/Forest Service, U.S. Department of State, U.S. Fish and Wildlife Service, University of Maryland, and IUCN.

### Africa Regional Programs

#### **AFR/Office of Sustainable Development**

FY 2003 Obligation: \$1.375 million<sup>10</sup> (DA)

USAID Africa Bureau's Office of Sustainable Development (AFR/SD) works to strengthen critical links between biodiversity conservation, natural resources management, improved livelihoods and economic growth, and good governance throughout Africa. Assistance provided to missions helps governments devolve authority,

increase natural resources-based incomes, and reduce environmental degradation. With a focus on community-based natural resources management, forest management, global climate change, and environmental information management, activities are implemented through collaboration with local communities, NGOs, and governments. Since FY 2003, management of the AFR/SD natural resource programs has been transferred to the Land Resources Management Team in the EGAT Bureau, with the exception of the CARPE/CBFP project which is managed by USAID/Kinshasa. The Land Resources Management Team manages the Rights and Responsibilities cooperative agreement, innovative technologies program, and the FRAME project that contribute to biodiversity conservation. These programs are described under the Land Team program description.



A woman in Guinea conducts a civic education workshop. USAID support to civil society strengthening contributes to better land and resource management.

#### Africa Regional Program — Regional Center for Southern Africa

FY 2003 Obligation: \$0.678 million (DA)

The Regional Center for Southern Africa (RCSA) supports efforts to increase regional cooperation in the management of shared natural resources in southern Africa. The center has helped establish three transboundary natural resources management areas in the region. These include: the Great Limpopo Transboundary Natural Resources Management Area in South Africa, Mozambique, and Zimbabwe; Four Corners in Botswana, Namibia, Zambia, and Zimbabwe; and ZIMOZA in Zimbabwe, Mozambique, and Zambia. In addition, the program supported limited interventions in the Niassa-Selous reserve in Mozambique and Tanzania, and the Okavango River Basin in Angola, Namibia, and Botswana.

Twenty-two regional partners are working together to provide transboundary natural resources management services in the region, including governments, NGOs, and academic institutions. USAID played a critical role in engaging these institutions and maintaining their partnerships. Progress in FY 2003 was limited because all three transboundary areas include Zimbabwe as a collaborating country, and RCSA had suspended direct activities with the Government of Zimbabwe.

<sup>&</sup>lt;sup>10</sup> This figure includes funding for the Rights and Responsibilities cooperative agreement, the innovative technologies program, and the FRAME project management by EGAT's Land Resources Management Team.

Despite this obstacle, important progress was realized in FY 2003, increasing the cooperation in managing shared resources in the three main transboundary areas. Public and private entities are working together, and stronger operation linkages exist among the natural resources management authorities. In the Four Corners, for example, Zambia Wildlife Authority, Kafue National Park, and the Siachitema Community signed lease rights formalizing the first public-community partnership. Under the lease, the community has been allowed to construct a campsite in Kafue National Park. In Botswana, Jakotsha Community Trust and a private-sector partner signed a deal to establish Jedibe Lodge in Ngamiland, valued at more than \$1 million. In addition, the African Wildlife Foundation and the Regional Tourism Organization for Southern Africa signed a memorandum of understanding to promote the international marketing of community-based enterprises and promote Four Corners as a single tourist destination.

In the Great Limpopo area, small grants have been vital in allowing communities to develop viable communitybased businesses. Eleven community groups received assistance resulting in four operational enterprises, including two lodges, a tented camp, and a crafts center. For example, with the support of a small grant, the Makuleke community constructed a community lodge and entered into a community-private partnership with Wilderness Safaris valued at more than \$6 million. In addition, the community Waste Craft Group, a group that produces and markets ornaments sculpted from recycled materials, received funds to construct and operate a crafts center near a gate to Kruger National Park.

Other accomplishments in 2003 included the completion of the Chobe Enclave Land Use Management Plan for the corridor between Chobe National Park and Cabrivi in the Four Corners region. In ZIMOZA, the program

spearheaded work in natural resources-based enterprises, exploring the possibility of enterprises such as crocodile farming, fishing, and bee-keeping. In Great Limpopo, the program helped draft co-management plans for the Banhine and Zinave national parks in Mozambique, helped Mozambique develop a national policy on people living in protected areas, and helped develop and test guidelines for the implementation of the community-based natural resources management policy in South Africa.

Partners include: Development Alternative Inc., African Wildlife Foundation, Natural Heritage Institute, IUCN, and Flora and Fauna International.



Zebra mother and foal in southern Africa.

#### **Mountain Gorilla Habitat Conservation**

FY 2003 Obligation: \$1.50 million (DA)

The gorilla, listed on the IUCN's Red List of Threatened Species, is a resource of global, national, and local significance. Since 2001, USAID has responded to the urgent needs of gorilla conservation in Africa through a \$1.5 million per year Congressional directive. Supporting conservation efforts in the hill country at the headwaters of the Cross River in Nigeria and Cameroon, Kahuzi Beiga National Park and the Itombwe Massif in eastern Democratic Republic of the Congo, and the afromontane region of the Virunga Volcanoes straddling the borders of the Democratic Republic of the Congo, Rwanda, and Uganda, USAID has contributed to the conservation of the most endangered populations of gorillas.

In FY 2003, USAID gorilla conservation funding supported activities in five focal areas: transboundary collaboration, protection and anti-poaching, habitat conservation, community participation, and the development of economic alternatives.

Transboundary programs in the Virunga Volcanoes strengthened regional communication, formalized transboundary management approaches, expanded gorilla monitoring, and encouraged sharing and using information for forest protection and management. Partners reported that efforts in FY 2003 resulted in a demonstrated increase in political will to support conservation and environmental activities in the Virunga region.

In eastern Democratic Republic of the Congo, prolonged insecurity and political turmoil have made it difficult to regularly monitor the eastern lowland gorilla range. The FY 2003 funding supported survey teams who entered the region to record threats to the gorillas and other wildlife. The principal threats discovered included hunting, mining, presence of militias, burning of forest habitat, the proliferation of bushmeat markets, and illegal activities of park guards. Initial results from the surveys indicated that hunting and mining were widespread. Because of the international decline in the price of the mineral coltan, a number of mining sites are being converted to agriculture. Although permanent presence by managers and NGOs in the area is not yet possible because of the security situation, the updated field information provided by these surveys is essential to developing a flexible strategy that can respond to both threats and opportunities.

In the Cross River region of Cameroon and Nigeria, partners established an abundance estimate and distribution of cross-river gorillas that populate the highly fragmented forests of this region. Additional accomplishments in this area include the bolstering of an educational campaign on gorilla conservation for local villages and schools as well as establishing an internship program with a national university to allow African students the opportunity to participate in gorilla conservation field programs.

Two years of USAID gorilla conservation funding has contributed to the successful establishment — and in FY 2003 official government recognition — of the Tayna Gorilla Reserve in eastern Democratic Republic of the Congo. Tayna, now officially a private nature reserve managed by local communities, has quickly become a model system in the region for successful community-based conservation. Success of programs like the Tayna Gorilla Reserve rests in large part on the fact that the people living in and around the reserves are the primary stakeholders, whose lives are tangibly improved through the community health, economic, and education components of the conservation program. Given that substantial numbers of Eastern Lowland gorillas live outside national parks or other government protected areas in the Democratic Republic of the Congo, community-based reserves are of vital significance to the long-term protection and survival of some gorilla populations.

Partners include: The Dian Fossey Gorilla Fund International, International Gorilla Conservation Program, and Wildlife Conservation Society.

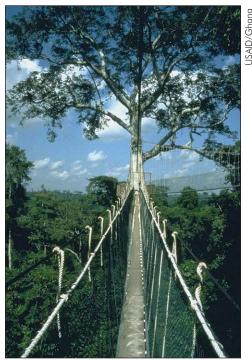
# **Africa Country Programs**

#### Ghana: Community-Based Ecotourism Project

FY 2003 Obligation: \$0.50 million (DA)

USAID supports biodiversity conservation in Ghana by promoting community-based ecotourism activities in environmentally sensitive rural destinations throughout the country. The activities create opportunities for rural communities to earn income and provide tourism jobs through the conservation of ecosystems and avoidance of unsustainable extractive exploitation. Since the project's inception in 1995, the project has developed 14 community-based ecotourism destinations. Communities have established community management teams at each site to ensure that developments are considerate of local cultures, beliefs, and needs. An ecotourism development advisor has also been assigned to each site to work with the community management teams. The teams and advisors conducted participatory ecotourism assessments and developed ecotourism plans.

The project has focused on improving basic ecotourism facilities and technical support at each site, actively marketing the ecotourism destinations, and improving training on ecotourism and affiliated services within the institutional organizations. Interpretive visitor centers and signs, nature trails, toilet facilities, and safety equipment are being developed, installed, or upgraded at each of the 14 sites to improve basic services. Ecotourism brochures and a Ghana Ecotourism Web site are being developed, tour operators are being encouraged to promote the sites, and research institutions are being encouraged to use the sites to market the destinations. Community management teams are being



A 333-meter long canopy walkway, suspended 27 m above ground in Kakum Nationak Park, is featured in the Ghana Ecotourism Web site.

trained in tourists' needs and expectations, and in bookkeeping skills, and local interpretative guides are provided with instructions in conducting nature walks to improve the local capacity to support these activities. Partners include: The Nature Conservation and Research Center.

#### Guinea: Increased Use of Sustainable Natural Resources Management Practices

FY 2003 Obligation: \$3.0 million (DA)

Guinea is home to an estimated 40 percent of the world's total remaining population of Pan troglodytes verus, one of the most endangered chimpanzee species in the world.

To conserve this endangered species and Guinea's other important natural resources, USAID helps small landholders adopt more profitable and less destructive natural resources management and agricultural practices. The program works toward improving the natural resources management capacity of community-based organizations and establishing a policy environment that empowers local populations to manage local resources and promote long-term investments in conserving Guinea's natural resources base. With support from USAID, the Government of Guinea adopted a co-management approach that allows local populations to share the responsibility for, and the benefit of, managing national forests. Part of these co-management agreements mandate that communities protect chimpanzee habitat. This policy change has led to significant increases in protected areas, national forest sites, areas under sustainable agricultural practices, and improved chimpanzee conservation. To date, more than 92,800 hectares of forests have been placed under co-management.



Approximately 40 percent of the Western Common Chimpanzees (Pan troglodytes verus) live in Guinea.

Chimpanzee conservation activities have been fully integrated into forest co-management activities. Rather than create a boundary for wildlife protection, the project educates local villagers, including hunters, about the importance of biodiversity. Activities concentrate on increasing local capacity for wildlife monitoring, public outreach, and resolving human wildlife conflicts. An integral part of the project is the use of local hunters as data collectors.

In addition, in FY 2003, USAID/Guinea entered into discussions to form a public-private partnership with Conservation International and a mining company, Rio Tinto. The partnership would extend this co-management approach to the forested region of eastern Guinea. Partners

agreed to basic objectives and intervention zones. It is expected that activities will result in more than 20,000 additional hectares of classified and community forests managed by 2006.

Partners include: Winrock International, Conservation International, and Rio Tinto.

#### Kenya: Improved Natural Resources Management in Targeted Biodiverse Areas by and for Stakeholders

FY 2003 Obligation: \$1.50 million (DA)

In Kenya, conservation focuses on areas within and adjacent to strategic national parks and reserves. USAID's program supports efforts that lessen, reverse, or halt the unsustainable use of the natural resources base through an integrated approach addressing the economic, policy, cultural, and human resource capacity challenges of conservation.

The program focuses on influencing community behavior change by promoting favorable incentives to improve natural resources management. Activities include: land improvement programs such as agroforestry, watershed, and range improvement activities; the promotion and development of nature-based businesses; building a constituency for conservation among Kenyan citizens; and supporting the management of protected areas.

In FY 2003, USAID made essential contributions to improve natural resources management in Kenya. Communities set aside 65,655 hectares of land across Kenya as wildlife habitat and buffer zones, and implement-

ed site specific land improvement activities. In the same time period, 5,195 individuals benefited from income, training, and employment from conservation enterprises, a total of \$159,584 was generated and 155 jobs were created. Under the organizational development support for community-based organizations, the median organizational capacity index for groups that received support increased from 2.4 to 3.0. This increase indicates that community-based organizations moved from being nascent to emergent organizations, that will soon possess improved capacity to run nature-based businesses.

In addition to terrestrial activities, USAID also supported the implementation of Integrated Coastal Area Management practices at Jomo Kenyatta Public Beach. Activities contributed useful lessons for the management of marine resources and marine policy dialogue and served as a model whose lessons were incorporated at



*East Africa is renowned for its vast array of birds. Above, a saddle-billed stork seeks a meal along the edge of marshland in Kenya.* 

four new sites along the coast. The application of integrated water resource management tools resulted in the building of 25 rain water harvesting demonstration tanks.

Partners include: Coast Development Authority, Kenya Wildlife Service, African Wildlife Foundation, and Pact Inc.

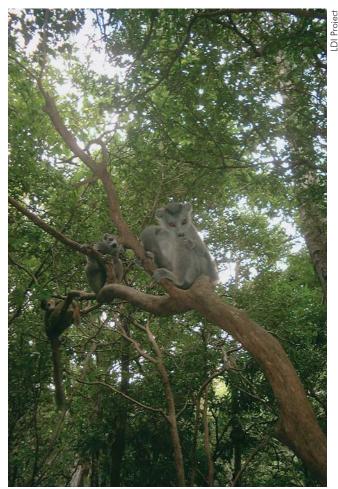
#### Madagascar: Biologically Diverse Ecosystems Conserved in Priority Conservation Zones

#### FY 2003 Obligation: \$7.916 million (DA)

With more than 300 endemic species, Madagascar numbers among the top three global "biodiversity hotspots." During the past decade, USAID's investments in rural areas designed to conserve biodiversity, improve management of forests and other natural resources, and reduce poverty have begun to yield impressive results.

USAID contributed to increasing the national park system from 1.1 million hectares in 1996 to almost 1.8 million hectares in 2003. The program's primary objective is to assure that 100 percent of the country's biodiversity is represented in Madagascar's national park system. In FY 2003, President Marc Ravalomanana announced a pledge at the World Parks Congress to increase Madagascar's protected area network to six million hectares during the next five years. This impressive commitment will result in the inclusion of 100 percent of the country's biodiversity within the National Park system.

USAID support helped develop five conservation management plans for the National Park Service. These plans outline the conservation vision for each park and provide guides for all activities. The Malagasy Park Service, with USAID assistance, is now developing business plans for priority parks, which provide thorough financial analysis for protected areas and a sound management tool for deciding on management interventions and marketing needs.



One hundred percent of Magadagascar's ecosystems, including these endemic lemurs, will be represented in the national park system.

USAID has been a primary donor to the biodiversity component of Madagascar's National Environmental Action Plan since 1990. The Agency played a leadership role in designing the current phase of the action plan, resulting in the development of an overarching environment policy statement, a new institutional framework, and a monitoring and evaluation system based on agreed upon results and indicators. This has encouraged a wider range of participation by donors, national associations, local communities, and the private sector.

"We can no longer afford to sit back and watch our forests go up in flames...This is not just Madagascar's biodiversity; it is the world's biodiversity. We have the political will to stop this degradation."

— Marc Ravalomanana, President of Madagascar at the World Park's Congress, 2003

USAID is addressing the conflict between mining and forest management. In FY 2003, approximately 4,600 mining exploration lots, each representing 2.5 square kilometers, were identified inside of declared forest zones. To date, mining permits have not been issued for these lots, and USAID is advising the government of Madagascar on managing this issue. Significant progress

has been made in promoting collaboration between the mining and forest sector authorities, resulting in more transparent allocation of forestry and mining permits for these environmentally sensitive zones.

USAID supported the publication of Regional State of the Environment reports for Fianarantsoa, Toamasina, Tulear, and Mahajanga provinces, and the Anosy region. These compilations have proven to be effective knowledge management tools for national, provincial, and regional decision makers in identifying conservation priorities and defining developmental parameters for sector planning.

Partners include: Pact Inc, World Wildlife Fund, Conservation International, Chemonics International, Peace Corps, and Cornell University, and Rio Tinto.

#### Malawi: Sustainable Increases in Rural Incomes

FY 2003 Obligation: \$1.62 million (DA)

USAID is helping conserve Malawi's biodiversity through programs focused on improved policy development and community-based natural resources management.

USAID's assistance to the Government of Malawi has helped achieve a sound enabling environment for community-based natural resources management. In FY 2003, USAID facilitated the signing of three co-management agreements between the Department of National Parks and Wildlife and communities living around the Liwonde National Park, Lake Malawi National Park, and Mwabvi Game Reserve.

In addition, USAID promoted improved natural resources management and nature-based enterprise development activities in areas adjacent to national parks including Liwonde National Park, Lengwe National Park, Nyika National Park, and Vwaza Game Reserve. In FY 2003, with USAID assistance, the number of communities adopting community-based natural resources management practices in target districts grew to 600, representing a 31 percent increase from last year. Communities adopted practices and sustainable income generating activities, such as wildlife management, natural forest management, beekeeping, fish farming, and herbal production. The net benefits to communities from improved natural resources management activities reached \$156,930.

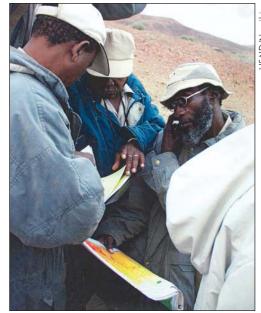
With USAID support in FY 2003, the Malawi Environment Endowment Trust provided 45 small grants to communities and NGOs to promote wildlife and natural resource based enterprises, eco-tourism, reforestation, capacity building, soil and water conservation, and environmental health activities. Up to 46 percent of the beneficiaries of these grants were women.

Partners include: Development Alternatives Inc. and Malawi Environmental Endowment Trust.

#### Namibia: Increased Benefits Received by Historically Disadvantaged Namibians from Sustainable Local Management of Natural Resources

FY 2003 Obligation: \$1.837 million (DA)

USAID supports a community-based natural resources management program that is helping communities throughout Namibia increase their involvement in the management of wildlife resources. With assistance from USAID and partners, communities are registering as conservancies, localized natural resources management institutions. Namibian legislation gives conservancies conditional use rights over wildlife and other natural resources and the right to retain the income from sustainable use of these resources. The establishment of conservancies has increased local responsibility and ownership over wildlife, allowed members to benefit financially from wildlife management, and has served as a base for politically active civil society.



In Namibia, Torra Conservancy Community Game Guards fill in data sheets for wildlife sightings as part of the conservancy's wildlife monitoring program.

The program introduces economic incentives that are supported by sound social, democratic, and environmental principles through effective natural resources management.

The program has contributed to a number of biodiversity impacts. These include conservancies setting aside land and habitat for wildlife and tourism, increases in the range of some key species such as elephant, increases in wildlife numbers including elephant and black rhino, and the maintenance of broad-leafed woodland savanna in north-eastern Namibia. Two conservancies in the north-east have also formed forest management committees.

In addition to biodiversity impacts, the program has contributed to improving local livelihoods. In FY 2003, 14 communities were registered, bringing the total number of registered conservancies in Namibia to 29. In addition, close to 40 more are currently organizing. More than 7 million hectares of communal land have been placed under local conservancy management, with more than 95,000 individuals receiving financial and other benefits. Activities in the conservancy areas have generated \$1.7 million in new income from contracts with tourism operators; enterprises such as campsites, craft sales, and thatching grass; and employment at tourist lodges. This income is expected to increase substantially when conservancies diversify their resource management activities and develop new products.

Partners include: World Wildlife Fund, World Learning, Management Systems International, and Namibian Ministry of Environment and Tourism.

#### Senegal: Agriculture and Natural Resources Management

FY 2003 Obligation: \$1.50 million (DA)

"Wula Nafaa," a local expression meaning "the richness that comes from the bush," is the name of USAID's natural resources management program in Senegal. The newly launched program contributes to biodiversity conservation, poverty reduction, and sustainable local development by applying both a private-sector approach to natural resources management with support for improved local governance.

In FY 2003, the program supported an in-depth evaluation of hunting concessions in Senegal and methods used by the government to control hunting. The study will support the national dialogue on how to better manage Senegal's wildlife resources in the concession areas, including waterfowl and wild pigs. Senegal's protected areas contain small numbers of large game such as lion, eland, and buffalo.

The governance component focused on empowering local producer groups and rural communities, clarifying their rights and responsibilities, and enhancing their role in decentralized natural resources management. In FY 2003, the program helped establish consultative fora to discuss protected forest management issues that convinced central and local governments to develop protocols on the co-management of two forest reserves in Paniates and Ouly. The protocols have allowed for greater local input and transparency in the public management of forests. As a result of these protocols and community meetings, the forest department and local governments representing 68 villages will co-manage 54,000 hectares of forest.

Partners include: International Resources Group.

### Tanzania: Improved Conservation of Coastal Resources and Wildlife in Targeted Areas

FY 2003 Obligation: \$4.21 million (DA and ESF)

USAID provides efforts to conserve biodiversity while contributing to economic growth through ecotourism in Tanzania. USAID is supporting activities to improve protected area management in the national park network and national system of game reserves, as well as coastal and marine ecosystems. Moreover, USAID is encouraging community-based natural resources management approaches in areas adjacent to protected areas.

The Tanzania Coastal Management Partnership program promotes the sustainable use of coastal resources, including mariculture, and coastal tourism, through improved environmental policies and community-based natural resources management.

USAID's support to community-based natural resources management resulted in Tanzania incorporating Wildlife Management Areas as a key feature of its conservation policy that empowers local communities to manage and benefit directly from wildlife resources on village lands. A major milestone was the government's approval and signing into law the Wildlife Management Areas Regulations. Community-based conservation approaches in the Tarangire and Ugalla



Elephants in Tarangire National Park, Tanzania.

ecosystems have been particularly successful. In Tarangire, nine rural communities have negotiated profitable partnerships with the private sector in conservation-based economic activities. Nearly 6,000 farmers in three districts surrounding the Ugalla Game Reserve benefited from training in sunflower cultivation, improved environmentally friendly behives, fish ponds, and Moringa farming, grossing more than \$30,000 in additional income.

In addition to promoting community-based advances in wildlife and natural resources management, USAID's activities have helped strengthen the Government of Tanzania's institutions. Policy analysis, strategic planning, and natural resources management to halt degradation in and around national parks, reserves, and marine environments have all been improved with support from USAID.

Partners include: Africare, African Wildlife Foundation, Tuskegee University, University of Rhode Island/Coastal Resources Center, and World Wildlife Fund.

# Uganda: Critical Ecosystem Conserved to Sustain Biological Diversity and to Enhance Benefits to Society, and Expanded Sustainable Economic Opportunities for Rural Sector Growth FY 2003 Obligation: \$1.12 million (DA)

Uganda's lush rainforests are home to an impressive array of rare primate and bird species, including the mountain gorilla, the rarest of the great apes. USAID has supported natural resources management activities in Uganda for the past 15 years.

The Agency contributed to the conservation of biodiversity on a regional basis by supporting improved management in the protected areas, including the Virunga montane forests. These are home to more than one-half of the world's population of mountain gorillas. Accomplishments include: establishing a revenue-sharing policy through the Ugandan Wildlife Authority, which allows for 20 percent of gate fees to be contributed to local communities; developing enterprises with communities living adjacent to National Parks; establishing and refurbish-



A Ugandan kob in Queen Elizabeth National Park.

ing a visitor center at the Queen Elizabeth National Park, the first of its kind in Uganda; and supporting the development of tourism accommodation through a community initiative at Nyakalengijo-Rwenzori Mountains National Park.

USAID worked with the Uganda Wildlife Authority on a new approach to its annual operations planning. This approach introduced improved administration, budgeting, and priority setting at the protected area level. During the past two years, the program resulted in a marked increase in land placed under improved management with 19 protected area management plans now in place.

Agroforestry activities were conducted in buffer zones to provide a source of income and improved agricultural production in communities living adjacent to protected areas. The domestication of high-value medicinal woody species was supported through working with herbalist groups. Techniques and approaches for propagating the medicinal trees were identified and integrated in the farming systems. Other activities such as craft production and bee keeping were also promoted. Providing income generating activities in buffer zones is expected to reduce pressure on protected areas.

In addition, sustainable wetland management was supported through enhancing the ecological and socioeconomic knowledge about wetlands, implementing management plans, and strengthening the institutional framework for their management.

Partners include: African Wildlife Foundation, Africare, Ecotrust, IUCN, and World Agroforestry Center.

#### Zambia: Community-Based Natural Resources Management and Sustainable Agriculture Program FY 2003 Obligation: \$0.30 million (DA)

USAID's natural resources management program aims to improve livelihoods and ensure the sustainability of Zambia's biodiversity and natural resources. The program works toward these goals by supporting efforts to improve household livelihood security, policy and civil society education, and transboundary natural resources management. The program operates in three Game Management Areas – gazetted buffer zones bordering Kafue National Park in southern Zambia.

The transboundary natural resources management component capitalizes on the economic opportunities presented by ecotourism. Initiatives include promoting community goods and services in regional markets, negotiating community collaboration with ecotourism operators, and organizing exchange visits for community residents with community-based natural resources management programs in Botswana, Namibia, and Zimbabwe. In FY 2003, a community in the Sichifulo area registered Dundumwezi Camp Site with the government. This community-run ecotourism business venture will act as a catalyst for conservation as the community benefits from tourism revenue.

The policy support component promotes civil society capacity building to encourage participation in the policymaking process. Activities include analyzing policy frameworks that govern Game Management Areas, developing a coalition of civil society institutions to advocate for stronger policies, and supporting dialogue with the government. In FY 2003, the project helped register five Community Resource Boards, empowering communities to participate in decision-making processes. The benefits of this activity have extended beyond the project area as an additional 15 boards were registered and recognized by government outside the project area.

Partners include: African Wildlife Foundation, CARE, and Wildlife Conservation Society.

## ASIA AND THE NEAR EAST

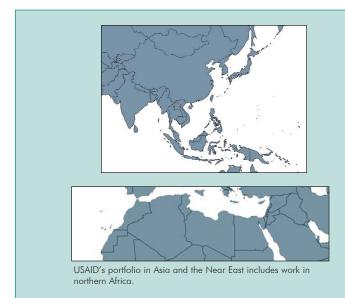
The Asia and the Near East region is perhaps the most biologically diverse region of the earth. Home to the world's highest mountain system, a vast rainforest complex, and two-thirds of the world's coral reefs, an estimated 80 percent of the world's endangered species live in the region. These diverse ecosystems not only support rich biodiversity, but also play a critical role in sustaining people's livelihoods.

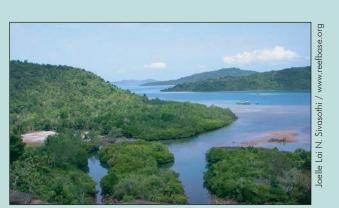
Unfortunately, the region has lost 95 percent of its forests, and countries in the region have lost 70 to 90 percent of their original wildlife habitats. Increasing pressures are being placed on natural resources due to population growth, urbanization and industrialization, and a growing demand for energy and raw materials. Inappropriate environmental policies and weak institutions have also proven to be impediments to improved environmental governance.

In recognition of the important role of natural resources and biodiversity in Asia and the Near East, USAID supported biodiversity conservation activities in more than 10 countries in the region, representing more than \$33 million in funding in FY 2003.

Indonesia supported USAID's largest country-level biodiversity conservation program, at more than \$13 million in FY 2003. While Indonesia covers less than 2 percent of the earth's land surface, it includes 10 percent of the world's flowering plant species, 12 percent of the world's mammal species, 17 percent of the world's bird species, and more than 25 percent of the world's fish species, making it a critical location for biodiversity conservation efforts.

The region also supported innovative freshwater conservation activities in Bangladesh. With USAID assistance, public wetlands were, for the first time in Bangladesh's history, turned over to communities to be managed in perpetuity through community efforts such as fish sanctuaries.





Anambas and Natuna Archipalego, Indonesia

#### **Bangladesh: Tropical Forest and Open Water Resource Management** FY 2003 Obligation: \$2.70 million (DA)

USAID's program for the environment focuses on the improved management of natural resources and biodiversity conservation to benefit communities dependent on open water and forest resources. The program's co-management model involves communities, local level representatives of government agencies, elected local government officials, and other stakeholders.

To stimulate policy support for natural resources conservation, USAID cooperated with a multi-donor review of the fisheries sector and helped pioneer the development of the National Wetlands Network. This influential association helped inform policy makers about wetland conservation issues. Through the efforts of the network, public wetlands were, for the first time in Bangladesh's history, turned over to communities to be managed in perpetuity through community efforts such as fish sanctuaries. This precedent-setting action is the first step in the establishment of a national sanctuary system.

The open water resource program activities benefited poor fishing families in three major wetland floodplains: the Hail Haor in Moulavi Bazaar District, the Turag-Bangshi riverine floodplain in Gazipur District, and Kangsha-Malijhi



With support from USAID, communities in Bangladesh were granted management rights over public wetlands.

river basin in Sherpur District. The program provided benefits to more than 500,000 people in FY 2003, as increased fish production and fish biodiversity resulted in improvements in their nutrition and income. The program helped place more than 18,000 hectares of floodplain under a management plan, and helped 66 communities establish community-managed fish sanctuaries including eight designated as permanent sanctuaries. In addition, 225 community credit groups representing more than 4,500 members were created to help members adopt alternative income generating activities due to fishing restrictions.

In addition to the water resource component, USAID supported a new project to protect Bangladesh's remaining areas of natural tropical forest and improve the management of forest resources. The project provides technical assistance and training in establishing community-based resource management systems; restoring tropical forest ecosystems; increasing stakeholder awareness of the importance of sustainable resource management; and improving public sector and local NGO resource management capacity.

In its first year, the program enjoyed a major breakthrough in facilitating the Forest Department's buy-in to the concept of co-management. The program conducted socioeconomic, biological, and physical appraisals which will be used in developing co-management plans in four protected areas: Lawachara National Park, Rema Kalenga Wildlife Sanctuary, Satcharri Forest Reserve, and Teknaf Game Reserve. In addition, the program successfully brokered the creation of a Protected Area Management Program within the Forest Department, to which the USAID activity will serve as a support project.

This new forestry activity was also instrumental in establishing a link between the terrestrial and aquatic ecosystems while building local capacity in both aquatic and tropical forest resources management.

Partners include: Winrock International and International Resources Group.

## **Asia and the Near East Regional Programs**

#### Asia and the Near East Program Development and Learning

FY 2003 Obligation: \$5.90 million (DA)

USAID's Asia and the Near East Bureau supports a regional Program Development and Learning activity to help develop and refine new strategies for country and regional programs, and conduct analyses that identify emerging development problems and opportunities in a region.

In FY 2003, the program supported USAID missions in Cambodia, Indonesia, the Philippines, and Sri Lanka in conducting analyses and targeted interventions to mitigate conflicts over forest resources. Deforestation goes well beyond the environmental destruction and biodiversity loss. Deforestation is likely to lead to scarcity of livelihood resources for forest dependent communities, leading to social conflicts. Lack of livelihood resources also allow rebels and extremist movements to attract recruits, resulting in further political and social instability. Moreover, in many countries illegal timber extraction is also financing conflicts. At present, eleven countries in the Asia and the Near East region are experiencing conflict over forest resources. In FY 2003, the Asia and the Near East Bureau used funding to implement concrete actions to monitor and reduce conflicts over forest resources in Asia that included an in-depth case study of Cambodia, and a natural resources conflict workshop in the Philippines.

The program commissioned a feasibility analysis of providing financial incentives to communities for sound environmental stewardship. Many communities in Asia manage landscapes that provide environmental services such as biodiversity protection, clean and abundant water supplies, hydroelectricity, and stocks of carbon that alleviate global warming. Despite their contribution, communities are not appropriately compensated for the provision of these benefits. An overview of work completed in the region was compiled and case studies for potential implementation were carried out in the Philippines and Nepal.

The program also supported training for USAID program managers and their host country counterparts in the implementation of environmental regulations and policies under the Foreign Assistance Act that affect forest and biodiversity conservation.

The Asia and the Near East Bureau pioneered a Mission Incentive Fund to catalyze public-private sector alliances. This fund supported three alliances promoting sound natural resources management. These include the Sri Lanka Eco-Tourism Alliance, Community Forestry Alliance for Cambodia, and the Indonesian Alliance to combat illegal logging. Additional information on these and other GDA programs is provided on pages 15 and 16 of this report.

In FY 2003, the Asia and the Near East Bureau supported two programs promoting community-based forest management, including the Community Forest Management Support Project and the Community Forestry Alliance for Cambodia. The Community Forest Management Support Project supported work on community forestry in Cambodia and India. The program aims to stabilize biodiversity and natural forest resources, and restore forest productivity by devolving management rights and responsibilities to local governments and forest-dependent people. The project supports local, national, and regional policy dialogues and builds partnerships between professionals, NGOs, and governments to inform national community forestry strategies. These activities are just beginning as the project received USAID funding at the end of FY 2003.

Designed to build the capacity of Cambodia's rural communities to manage forest lands, the Community Forestry Alliance for Cambodia will contribute to improve and implement national policies and field programs. The program will support innovative Cambodian NGOs engaged in community forestry policy development, extension and training, and field project implementation. The program will also accelerate the development of community forestry programs in the field by facilitating exchanges between policy makers, donors, NGOs, local government, and rural communities.

In addition, the Asia and the Near East Bureau supports the Sri Lanka Eco-tourism Alliance that encourages private partners to invest in Sri Lanka's first eco-lodge meeting international standards. This initiative built off of a USAID-supported public-private alliance that was active in Sri Lanka's conventional tourism industry involved several partners including Aitken Spence Hotels, Jetwing Hotels, Serendib Leisure, and John Keels Hotels, investing \$2 million and considerable in-kind support. Promoting nature-based enterprises is expected to provide incentives to improve the conservation of Sri Lanka's biodiversity while stimulating economic growth. The alliance is intended to spur private-sector investment in tourism that incorporates conservation, community development, and sustainability best practices. The project includes a 20-unit eco-lodge, forest canopy walkway, research station, and carefully managed forest reserve sited on a private tea estate bordering the Sinharaja Rain Forest, a World Heritage site. The alliance will also conserve and research a private buffer zone reserve. More than 500 nearby village families are expected to benefit from the jobs, conservation training, conservation planning, and community development initiatives associated with the project.

### Asia and the Near East Country Programs

#### Egypt: Egyptian Environmental Policy Program

FY 2003 Obligation: \$4.50 million (ESF)

Through the Egyptian Environmental Policy Program, USAID supported economic growth and biodiversity conservation in the Red Sea Governorate. The program provided technical assistance and training to protect and manage the natural and cultural assets that are essential for the growth of the tourism industry on the Red Sea.

In FY 2003, the program increased the number of moorings on the Red Sea to more than 750 and created a Red Sea mooring buoy strategy to maintain and expand the system, now the largest of its kind in the world. It also facilitated the declaration of Wadi el-Gamal National Park and developed a management plan



Wetland area in Wadi El-Gamal National Park. USAID is helping develop the park's management plan.

for the park, which covers more than 6,800 square kilometers of marine and terrestrial area in the southern zone of the Red Sea. Moreover, the program provided technical assistance to the Government of Egypt's Tourism Development Authority to create an ecologically sensitive land use plan for the southern Red Sea zone and to adopt an environmental monitoring system to mitigate the impacts of tourism development.

USAID supported a wide range of environmental education and awareness activities, including an Environmental Awards Program in the Red Sea, development of park interpretive signage, and creation and implementation of a Red Sea ranger communications strategy. Finally, a number of Red Sea hotels received Green Globe Certification, an international standard of environmental and social management systems.

The Agency initiated a new program in FY 2003, Livelihood and Income from the Environment, designed to further promote natural and cultural-based tourism in Egypt. The program aims to develop natural and cultural business enterprises and services for the Red Sea region, create jobs for local residents to enhance Red Sea Governorate visitor and resident experiences, improve provision of services to meet basic needs and improve livelihoods of local and indigenous Red Sea communities, and improve protection and sustainable use of Red Sea Governorate resources.

Partners include: Red Sea Governorate, Egyptian Environmental Affairs Agency, and Tourism Development Authority.

# Indonesia: Integrated Watershed Management and Orangutan Habitat Conservation — Natural Resources Management

FY 2003 Obligation: \$13.136 million (DA)

USAID's Natural Resources Management program is working to improve the local management of Indonesia's

forests and coastal zones. The program emphasizes conserving forests and biodiversity in national parks and other protected areas, and increasing benefits to local communities. In FY 2003, USAID supported the implementation of 73 site-specific co-management plans that placed close to 6 million hectares of coastline and forest under improved management.

In North Sulawesi, USAID supported coastal zone management activities in 25 fishing villages. Community-based management and control of coastal resources is rapidly expanding across the entire province due to the passage of a USAID-facilitated Provincial



Orangutan mother and infant.

Management Law in April 2003. The law empowers villages to develop legally enforceable management plans for their reefs and fishing areas, and provides villages with matching funds to initiate their plans. During the past two years in participating villages, fish abundance has more than doubled, and 80 percent of the coral reefs have stabilized or improved. A National Coastal Management Law based on the North Sulawesi law is scheduled for review and passage by the National Assembly in late 2003. This law will authorize all provinces in Indonesia to adopt provincial coastal management programs empowering local communities.

Bunaken National Marine Park experienced hard coral cover increases of 12 percent during the past two years. International coral experts surveying the park recorded 390 species of hard coral, including the highest withinsite coral diversity ever recorded globally. The increase in coral cover is due in part to regular joint park ranger and village patrols that have successfully eliminated the destructive practice of fish bombing and promoted safe diving and anchoring practices. The fishermen living inside the park who were skeptical of restrictions applied to fishing are now among the strongest supporters as fish catches are increasing steadily.

In addition to coastal biodiversity conservation, USAID has supported important forest conservation efforts in Indonesia. In West Kutai, a forest management plan covering 1.6 million hectares is being implemented by a new Advisory Board that involves representatives from government, NGOs, and the private sector. As part of the new management plan, the West Kutai district government stopped issuing licenses for small-scale logging, thereby preserving tens of thousands of hectares of primary forest. The preservation of this habitat represents an important accomplishment for biodiversity conservation.

Another success in FY 2003 involved conserving forest habitat in the Sungai Wain and Manggar watersheds, which provide more than 90 percent of the freshwater supply for Balikpapan City in East Kalimantan. In recognition of their importance, the Balikpapan City Government strengthened the protection of the Sungai Wain forest and reforested more than 2,000 hectares surrounding the Manggar reservoir through USAID-supported agroforestry projects. Balikpapan formed a public-private alliance with Pertamina, the national petroleum company, whose refinery depends on Sungai Wain for its processing water. Pertamina transferred funding to the city government for 24-hour patrols of the Sungai Wain forest, contributing to the eradication of illegal logging and other encroachment activities.

In addition to these activities, USAID supported the conservation of orangutan habitat in Borneo and Sumatra. Orangutan survival has been threatened by habitat destruction due to logging. In FY 2003, USAID partners completed a survey of wild orangutans in the Berau Peninsula of East Kalimantan. Survey results placed population estimates at more than 2,000 animals in the habitat area, making it the largest intact population in East Kalimantan.

With support from USAID partners, the six nearest villages to this habitat area agreed to halt orangutan hunting for bush meat and to assist in their habitat conservation. In exchange, these villagers are receiving training in intensified agricultural techniques, including high-value cocoa cultivation, to address underlying food and income security issues that were contributing to orangutan poaching and habitat destruction.

Along with engaging communities, USAID partners successfully negotiated with logging concessionaires. Concessionaires agreed to set aside large tracts of their concession for conservation and to practice low-impact logging techniques on the rest of the land. The local government has formed a multi-stakeholder orangutan con-

servation working group. In FY 2003, the working group helped reverse government plans to issue two additional timber concessions.

Partners include: World Wildlife Fund Indonesia, Conservation International, The Nature Conservancy, University of Rhode Island, Academy for Educational Development, International Centre for Research in Agroforestry, International Resources Group, Orangutan Foundation International, U.S. Department of Interior-Office of Surface Mining, and World Education.

#### **Nepal: Governance of Natural Resources, and Sustainable Forest and Agricultural Products** FY 2003 Obligation: \$0.327 million (DA)

USAID's environment program supports efforts to improve natural resource governance and promote environmentally sustainable enterprises in Nepal.

During the past two years, USAID has implemented a natural resources management governance program aimed to improve the democratic functioning and management capacity of community-based natural resources management groups. The program supports activities to strengthen the capacity of approximately 500 community forestry and buffer zone user groups, and 1,000 irrigation water user groups. These activities contribute to the conservation of biodiversity by conserving important forest habitat.

In FY 2003, forestry and buffer zone management user groups placed close to 8,000 hectares of forest under improved management. Local user groups also organized training events reaching more than 18,000 beneficiaries in the target area. Trainings focused on improved natural resources management, forest enterprise development, and improved governance of natural resource groups. Groups initiated advocacy campaigns to establish user rights and make their executive committees and local government agencies more transparent. Women hold more than 40 percent of the executive positions in the forestry user groups.

In addition to improving the governance of natural resources, USAID promotes sustainable forest enterprises in an effort to increase household income and improve food security. By helping farmers and community-based organizations produce and market high-value crops such as coffee and non-timber forest products such as wintergreen oil, the program is expected to increase incomes of the rural poor by at least 50 percent and bring the target population of 40,000 households above the poverty line by 2006. The development of sustainable natural resources-based enterprises is expected to improve livelihoods while reducing pressures on other natural resources of conservation importance.

Partners include: Winrock International, Asia Network for Sustainable Agriculture and Bioresources, Planning and Development Collaborative International, International Development Enterprise, Agro Enterprise Center, CARE, World Wildlife Fund, Resource Identification and Management Society, and Research Institution and Training in Irrigation.

#### **Philippines: Improved Environmental Governance — Environment and Energy Program** FY 2003 Obligation: \$7.04 million (DA)

USAID's natural resource programs work with the Government of the Philippines to address conflict, declining natural resource productivity, and the environmental health of the Filipino people resulting from over-exploita-

tion and poor governance of fish, forests, water, and coastal resources.

The Environmental Governance program aims to reduce illegal logging, and illegal and destructive fishing activities that are contributing to biodiversity loss. Improved management, transparency, accountability, and participation, as well as enforcement of environmental laws, help mitigate conflict over a dwindling supply of fish, forests, and coastal resources. This year, with support from USAID, 15 municipalities placed more than 3,000 hectares of coastal waters under improved management, for a total of more than 35,000 hectares by 121 municipalities throughout the life of the project. In addition, 110 communities



USAID supports increased community participation in forest and coastal resources management in the Philippines.

improved their ability to monitor and protect more than 4,000 hectares of marine sanctuaries, increasing coral cover and giving severely depleted fish stocks the opportunity to recover. The project reported that coral cover within the marine sanctuaries increased by 46 percent, more than triple the 15 percent target.

The program helped establish three coastal law enforcement councils in the province of Bohol. Training, dialogue, and coaching of councils and other enforcement groups in the region built the confidence of local maritime and fisheries law enforcers in seamanship and navigation, the use of a global positioning system, and basic investigative skills. By the end of FY 2003, the enforcement councils had filed close to 100 cases in court against dynamite fishers, sellers of fish caught through illegal means, commercial ring netters, trawls, seine net, and cyanide fishers – and reported a 95 percent success in conviction. They also facilitated the standardization of coastal resource management-related laws and fines for municipal governments and launched information campaigns in known illegal fishing hotspots. Reducing illegal fishing activities is expected to help conserve the country's coastal biodiversity.

Through a grant to the Center for International Environmental Law, USAID provides legal assistance to communities involved in natural resources management, and training to judicial system staff in administration of environmental cases in both the forest and coastal sectors.

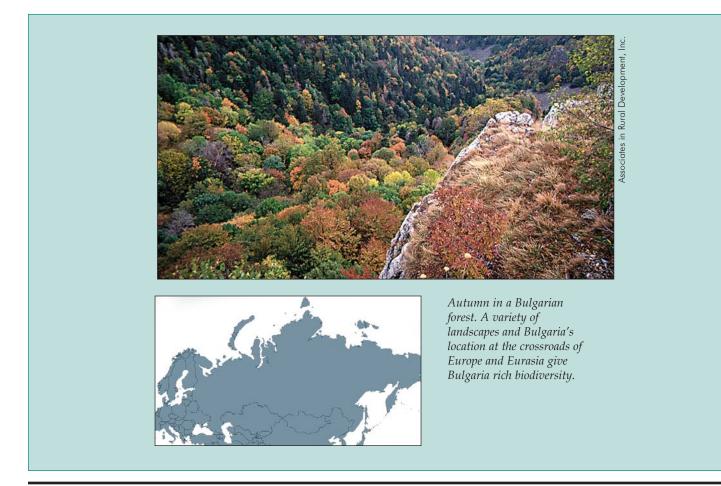
Partners include: Tetra Tech EM Inc., Development Alternatives Inc., Center for International and Environmental Law, and ACDI-VOCA.

## **EUROPE AND EURASIA**

The Europe and Eurasia region contains a wide variety of ecosystems ranging from boreal forests and tundra to Mediterranean forests and shrubland. The region is home to one quarter of the world's forests, supports the world's largest population of bear and rare tigers, and serves as cross roads for large populations of migratory bird species shared with Africa, Asia, and North America.

Unfortunately, the region has been significantly modified by human activities that include deforestation, agriculture, drainage of wetlands, modifications to coastlines and river courses, mining, road construction, and urban development. As a result, natural habitats have been reduced in size and fragmented, and are less able to support biodiversity.

Since 1989, USAID has worked with national and local governments and NGOs to improve biodiversity conservation in Europe and Eurasia. In FY 2003, USAID provided nearly \$610,000 to support biodiversity conservation efforts in the region. The region's major biodiversity conservation activity, Bulgaria's Biodiversity Conservation and Economic Growth project, provided technical and financial support for the implementation of Bulgaria's first national park management plans.



### **Europe and Eurasia Country Programs**

#### Bosnia and Herzegovina: Mountain Conservation Program

FY 2003 Obligation: \$0.010 million (AEEB)

Although devastated by war, Bosnia and Herzegovina have beautiful natural treasures, including impressive mountains with jagged peaks and remnant forests of evergreen oak, ash, elm, alder, and endemic pine. Unfortunately, only one half of one percent of the total area of the country is protected.

In FY 2003, USAID supported the Sarajevo Scouts Union's efforts to protect the mountains of Igman and Bjelasnica, best known as the site of the 1984 Winter Olympics. The Scouts Union researched illegal logging and other destructive activities in the region. They discovered evidence of logging companies' clear cutting without replacing trees, ineffective forest management, and illegal building in the area. The Scouts publicized the need to conserve the mountains through a media campaign that enjoyed coverage on all the major radio and television stations and newspapers. In cooperation with the Faculty of Forestry, the Scouts printed and distributed 2,000 brochures and 500 posters for the campaign. As a result of their efforts, trash clean up and reforestation activities were undertaken in the Tarcin, Hadzici, Ilidza, and Trnovo municipalities, resulting in 7,000 evergreen seedlings planted in the region. In addition, the Stabilization Force Mission agreed to stop military exercises in the region. The government declared the protection of the Igman and Bjelasnica mountains a priority for 2004 and is working on a proposal to declare the region as a national protected area.

Partners include: Sarajevo Scouts Union.

#### **Bulgaria: Biodiversity Conservation and Economic Growth Project II**

FY 2003 Obligation: \$0.60 million (AEEB)

USAID has supported biodiversity conservation for more than ten years in Bulgaria. In FY 2003, USAID entered the final stage of its assistance to the Biodiversity Conservation and Economic Growth Project, expected to close in FY 2004.

Achievements during FY 2003 included technical and financial support for implementation of the nation's first national park management plans. Assistance focused on developing tourism infrastructure, collaborative management models for non-timber forest products from within parks, and improved income generation from concessions. USAID also helped develop the nation's first ecological monitoring program for protected areas, now adopted by the National Executive Agency for the Environment and serving as the standard for habitat, species, and adaptive management monitoring.

As a result of USAID assistance, the Central Balkan National Park was certified as the fourth member of the Protected Areas Network Parks organization in Europe. The network is a public-private initiative that links the preservation of wilderness in Europe with ecotourism development. The second country in Eastern Europe to qualify for this prestigious certification, Bulgaria was awarded this certification through an independent audit of the park's management plan, management capacity, and community programs.

Furthermore, USAID provided support for the development and finalization of the nation's first protected area management plan for the Rila Monastery Nature Park. This park protects one of the most significant watersheds

in the nation, yielding the country's largest amount of water per hectare and supplying Sofia, the capital city, with most of its water supply. The plan provides for conservation and management of more than 25,000 hectares of forest and high mountain meadows, and for preservation of more than 14,706 hectares of forest within a core reserve and conservation zoning status. The plan also addresses one of the largest private land restitutions in the nation — the Rila Monastery, whose largest landowner within the Park's boundaries is the Bulgarian Orthodox Church. The management plan was finalized and released for public review in FY 2003 as part of a public hearing process developed and supported by USAID.

USAID protected area planning and management models were also used by the Municipality of Gabrovo to request the designation of a new park. Using the Central Balkan and Rila National Parks as models, the Government designated the new Bulgurka Nature Park, thereby providing protected area status to key forests, bear habitat, and a host of indigenous and endangered species in an area of more than 21,772 hectares.

USAID helped finalize the National Ecotourism Strategy in FY 2003, coordinating the participatory development of the strategy. The Agency supported a public review of the strategy, and a regionally focused development of a five-year implementation plan. The planning process involved major local, regional, and national ecotourism development stakeholders including national and local government institutions, regional conservation and tourism organizations, conservation and cultural NGOs, and private entrepreneurs.

Partners include: Associates in Rural Development.



High in the mountains of the Central Balkan National Park.

## LATIN AMERICA AND THE CARIBBEAN

he Latin America and the Caribbean region is home to the world's largest rainforest, the largest wetlands, and the second largest barrier reef system. These globally important habitats support an equally impressive array of biodiversity. The region's Galapagos Islands are home to more species of amphibians per unit area than anywhere else on earth. Latin America is home to 40 percent of all the species found in tropical forests throughout the world. In addition, 40 percent of the plant life in the Caribbean is found nowhere else on earth.

Unfortunately, the region's biodiversity is threatened by habitat loss. The rate of deforestation in the region is one of the highest in the world, and two-thirds of the region's coral reefs are threatened. This loss of habitat threatens the region's biodiversity as well as the livelihoods of people dependent on natural resources.

In recognition of the important role of natural resources and biodiversity in Latin America and the Caribbean, USAID supported biodiversity conservation activities in more than 20 countries in the region, representing nearly \$44 million in funding in FY 2003.

USAID is increasingly working with indigenous communities to help safeguard the region's biodiversity. In Bolivia, with USAID assistance, the Tacana and Izoceño received title to several hundred thousand acres of land in buffer zones critical for the protection of two national parks. In Colombia, indigenous forest rangers were trained to manage Indi Wasi National Park, located on ancestral land near the Guamuez River. USAID also supported work with indigenous communities in Brazil and Ecuador.



Latin America and the Caribbean region is home to thousands of bird species, including the striped cheek woodpecker (piculus callopterus) in Panama.

# **Ecuador:** Biodiversity Conservation in Protected Areas and Buffer Zones

FY 2003 Obligation: \$5.931 million (DA and ESF)

Representing less than 2 percent of the landmass of South America, Ecuador boasts one of the earth's greatest concentrations of biodiversity. Ecuador is home to more species of amphibians per unit area than anywhere else on earth, the largest population of endangered Andean condors in the world, and countless other species. USAID's biodiversity conservation efforts in Ecuador focus on three major components: working with indigenous communities to strengthen their management of local resources, improving the management of the Galapagos archipelago, and improving the management of the Condor Bioreserve.

USAID began a new program in FY 2003, focusing on conservation in indigenous lands. The program helped strengthen indigenous organizations; identify principal threats to 1 million hectares of indigenous Awa, Cofan, and Huaorani territories; and identify opportunities for sustainable income generating activities. In its first year, the program helped establish The Cofan Indigenous Federation of Ecuador as an operational entity, installed 36 radios to improve communication capacity within the Awa and Huaorani indigenous territories,



Indigenous groups in Ecuador help develop a management plan for a local forest.

trained 18 paralegals to coordinate and organize ground-level activities, and created a Cofan community park guard unit comprised of more than 30 park rangers (each of which has the same authority as those from Ministry of Environment).

A major challenge to the program is the threat of coca production and the presence of illegal groups in indigenous territories. This threat is being addressed by strengthening indigenous groups to exert greater control over their territory and developing income generating activities that reduce incentives for coca production. Indigenous territories are some of the most biodiverse areas in the world, and protection from external threats is critical to conserving the biodiversity found in these areas.

A second important component of USAID's program in Ecuador involves improving the management of the Galapagos archipelago. An impressive 95 percent of the archipelago's original plant and animal species still survive. To conserve this biodiversity treasure, USAID supports efforts to reduce the threats posed by over-fishing. USAID is helping to develop alternative income sources, such as community-based ecotourism activities on the island of Isabela. With help from USAID-assisted trainings, residents have entered the ecotourism market. As a result, an average of 150 tourists per week visits the town of Puerto Villamil and its surroundings, an increase of more than six-fold since the beginning of USAID assistance.

A second element of the Galapagos strategy is to improve the enforcement of fishing regulations. In FY 2003, USAID helped improve the Galapagos National Park's enforcement capacity by providing a full retrofit and maintenance of the park's main ocean-going vessel and the donation of a new amphibious airplane. These two assets have strengthened capabilities for control and surveillance of the Galapagos Marine Reserve against illegal fishing and narcotics trafficking. Between August and October 2003, the park professionals stopped six illegal activities on the seas surrounding the islands.

A quantitative study confirmed that USAID's outreach program in the Galapagos is bearing fruit: public interest in the participatory management of the marine reserve is growing, and two-thirds of residents now identify themselves as having a medium or high understanding of the marine reserve. In addition, in FY 2003 the Charles Darwin Foundation introduced six resolutions and laws regarding fishing and tourism, and provided scientific data used in the decision-making process of the Reserve's Participatory Management Board.

USAID is supporting the improved management of the Condor Bioreserve. With a 12foot wingspan, the Andean condor, Ecuador's national symbol, is the largest flying bird on earth. In FY 2003, an analysis of the Condor Bioreserve revealed that USAID's programs are having an important biophysical impact. The analysis demonstrated that from 1990 to 2001 the Antisana and Cayambe Reserves remained relatively well

AID/Ecuado



Ninety-seven percent of the Galapagos archipelago is national park, providing protection to the island's rich biodiversity.

conserved, losing respectively only 0.12 percent and 0.24 percent of natural habitat per year. While any loss is undesirable, theirs is well below the Ecuadorian average for deforestation in protected areas, which ranges from 1 to 4 percent per year. In the highland grasslands region, the implementation of a community park guard program resulted in a 35 percent reduction in the number of destructive grassland fires from 2000 to 2002. In addition in FY 2003, 204 families living near protected areas implemented improved natural resources management practices such as farm forest management planning for more than 22,500 hectares, and a community in the northern border of Cayambe-Coca developed and approved a plan to sustainably manage 65,000 hectares under their jurisdiction.

Partners include: Galapagos National Park, Charles Darwin Foundation, World Wildlife Fund, Chemonics International, The Nature Conservancy, CARE, Oikos, and Jatun Sacha.

### Latin America and the Caribbean Regional Programs

#### LAC Regional Program — Parks in Peril

FY 2003 Obligation: \$3.50 million (DA)

The Parks in Peril program<sup>11</sup> – an effort to safeguard the most threatened ecosystems in the Latin American and Caribbean Region including cloud forests, coral reefs, tropical forests, and savannahs – is one of USAID's most successful and important conservation activities. Since 1990, the program has worked to improve the protection of 45 critically threatened Latin American and Caribbean national parks and reserves.

The program strategy has been to strengthen partner organizations and build sustainable capacity to achieve enduring site conservation results. In FY 2003, the program increased management capacity in 12 parks in the areas of personnel, financial management, operation, and strategic planning. The program also collaborated with the InterAmerican Development Bank to help establish a national environment fund in Paraguay, allowing civil society groups, including communities, to manage local resources. In Guatemala, the program empowered communities in the Atitlan region by establishing community controlled tourism, enhancing coffee productivity, and increasing fair trade and market share for high-value shade and organic coffees. In Ecuador, the program strengthened citizen participation in implementing and enforcing environmental laws and regulations through the work of community park guards. These and other accomplishments contributed to improved biodiversity conservation throughout the region.

Partners include: The Nature Conservancy.

#### LAC Regional Program — The Neotropical Raptor Conservation Program

FY 2003 Obligation: \$0.50 million (DA)

The Neotropical Raptor Conservation Program, implemented by The Peregrine Fund/Fundo Peregrino Panama, seeks to complement and strengthen bilateral efforts to conserve biodiversity by implementing a regional approach to raptor conservation in tropical Latin America and the Caribbean. The program is building a regional institution to improve information gathering and dissemination; train local biologists; develop environmental education; and enhance longterm leadership, support, and administration of conservation efforts throughout the region.

In FY 2003, important objectives were advanced in the areas of local capacity



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building, species research and restoration, communication, and education. Specifically, the conservation capacity of the Panamanian NGO, Fundo Peregrino Panama, was strengthened through training and technical assistance in accounting and administration, communication, and negotiation. In addition, Fundo Peregrino Panama began to implement research and education agreements with indigenous groups. Species research and restoration efforts resulted in improved data on the occurrences of the Grenada Hook-billed Kite and Ridgeway Hawk and the propagation and release of several Harpy Eagles in Panama and Belize. Finally, the program worked to improve communication and awareness of species' conservation issues by developing and initiating implementation of an internet-based Neotropical Raptor Conservation Network and several local environmental education initiatives.

Partners include: The Peregrine Fund.

## Regional Environmental Program for Central America: Improved Environmental Management in the Mesoamerican Biological Corridor

FY 2003 Obligation: \$4.915 million (DA)

Mesoamerica is internationally recognized as a biodiversity hotspot of global importance. Forty percent of the protected areas in Central America are located on borders. Three countries have more than 60 percent of their territories in transboundary watersheds.

USAID's Regional Environmental Program for Central America, known by its Spanish acronym PROARCA, supports improved environmental management in the Mesoamerican Biological Corridor. The program provides training and technical assistance to: improve protected area management, increase access to financial resources and expanded markets for environmentally sound products and services, harmonize environmental standards and regulations, and increase the use of less polluting technologies by municipalities and the private sector.

FY 2003 activities included strengthening the management of the Rio Platano Biosphere Reserve in Honduras by drafting a financial management plan to ensure the sustainability of management activities and the implementation of monitoring and evaluation of conservation goals. These activities helped place more than 800,000 hectares under improved management. Moreover, the program trained more than 130 professionals in conservation planning, financial planning, and participatory management of protected areas. The first Mesoamerican Parks Congress was held in 2003 with support from the program, as was the first meeting to discuss Finance for Protected Areas. In addition, 35 private industries in the



USAID supports improved protected area management in Central America.

Mesoamerican Biological Corridor implemented low-cost best practices in their production processes, and three municipalities improved their solid waste and waste water management by introducing low cost technologies in municipal services. The resulting improvement of water quality flowing into regional watersheds will have a positive impact on the Mesoamerican Coral Reef and other coastal systems.

Partners include: The Nature Conservancy, World Wildlife Fund, Rainforest Alliance, Associates in Rural Development, Comision Centroamericana de Ambiente y Desarrollo, U.S. Department of the Interior, and Tropical Agricultural Center for Research and Education.

#### Caribbean Regional: Improved Environmental Management by Public and Private Entities

FY 2003 Obligation: \$0.610 million (ESF)

The Caribbean Regional program aims to conserve the region's terrestrial and marine resources that are critical to economic development prospects in the region. The program focuses on Eastern Caribbean countries and works primarily in Antigua and Barbuda, Dominica, Grenada, St. Kitts, St. Lucia, and St. Vincent.

Tourism is an important sector in the Caribbean economy, and one that is dependent on the region's natural resources and biodiversity. Thus strong incentives exist within the tourism industry to improve environmental management, and conserve the region's natural treasures. USAID's program works with small tourism enterprises to reduce coastal pollution, conduct environmental



The Diamond Benny is one of many unique fish species found only in the Caribbean.

audits, and encourage the adoption of environmental management systems. In FY 2003, 21 hoteliers reviewed a toolkit on environmental practices and hotel management, which was ultimately distributed to more than 200 organizations. In addition, 138 hotels received environmental management system training, 225 hotels participated in environmental walkthroughs, and 40 hotels received small hotel environmental assessments. These achievements are expected to contribute to improved natural resources and biodiversity conservation.

In addition, USAID worked with the Caribbean Community Secretariat on a regional program to assist smalland medium-sized enterprises and the tourism sector. Activities focused on building capacity at the national and regional level; promoting the adoption of cleaner production technologies, processes, and practices; and conducting a baseline study on cleaner production in the Caribbean. This regional effort to promote cleaner production is an important step to halting environmental degradation and biodiversity loss.

Through the Parks in Peril program, USAID worked with The Nature Conservancy to assess marine and coastal sites in the Grenadines. The program helped develop and map a terrestrial classification scheme and a threats assessment framework. The program also trained local scientists and other conservation practitioners on ecoregional planning methods, tools, and applications.

Partners include: Caribbean Environmental Health Institute, Caribbean Association of Industry and Commerce, Caribbean Tourism Organization, Caribbean Community Secretariat, and Organization of Eastern Caribbean States.

## Latin America and the Caribbean Country Programs

#### **Bolivia: Natural Resources Sustainably Managed**

FY 2003 Obligation: \$1.644 million (DA)

USAID is working to conserve Bolivia's biodiversity by supporting efforts to improve park and protected area management, as well as community-based forest management.

USAID programs are active in one-half of Bolivia's nationally declared protected areas, which together account for approximately 16 percent of the national territory. The area of parks that have achieved adequate management reached more than 5 million hectares in FY 2003. A protected area is considered to have met adequate management when immediate conservation threats are deterred, a long-term management plan is developed, local NGOs involved in park management are strengthened, long-term financing is secured, and the local constituency is supportive. The program also works with communities living in and around protected areas to identify alternative sources of income that are compatible with, and contribute to, the conservation of these areas. In particular, the program has been active in identifying and developing community-based ecotourism ventures.

In FY 2003, nine indigenous communities were granted official title to their territory. These included the Tacana and the Izoceño, two groups that USAID and partners have supported for several years. The Tacana received title to 325,000 hectares of intact tropical forest and grasslands that will be critical for the conservation of Madidi National Park. The Izoceño received title to close to 300,000 hectares with an additional 350,000 hectares pending adjacent to the Kaa-Iya National Park in the Bolivian Chaco, the largest protected area in Bolivia and one of the best examples of dry tropical forest.

In addition, USAID launched a new six-year forestry program in FY 2003 that will build on the success of more than 10 years of support to the Bolivian forestry sector. The program will focus on building community capacity to manage local forest resources with attention to securing independent certification. Last year, the program helped place close to 3.3 million hectares of forest under the management of municipal organizations, rural farmer organizations, and indigenous groups. The growth in local participation in FY 2003 represents an 83 percent increase in area under farmer association management and a 62 percent increase in area under indigenous group management since last year. Involving communities in forest management has important implications for biodiversity conservation as local communities have great incentive to sustainably manage the forest resources they depend on.

Along with empowering communities to manage forests, USAID's program also helped link communities and the private sector for their mutual benefit. When communities work with established wood products companies, they receive significantly increased prices for their products, while wood product companies are assured a more sustainable source of well managed or certified wood. By increasing the profit from sustainably harvested wood, communities are less likely to engage in environmentally destructive income generating activities, thereby securing important forest habitat for biodiversity conservation.

Partners include: The Nature Conservancy, Amazonian Center for Sustainable Forest Enterprise, U.S. Forest Service, Conservation International, World Wildlife Fund, and Wildlife Conservation Society.

#### **Brazil: Environmentally Sustainable Land Use**

FY 2003 Obligation: \$6.348 million (DA)

The sustainable development approach to biodiversity conservation that USAID and its 21 partners have nurtured during the past 13 years serves as the foundation on which President Lula da Silva has built many of his environmental policies, particularly with respect to the Amazon region. The government's "Sustainable Amazon" plan draws on the talents and experiences of a vast number of institutions and individuals with USAID connections. Many individuals that worked for USAID grantees or participated in USAID training programs are now in key decision-making positions at the federal, state, and local government levels.

In 2003, more than 47,000 people were trained in biodiversity conservation and sustainable resource management. During the life of this program, 27 new protected areas, attributable to USAID actions, were created beyond the target program areas. Under the current strategy, USAID partners are committed to extending biodiversity protection to 1.5 million hectares in strictly protected areas and multiple use and indigenous areas while contributing to establishment of sustainable regional land-use mosaics covering over 200,000 kilometers. In addition to the twenty-one Brazilian partner NGOs, USAID actions are carried out in collaboration with the Amazon Working Group of over four hundred grassroots and indigenous organizations representing small holders, rubber tappers, and indigenous communities. In addition to official protected areas, many of these new

parks and reserves are managed by private land owners. Other existing parks and reserves had management practices significantly improved through USAID actions.

Effective protection of Brazil's biodiversity in parks and private reserves requires the cultivation of public-private partnerships. USAID partners have been able to convince private land owners to assume their share of responsibility for conserving Brazil's biological diversity. A new Brazilian environmental NGO competed for, and obtained a Global Development Alliance grant to link official protected areas in the Atlantic Forest region with forest reserves on private land, contributing a 5:1 match provided by the Brazilian pulp and paper industry. A \$1 million pri-



*View of the Falls in Iguacu National Park in Brazil, a World Heritage site in the Atlantic Forest region.* 

vate donation from a U.S. donor, negotiated through a USAID partner, allowed Mato Grosso do Sul State to purchase land to establish the first state-level park in Brazil's Pantanal wetland, the world's largest freshwater wetland.

With the inclusion of mahogany in Appendix II of CITES, Brazil is taking an active role in defining measures to ensure that the mahogany that enters international trade has been harvested in a sustainable manner. At a recent international workshop on CITES Appendix II implementation for mahogany trade, experiences of USAID partners in mahogany management were presented. USAID supported the establishment of the only approved mahogany management initiative in the Brazilian Amazon, a partnership between the state of Acre, research NGOs, and the private sector, and a model for Appendix II compliance. Partners include twenty-one Brazilian NGOs including (all of those mentioned, correcting IIEB as International Institute of Education of Brazil), and the Institute for Forestry and Agricultural Management and Certification, the Institute of Ecological Research, the Institute of Socio-Environmental Studies of Southern Bahia, BioAtlantica Institute, SOS Amazonia Foundation, Kanindé Association for Ethnoenvironmental Defense, Center for Amazonian Workers, Brazilian Forest Stewardship Council, Socio-Environmental Institute, and the Amazon Working Group network. International partners also include the U.S. Forest Service.

#### **Colombia: Forestry and Sustainable Development Program**

FY 2003 Obligation: \$4.10 million (DA)

USAID's environment program in Colombia is working to conserve the country's biological resources by strengthening indigenous communities' participation in natural resources management and improving the management of Colombia's protected areas.

In collaboration with the Amazon Conservation Team, USAID is working with indigenous communities to increase their participation in natural resources management activities. Indigenous forest rangers were trained to manage Indi Wasi National Park, located on ancestral land near the Guamuez River. Indigenous community members also participated in a series of workshops to share their experiences in obtaining legal recognitions and creating manageable development plans. In FY 2003, the program trained 285 individuals and created 60 new jobs, completed eight rural infrastructure projects, and strengthened the environmental protection of 13,249 hectares of forest.

In addition, with USAID support, the U.S. Department of Interior worked with the Colombian National Parks Unit to strengthen its institutional presence in protected areas, and train its staff in improved management tools, including local community participation and environmental education.

Partners include: Amazon Conservation Team, Colombian National Parks Unit, and U.S. Department of the Interior.

#### **Dominican Republic: Improved Policies for Environmental Protection**

FY 2003 Obligation: \$0.60 million (DA)

USAID supports the conservation of biodiversity and natural resources in the Dominican Republic by strengthening the institutions that create, monitor, and implement environmental policies.

In FY 2003, USAID helped the Secretariat of Environment and Natural Resources draft a Biodiversity Law, for submission to the Dominican Congress. Additional support was provided to the Secretariat by facilitating a three-week observational visit to five U.S. National Parks to show them U.S. experiences in park management and ecological interpretation. USAID also helped develop criteria for a personnel evaluation system in the Secretariat, which led to the development of 1,000 Career Civil Service positions including key technical staff, and park and forest rangers and managers. The incorporation of technical personnel into the service will ensure the continuity of technical expertise within the Secretariat, protecting USAID's investment in upgrading capability to manage national parks and protected areas.

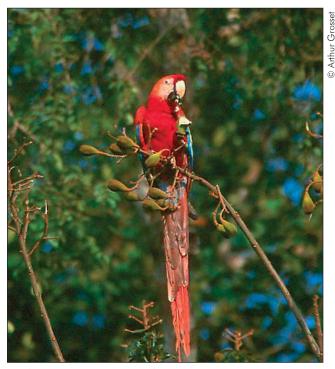
Additional accomplishments realized with USAID support in FY 2003 included the Ministry of the Environment formally approving the establishment of a database for Hispaniola biodiversity. Haitian and Dominican scientists also met to exchange information about Hispaniola biodiversity in meetings held in Port-au-Prince and Santo Domingo. New monitoring teams were trained to collect and analyze data on bird distribution with special emphasis in Sierra de Bahoruco. In addition, a study summarizing best practices related to co-management in marine habitats was completed.

The Parks in Peril program also progressed toward achieving ecoregional planning objectives in FY 2003, including beginning the design and implementation of a biodiversity database for the Dominican Republic, and training the Sub-Secretariat of Protected Areas and Biodiversity personnel in protected area management.

Partners include: International Resources Group, The Nature Conservancy, Ministry of Environment and Natural Resources, and Fundacion Moscoso Puello.

#### **Guatemala: Improved Natural Resources Management and Conservation of Biodiversity** FY 2003 Obligation: \$3.476 million (DA)

Guatemala contains the largest area of cloud forest and wetlands and the highest population of large cats in Central America. These resources are ecologically and economically important to the country. Enterprises based on natural resources, such as tourism and forestry, comprise a significant part of Guatemala's jobs and export earnings. USAID's environment program focuses on helping build capacity to manage these resources, using management arrangements that allow for civil society participation, provide direct economic incentives for con-



With USAID assistance, scarlet macaw nesting success increased in Guatemala's Sierra Lacandon National Park.

servation, and promote sustainable development. The program also helps the government develop policies that offer incentives for sustainable land use and the conservation of biodiversity.

USAID's program is active in the Maya Biosphere Reserve, the Sierra de las Minas Biosphere Reserve, two Ramsar wetlands, and the Atitlan Volcanoes Bioregion. In FY 2003, the program helped place more than 600,000 hectares of parks, concessions, and private lands under improved management in the Maya Biosphere Reserve.

In FY 2003, endangered scarlet macaw nesting success increased in Sierra Lacandon National Park. USAID supported efforts to protect the nests from poaching, remove Africanized bees from the nests, and set up surrogate nests. In addition, as a result of program efforts to combat forest fires, 34 of 36 endangered scarlet macaw nests and 4,300 hectares of forest in El Peru National Park were protected from fires.

In FY 2003, the program also brought environmental issues to the forefront of Guatemalan politics by hosting

a vice-presidential candidate debate on environmental issues, an activity that helped educate party leaders about the linkages between economic growth and the environment.

Through USAID/Guatemala's funding to the Parks in Peril program, USAID helped develop regional parks around Lake Atitlan, as well as site conservation plans for the semi-dry region of the Motagua Valley in the Motaguay-Polochic region. The program also supported the establishment of a national network of private reserves.

Partners include: CARE, Wildlife Conservation Society, The Nature Conservancy, and local NGOs.

#### Honduras: Improved Management of Watersheds, Forests, and Protected Areas

FY 2003 Obligation: \$0.404 million (DA)

Hurricane Mitch caused enormous damage in Honduras, with heavy rains and land slides destroying croplands



*El Jicarito Specie Habitat Reserve, on the southern coast of Honduras.* 

and infrastructure throughout the country. Deforestation and the poor management of watersheds unfortunately contributed to the high level of destruction. Since 1998, USAID's environment activities in Honduras have focused on the sustainable management of watersheds, forests, and protected areas.

In FY 2003, USAID support helped improve the management of 44,000 hectares of national parks and reserves, bringing the total area under improved management to more than 302,000 hectares in 31 declared protected areas since the program began. USAID considers a protected area to be under improved management when a management plan has been prepared, basic infrastructure (trails, guard posts, and the like) has been built, and a strengthened NGO has acquired responsibility for comanagement of the park or reserve. These improve-

ments resulted in increases in wildlife populations, improved water quality, a greater number of visitors, and decreases in forest fires. In addition, 23 local NGOs working in biodiversity conservation were strengthened technically and administratively in the process.

Partners include: Fundacion VIDA, El Zamorano Pan-American Agricultural University, Corporacion Hondureña de Desarrollo Forestal/Honduras Forest Service Agency, Secretaria de Recursos Naturales y Ambiente/Ministry of Natural Resources and Environment, and U.S. Geological Survey.

#### Jamaica: Improved Quality of Key Natural Resources

FY 2003 Obligation: \$1.4 million (DA)

Jamaica boasts a rich natural heritage, ranking fifth among the islands of the world with respect to endemic species. Various habitat destroying activities in the upper watershed threaten the terrestrial and coastal ecosystems and the biodiversity they support. In response, USAID is implementing three main biodiversity conservation projects. The Ridge to Reef/Watershed Project focuses on upper watershed conservation, introducing sus-

tainable agricultural practices, reforestation and public education and awareness. The Coastal Water Quality Improvement Project addresses issues of water quality and their effects on the marine and coral reef ecosystems. USAID/Jamaica's support to the Parks in Peril project focuses on terrestrial protected areas, helping local communities develop management plans and various approaches to conserve these ecosystems.

In FY 2003, considerable progress was made in protected area management, with management plans developed for the Ocho Rios Marine Park and Cockpit Country, an area of endemism and tremendous terrestrial biodiversity. Management plans were developed with local community participation



*The Golden Hamlet is one of the many fish species found in the Montego Bay Marine Park, a protected area supported by USAID and its partners.* 

and have emphasized the income earning opportunities for the community as well as raising funds to manage the protected areas. An economic valuation study of the Ocho Rios Marine Park helped demonstrate the economic value of protected areas to government and private-sector stakeholders. The findings were used to inform public awareness messages being developed for local stakeholders and resource users. The study was also used by USAID civil society partners to advocate for program interventions, based on the resource values at risk.

Considerable progress has been made in improving the management and operation of the Royal Palm Reserve in Negril, an area of an endemic palm adapted to wetlands. Through USAID support, the reserve management has advanced the understanding of issues relating to the growth and propagation of the Royal Palm. The program also supported the development of sustainable eco-tourism to secure financial sustainability for the protected area.

Partners include: National Environment and Planning Agency; Department of Forestry; Ministry of Water, Agriculture, Tourism, and Land and Environment; Jamaica Conservation Development Trust; Negril Environmental Protection Trust; Friends of the Sea; Montego Bay Marine Park; and Jamaica Hotel and Tourism Association.

#### **Mexico: Critical Ecosystems and Biological Resources Conserved**

FY 2003 Obligation: \$2.5 million (DA)

Mexico ranks among the five most biodiverse countries in the world and supports a high number of endemic species. The Government of Mexico is making a notable effort to implement its commitments under the Convention on Biodiversity. It has created and supported the management of a system of protected areas that now covers almost 9 percent of the country's territory, and has continued to track the country's biodiversity information through the Commission on Knowledge and Use of Biodiversity.

USAID is working with Mexican NGO and government partners to build the organizational and technical capacity needed to conserve the country's resources. In FY 2003, after 12 years of support to the Parks in Peril program, USAID completed its goal of converting 11 protected areas in Mexico from "paper parks" to real parks. Activities included developing ecoregional plans for the upper San Pedro River and the Gran Desierto de Altar in Sonora. In addition, the program worked with local authorities and communities along the Chiapas coast to develop watershed management plans supporting a corridor connecting two critical biosphere reserves, El Triunfo and La Encrucijada. USAID support also helped The Nature Conservancy and Conservation International participate in efforts to create a unified vision for the Selva Maya.

USAID's coastal management program worked with the University of Rhode Island and local partners to help protect Mexico's marine and coastal biodiversity, including the Mesoamerican Reef — the second largest reef in the world — and the Gulf of California, one of the world's centers for marine mammal diversity. The program has helped create a better link between coastal conservation and development planning at the state and local levels in southern Quintana Roo. In 2003, the University of Quintana Roo created a Natural Resource Center within the university to integrate its programs in natural resources management. It also integrated this Center with its geographic information systems center to help coastal communities and local governments in Quintana Roo plan, implement, and oversee conservation-based coastal development. The establishment of the Center as a permanent program within the university system was a major accomplishment as it will ensure that activities supporting conservation and coastal management in southern Quintana Roo continue after the program comes to a close.

Partner municipalities that surround the Bahia Santa Maria in Sinaloa on the Sea of Cortez signed the first paramunicipal agreement in Mexico. The municipalities agreed to join resources to better manage economically important fishery and biologically critical wetland resources. These municipalities were granted the right to directly collect the Mexican federal coastal tax for their coastal zone. This local oversight and control will increase the efficiency of tax collection, and the municipalities plan to use extra revenues gained by this local tax collection to help support the paramunicipal sustainable development plan.

With USAID support, NGOs and communities participated in ecoregional planning processes in the Selva Lacandon and the Selva Zoque regions, two of the largest and most intact regions of tropical forest remaining in Mexico. Through their participation in the planning process, NGOs and communities voiced concerns regarding land conflicts with federal and state authorities.

The Mexico program also continued providing grants to local communities and NGOs in support of fire prevention and restoration activities around key protected areas through the Wildfire Prevention and Restoration Program. In 2003, several communities involved in the program suffered significantly fewer problems with fire than neighboring communities, thereby conserving important forest habitats.

Partners include: The Nature Conservancy, University of Rhode Island, University of Quintana Roo, Amigos de Sian Ka'an, IMADES, Instituto de Historia Natural y Ecologica, Fondo Mexicana para la Conservación de la Naturaleza, Conservation International, Pronatura, and La Comisión Nacional de Áreas Naturales Protegidas.

#### Nicaragua: Natural Resources Management Program

FY 2003 Obligation: \$0.837 million (DA)

Part of the Mesoamerican biological corridor, Nicaragua contains tropical forest, marine, and freshwater aquatic resources. In 2000, USAID initiated the Co-management of Protected Areas project focusing on empowering local NGOs and communities to co-manage eight protected areas through agreements with the Ministry of Environment and Natural Resources.

In 2003, the project completed six management plans identifying programs to address the management issues in each protected area, and inaugurated five park guard houses and vis-



A park guard discusses land management issues in Tisey-Estanzuela Natural Reserve, Nicaragua with a local farmer who is participating in the co-management of this protected area.

itor centers. In addition, six NGOs co-managing six of the protected areas received institutional strengthening and financial management support. This involved strengthening their capacity to manage protected areas, their understanding of biodiversity, and their use of participatory methodologies; and devolving management authority for each protected area to the NGO and a Local Co-management Committee.

A program evaluation assessed that the program resulted in substantial community participation and contributed to increased incomes of the rural populations. The program has promoted the adoption of economic activities compatible with the sustainable management of protected areas, focusing on tourism-related activities such as craft production, food and lodging services, and organic agriculture production. Promoting these activities through grant funds has allowed 144 families living in buffer zones to increase their incomes and reduce resource extraction from the protected areas.

Since the program's inception, 769,669 hectares of protected areas have benefited from more effective management. The protected areas demonstrated an impressive increase in the average Protected Area Index score from 47/180 points in 2000 to 105/180 in FY 2003. The protected areas management index, based on the Parks in Peril scorecard system,<sup>12</sup> includes social, administrative, natural and cultural resource, political, legal, and economic indexes.

USAID also supported the development of policies for the management of a National System for Protected Areas. The program helped formulate and disseminate regulations and by-laws for implementing the protected area co-management model, supported an economic appraisal for tourism in protected areas, and helped implement a monitoring and evaluation system for the National System of Protected Areas.

Moreover, through the Parks in Peril program, USAID supported efforts to conserve Nicaragua's Bosawas Biosphere Reserve. The program established scientific baselines in two indigenous territories to measure changes in biodiversity and ecosystem health, as well as 12 permanent sampling plots as the basis for a long-term research of the tropical forest, and supported school-based environmental educational programs.

Partners include: Associates in Rural Development, The Nature Conservancy, Saint Louis Zoo of Missouri, and Ministerio del Ambiente y los Recursos Naturales.

#### Panama: Sustainable Management of the Canal Watershed and Buffer Areas

#### FY 2003 Obligation: \$3.91 million (DA)

The sustainable management of the Panama Canal Watershed is key to ensuring the health of Panama's biodiversity and forests. USAID emphasizes an integrated approach to watershed management. Its program focuses on developing Panama's institutional and civic capacity to protect and conserve natural resources in pilot sub-watersheds of the Panama Canal Watershed. Strategic alliances integrate the efforts and interests of central government ministries with those of local governments, the private sector, civil society, and resident communities.

Critical environmental issues in the watershed are being addressed through environmentally sound practices in agriculture, development of sustainable environmentally friendly

*The Panama Canal Watershed includes the Chagres River and surrounding forest.* 

economic activities, clean production, and water quality conservation activities to prevent land use changes that are incompatible with the conservation efforts needed to preserve biodiversity and water quantity and quality in the Panama Canal Watershed.

A key program of USAID is improving Panama's biodiversity conservation and protected area management by creating an enabling environment to develop co-management arrangements for protected areas, and by developing environmentally friendly economic activities that will ensure financial sustainability. USAID also supports the National Environment Authority's efforts in monitoring the efficiency of protected area management.

Partners include: Panama Canal Authority, Ministry of Health, Comision Interinstitucional para la Cuenca Hidrografica, and National Environment Authority.

#### Paraguay: Management of Globally Important Eco-regions Improved

FY 2003 Obligation: \$1.0 million (DA)

Close to one third of Paraguay is forested, yet the loss of ten percent of its forest cover every year threatens the future of the country's unique ecosystems. USAID's environment program is working to improve the management of the Atlantic rain forest, the Chaco dry forest, and the Pantanal wetlands. Activities are coordinated with efforts in Argentina, Bolivia, and Brazil with whom Paraguay shares these eco-regions.



Program activities strengthen the skills of local NGOs and work with local governments to build the policy, legal, and financial tools needed for effective ecoregional management. For example, with USAID support, a local NGO, Instituto de Derecho y Economia Ambiental, trained judges and prosecutors in environmental law. In FY 2003, the same NGO conducted an analysis of the current environmental legal framework, identifying contradictions in laws regarding the protection of the environment and use of natural resources. The analysis included recommendations to improve the country's legal framework and identified geographic areas in need of conservation measures.

In the Pantanal eco-region, USAID supported the development of a conservation action plan for the wetlands, which are the most important freshwater ecosystem in the hemisphere and the largest wetlands in the world. The plan focused on establishing economic incentives under national law to promote conservation on private lands and strengthen local stakeholders' management capacity. USAID helped communities in the region identify environmentally sustainable income generating activities such as handicraft production.

Significant accomplishments also occurred in the Chaco dry forest eco-region. DesdelChaco Foundation carried out legal and biological studies in a corridor linking national parks in Paraguay and Bolivia. The studies served as the basis for the purchase by The Nature Conservancy, a USAID partner, of 5,000 hectares of forest within the corridor. In addition, The Nature Conservancy helped develop a strategic plan to acquire an additional 4,000 hectare area adjacent to Bolivia's Cañada del Carmen protected area, an initial step in establishing a binational Peace Park along the border.



Pantanal wetlands area in Paraguay.

USAID also supported the World Wildlife Fund in an effort to develop a moratorium on forest conversion in the Upper Parana Atlantic Forest. The World Wildlife Fund will present

the draft policy to the national Congress. Stakeholders from Argentina, Brazil, and Paraguay developed a Biological Vision for the Upper Parana Atlantic Forest. The vision will serve as an ecoregional management document for all three countries. Developing the vision resulted in renewed financial and political support for Paraguay's Atlantic Forest. Paraguay's Environment Secretariat incorporated the vision into its national biodiversity policy.

Partners include: Instituto de Derecho y Economia Ambiental, DesdelChaco, World Wildlife Fund, and The Nature Conservancy.

#### Peru: Strengthened Environmental Management to Address Priority Problems

FY 2003 Obligation: \$ 2.25 million (DA and ACI funds)

USAID's environment program in Peru is helping conserve the country's natural resources by working with the government to strengthen national environmental policies and the national protected areas system.

In an effort to improve Peru's National Natural Resource Institute's System of Natural Protected Areas, USAID supported a series of programs to train more than 300 park professionals in technical and administrative topics.

Also in FY 2003, the National Natural Resource Institute developed master plans for the Tingo Maria and Bahuaja-Sonene National Parks and the Tambopata National Reserve, and completed a stakeholder-led planning process for the Paracas National Reserve. Local partners began to prepare a plan for the Cordillera Azul, identified park boundaries, and worked with local communities to install park boundary signage.

Partners include: The Nature Conservancy, International Resources Group, World Wildlife Fund, and National Natural Resources Management Agency of Peru.

# **CENTRALLY FUNDED PROGRAMS**

### EGAT/NRM/Biodiversity Team

FY 2003 Obligation: \$5.914 million (DA)

The EGAT Bureau's Office of Natural Resources Management's Biodiversity Team plays a technical leadership role for the Agency in biodiversity conservation. A large part of the Biodiversity Team's funds support NGOs working to address the most pressing threats to biodiversity through the Global Conservation Program (GCP). Through this program, USAID assists developing countries to maintain biologically diverse habitats and environmental services.

The Biodiversity Team offers USAID missions and bureaus in-house, technical capability in strategy for-



*Staff from Song Thanh Nature Reserve, Vietnam participate in a participatory rural appraisal training course.* 

mulation, implementation, and evaluation. The Biodiversity Team prepared, and is now updating, a Biodiversity Conservation Program Design and Management Guide as a resource for USAID staff to achieve biodiversity conservation by linking it with the Agency's development goals. The Guide provides information on design, management, and implementation of biodiversity conservation programs and activities, and can serve as a useful resource for USAID partners as well.

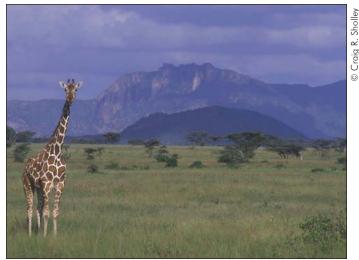
### *The Global Conservation Program* FY 2003 Obligation: \$4.27 million

The GCP, managed by the Biodiversity Team, builds upon lessons learned from the 13 years of work of the Biodiversity Support Program. This \$45 million program is supported by an additional \$24 million of matching funds from partner NGOs. Since 1999, conservation projects have been implemented under GCP in sites identified as global priorities for in-situ conservation. In FY 2003, GCP transitioned to its next phase, building on the foundation of GCP I and responding to the need for longerterm donor commitment at the site level. Under GCP II, nine of the original sites are receiving continued support, while eight new sites were selected (see Box 2). Fourteen of these sites are large-scale conservation activities (landscape scale and above), while four are

# Box 2. Sites Supported under GCP II

East African Marine Ecoregion: Kenya, Tanzania, Mozambique\* Eastern Himalayas/ Terai Arc Landscape, Nepal Forests of Lower Mekong: Vietnam, Cambodia, Laos Forests of Sierra Madre and the Palawan, the Philippines Glover's Reef Living Seascape, Belize\* Kilimanjaro Heartland: Kenya, Tanzania Kimbe Bay, Papua New Guinea Maasai Steppe Heartland, Tanzania Madidi Living Landscape, Northwest Andes, Bolivia Maya Biosphere Reserve Living Landscape, Guatemala\* Mesoamerican Reef: Belize, Guatemala, Honduras, Mexico\* Raja Ampat Islands, Indonesia\* Samburu Heartland, Kenya The Cerrado-Pantanal Biodiversity Corridor, Brazil The Eastern Steppe Living Landscape, Mongolia\* The Menabe Biodiversity Corridor, Madagascar\* Wakatobi National Park, Indonesia\*

(\* indicates new sites in GCP II)



A reticulated giraffe in Samburu Reserve in Northern Kenya.

transboundary activities. The GCP II strengthens the marine and coastal focus of the conservation efforts.

Within the GCP, the partner organizations implement a vast array of programs that include enterprise-based conservation, protected area management, community-based natural resources management, institutional capacity building, ecoregional planning and management, conflict resolution/land tenure, participatory monitoring and evaluation, conservation education and public awareness, environmentally sound tourism, policy initiatives, and innovative conservation financing.

In FY 2003, through the GCP, USAID facilitated the placement of close to 2 million hectares of biologically important habitat under improved management in

22 countries. In the Pantanal grasslands of Brazil, the efforts of GCP partner, Conservation International, led to the creation of the first federally appointed fire brigade to manage burning for grassland renewal in Serra da Bodoquena National Park. The Nature Conservancy's efforts in Komodo National Park in Indonesia led to the continued recovery of coral reefs, with average live hard coral cover gradually increasing 9 percent since 1996. In addition, in Paraguay, with support from the World Wildlife Fund and other local partners, the Government of Paraguay endorsed and incorporated guidelines for achieving a sustainable vision for the biodiversity of the Atlantic Forest into its own policies.

In addition to site-based activities, the program encourages inter-institutional collaboration and education through its learning component. The learning component of the GCP was designed to provide opportunities for applied research and dialogue on specific topics of interest to the partner NGOs and the wider conservation community. In addition, a Conservation Measures Partnership was formed to improve the practice of conservation by measuring the effectiveness of conservation projects. The partnership is currently developing and validating a common set of standards across partner organizations, and will produce a computer software program for training as well as teaching materials to guide practitioners through the conservation process.

While GCP represents a relatively small amount of the total budget that USAID spends on biodiversity conservation, it is uniquely placed to have impacts within the Agency and beyond. The GCP mechanism permits USAID to support the best biodiversity conservation projects of the selected NGOs while serving the needs of missions, regional bureaus, and the NGO partners.

Partners include: African Wildlife Foundation, Conservation International, Enterprise Works Worldwide, The Nature Conservancy, Wildlife Conservation Society, and World Wildlife Fund.

# EGAT/NRM/Forestry Team

### FY 2003 Obligation: \$3.52 million (DA)

USAID's forestry programs complement biodiversity conservation. Home to 70 percent of the world's landbased plants and animals, forests are critical habitat for the earth's terrestrial biodiversity. Forests are also the foundation of watershed systems and contribute to the health of freshwater habitats. In addition, forests provide the vital environmental service of regulating climate through their role as carbon sinks, contributing to global environmental health, watershed management, and habitat conservation. Forests therefore contribute to the conservation of biodiversity on land and water, locally and globally.

In FY 2003, the Office of Natural Resources Management's Forestry Team supported two major activities: the Sustainable Forest Products Global Alliance and an interagency agreement with the U.S. Forest Service. A public-private partnership, the Sustainable Forest Products Global Alliance addresses critical sustainable forest management issues through the marketplace. Alliance activities in FY 2003 included helping to establish producer groups in Africa, Latin America, and Asia that are adopting environmentally, socially, and economically sustainable forestry practices. In addition, the alliance worked with leading U.S.-based corporations to help improve their wood and paper purchasing policies.

In partnership with the U.S. Forest Service, USAID provided expertise in sustainable forest management and

conservation to support activities in Africa, Asia, Latin America and the Caribbean, and Europe and Eurasia. In FY 2003, U.S. Forest Service assistance to USAID programs helped build local capacity for forest management by promoting improved park management, reduced-impact logging, forest fire management, and forest product certification.

Through its various activities, USAID's Forestry Team contributed to the conservation of more than seven million hectares of forest in FY 2003. Approximately 80 percent of the Forestry Team funds (obligation figure provided above) are directed to conservation in natural forest ecosystems and are hence relevant to biodiversity conservation.



*The sustainable management of forest habitat contributes to the conservation of forest-dependent species.* 

Partners include: U.S. Forest Service, World Wildlife Fund, and Metafore.

# EGAT/NRM/Water and Coastal Team

FY 2003 Obligation: \$0.50 million (DA)

USAID promotes water and coastal resources management through efforts coordinated by the Water Team of the Office of Natural Resources Management. The principles and practices of integrated water resources management and integrated coastal management are promoted in several key countries and all regions worldwide. These approaches address biodiversity conservation needs through planning and management efforts at the ecosystem or basin-scale, and include biodiversity of freshwater, estuarine, and marine systems.

The Water Team's longstanding Coastal Resources Management Program (CRMP) was concluded at the end of FY 2003; however, coastal management activities will be continued through mission support in Tanzania, and to



USAID's coastal management activities include the conservation of marine biodiversity.

a lesser extent in Kenya, Mexico, and Indonesia. Activities of the CRMP have included conservation of marine biodiversity through the establishment of Marine Protected Areas and notake fishery reserves, and through the conservation of marinerelated ecosystems (particularly coral reefs, seagrass beds, and mangroves) as components of larger integrated coastal management programs. CRMP has also engaged in international outreach and leadership, acting as a voice on marine biodiversity conservation in numerous international fora. Efforts during FY 2003 focused on capturing best practices and lessons learned from 16 years of CRMP, which were synthesized into two documents.<sup>13</sup>

In addition, the Water Team supports activities to manage freshwater inflows to estuaries, including joint Biodiversity/Water Team activities in Morocco and Honduras, and a Water Team

partnership with The Nature Conservancy and the University of Rhode Island Coastal Resources Center to develop and field-test a freshwater inflows methods guide. Pilot activities have been designed and are underway in river basins in the Dominican Republic and Mexico. In addition, the Water Team provided substantive technical and financial support to the White Water to Blue Water Initiative to promote integrated ridge-to-reef management approaches for the Caribbean Region.

The Water Team also supports the Pond Dynamics/Aquaculture Collaborative Research Support Program (CRSP), which is funded by EGAT Bureau's Office of Agriculture. The project seeks to improve aquaculture productions systems, develop economical and culturally appropriate aquaculture management strategies, minimize the negative environmental impacts of aquaculture, explore the socioeconomic issues associated with aquaculture development, and disseminate scientific and technical information. In Peru, Pond Dynamics/Aquaculture CRSP collaborators have been studying the life cycles and reproductive biology of several indigenous fish species that are heavily fished in the Amazon basin. The collaborators have been successful in hatchery spawning these fish and raising them in ponds, and farmers in the Iquitos area have begun to produce some of these species. The culture of these species could reduce fishing pressure and stocks in the rivers could be supplemented with hatchery produced fish. The Pond Dynamics/Aquaculture CRSP is managed by Oregon State University. Other collaborators include: Southern Illinois University at Carbondale, Ohio State University, University of Arkansas at Pine Bluff, the Instituto de Investigaciones de la Amazonia Peruana and the Universidad Nacional de la Amazonia Peruana.

# EGAT/NRM/ Land Resources Management Team

FY 2003 Obligation: \$0.96 million (DA)

The people living in and around critical biodiversity areas are important contributors to conservation efforts. Their production activities must be compatible with the conservation of habitat. The Land Resources Management Team provides technical assistance and manages programs that affect people's use of the land, and whether that use is sustainable and in support of conservation. These areas include: land tenure, governance, communications and information exchange, improved agricultural practices, and advocacy and constituency building. The team supports the GreenCOM program. All other programs described below are managed by the

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<sup>&</sup>lt;sup>13</sup> Copies of "A World of Learning in Coastal Management" available on CD-ROM and "Crafting Coastal Governance in a Changing World" are available through University of Rhode Island Coastal Resources Center.

Land Resources Management Team but funded by other offices. Thus, the Sustainable Agriculture and Natural Resources Management (SANREM) CRSP is funded by EGAT's Office of Agriculture, while the Rights and Responsibilities cooperative agreement, the innovative technology program, and the FRAME project is funded by the Africa Bureau's Office of Sustainable Development.

GreenCOM, USAID's global environmental education and communication project, works with local and national partners to facilitate the adoption of improved practices for biodiversity conservation through training/capacity building, partnership development, public campaigns to motivate positive action, advocacy outreach to improve policy and other solutions-based community engagement.

In FY 2003, GreenCOM developed a manual on the GreenCOM approach, known as SCALE (Systems-based Collaborative Action for Livelihoods and the Environment). Based on the project's ten years of experience in more than 30 countries, a draft of the manual was produced containing an overview of GreenCOM's methodol-



Participants in GreenCOM's Community Environment Awards scheme restore a mangrove to prevent coastal erosion in Tanzania.

ogy and process, core competencies for implementing the approach, and an overview of social change methodologies. The manual will serve as the basis for a training course on the SCALE approach.

GreenCOM country projects in FY 2003 included activities in Egypt, Guatemala, Indonesia, Panama, and Tanzania totaling more than \$5 million. In Egypt, the program supported conservation efforts in the Red Sea by training Red Sea Rangers, developing environmental best practices for hotel managers and boat operators, and initiating a Community Environmental Awards Program. In Guatemala, the program helped build the capacity of the country's largest environmental NGO and supported the Maya Biosphere Diffusion Plan. In Indonesia, the program launched a mass media and

social mobilization campaign to spur citizen action against illegal logging. In Panama, the program focused on protecting the freshwater supply to the Panama Canal by promoting best practices to preserve biodiversity and water quantity and quality. In Tanzania, the program strengthened the adoption of best practices in coastal and wildlife resource management through a Community Environmental Awards Program.

The SANREM CRSP stimulates and supports integrated, systems-based research related to the interface between agricultural production systems and natural resources management. It assists in the creation and successful application of decision support methods, information, institutional innovations and local capacity to support sustainable agriculture and natural resource planning, management, and policy analysis at local, municipal, provincial, and national levels. SANREM is active in Latin America, Southeast Asia, and Africa.

In Peru and Ecuador, SANREM works to enhance agrobiodiversity and support the reintroduction into Andean farmer fields of native species of food crops that are no longer widely cultivated. More than 50 accessions of materials from the national gene bank are presently being grown in Ecuador in home gardens as part of an agro-ecotourism hostel enterprise. SANREM is providing assistance to local NGOs to organize biodiversity fairs,

where farmers come from the highlands to exchange seeds and present heirloom crops. In the Philippines, SAN-REM conducted research on the production and marketing of quality indigenous tree species for agroforestry systems in the buffer zone of Mount Kitanglad National Park. In collaboration with the Philippines Department of Natural Resources, researchers completed the identification and photo-documentation of endemic species, and the analysis of various clonal propagation techniques. The information was used by producer groups in 67 communal and household nurseries that commercially produce seeds.

SANREM hosts an Ecoagriculture listserve which provides a medium for exchanging ideas on land use systems that produce both human and ecosystem services, including habitat for wild biodiversity. SANREM researchers are preparing a comprehensive report on current research on ecoagriculture, focusing on agricultural land use systems that increase biodiversity. The assessment papers will be distributed via the Ecoagriculture network, which includes close to 100 organizations throughout the world, including major international conservation organizations.

The Land Resources Management Team supports applied research on environmental governance that addresses the interactions between property rights, governance, economics, and natural resource outcomes. The conservation of biodiversity is strongly influenced by social structures and institutions such as norms and property rights. Biodiversity conservation is also affected by resource rights and procedural rights, including access to information, decision-making, and justice or recourse.

Through the Rights and Responsibilities cooperative agreement, the Land Resources Management Team supported collaborative applied research on civil society strengthening and environmental advocacy, environmental decentralization and representation, benefit distribution, information and knowledge management, and institutional choice including interaction between traditional authorities, community-based organizations, elected

government, and federations. As a result, more than 10 civil society organizations have been strengthened, and research has led to policy dialogues and reform in eight countries pertaining to decentralization, representation, and legal issues. Through a property rights activity, innovative approaches to land tenure and property rights are being developed. These approaches will contribute to better land and resource stewardship and have a positive impact on biodiversity conservation.

The Land Resources Team supports the use of innovative technologies to increase the effectiveness of natural resources management in Africa. Since effective natural resources management depends on science as well as community participation and transparency in decision-making processes, the program aims to bridge the divide between science and local participation. The program engages communities, local leaders, and government land managers to use technology and local knowledge of the environment to develop management plans for sustainable use of their valuable natural resources. In FY 2003, community leaders in Senegal met with American and Senegalese scientists to analyze landcover change using satellite imagery. In Madagascar, natural resource managers used computer modeling software to create locally-derived management plans. In Namibia, programs helped local communities gain access to



USAID supports research on agricultural production systems and natural resources management.

low-tech data on wildlife and forest conditions, monitor the status of the natural resources, and incorporate community needs into national management decisions.

The Land Resources Team also assists with the FRAME project, an Internet-based resource that links communities of experts and practitioners in natural resources management. By providing an online library of topical information, FRAME supports the development of professionals in Africa and elsewhere to explore integral links between natural resources management and economic growth, poverty reduction, and good governance. It builds communities by providing a web-based platform that allows groups to control and manage their own websites, and provides tools to help policy managers use information more effectively. FRAME helps practitioners identify innovators in natural resources management and capitalize their knowledge for the greater good of the community. In addition, by highlighting progress in the sector, FRAME builds advocacy and support for the environment and natural resources management sector. Initially started as an Africa-focused program, FRAME is becoming a worldwide program, influencing USAID strategies and opinions in Africa and other parts of the world.

Partners include: Academy for Educational Development, Chemonics International, World Resources Institute, Cooperative League of the USA, Center for International Forestry Research, Winrock International, Associates in Rural Development, Rural Development Institute, Land Tenure Center, University of Wisconsin, and International Resources Group.

# **EGAT/Agriculture: University Research: Global Livestock Collaborative Research Support Program** FY 2003 Obligation: \$1.435 million<sup>14</sup> (DA)

EGAT's Office of Agriculture provides support to applied research programs that are significant for biodiversity conservation. These include the Global Livestock CRSP, the SANREM CRSP, and the Pond Dynamics/Aquaculture CRSP. The SANREM program is managed by EGAT's Land Resources Management Team and is described under the Land Resources Management Team program description. The Pond Dynamics/Aquaculture program is managed by EGAT's Water Team and is described under the Water Team program description.

The Global Livestock CRSP is designed to increase food security and improve the quality of life of people in developing countries while bringing an international focus to the research, teaching, and extension efforts of U.S. institutions. This goal is being met through collaboration between U.S. land-grant institutions, and national and regional institutions abroad that are involved in livestock research and development. The Global Livestock CRSP is active in Latin America and Africa.

In Latin America, the project focuses on the impact of increasing human population on montane forests, and the management of integrated livestock systems that protect and use biodiversity within these highly biodiverse ecosystems. In East Africa, the project has developed a partnership between Yellowstone and Serengeti National Parks to share knowledge and experience, and build human and institutional capacity to preserve biodiversity in these ecosystems. In Kenya, the project works with local stakeholders to establish a watershed model to address the watershed problems of the Njoro River, a prime water source supporting Nakuru National Park, one of the Rift Valley's most biodiverse lakes systems. The project also builds capacity for watershed management in the universities and government partners in the projects.

Partners include: University of California-Davis, University of Wisconsin-Madison, Texas A&M University System, University of Wyoming, Montana State University, Egerton University (Kenya), Moi University (Kenya), Tanzanian National Park Authority, Mara Conservatory, Kenya Wildlife Service, Kenya Department of Fisheries, International Livestock Research Institute, U.S. National Park Service, U.S. Department of Agriculture/Agricultural Research Service, and local NGOs.

## EGAT/Agriculture : Israeli Programs

FY 2003 Obligation: \$0.722 (DA and ESF)

USAID's Middle East Regional Cooperation Program supports a number of research activities with a biodiversity focus. The programs include: assessment of species diversity in the southern Arava Rift Valley in Israel and Jordan to identify conservation goals in the region; exchange and conservation of germplasm from endemic, drought- and salt-tolerant, fruit-bearing trees and shrubs; and improving watershed management practices and demonstrating effective forest and grassland management practices using pilot watershed programs in the Middle East region to protect natural resources and improve livelihoods.

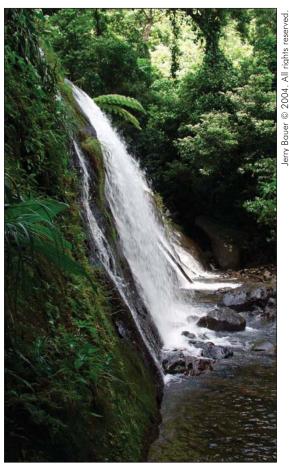
USAID's Cooperative Development Research Program supports activities related to biodiversity conservation. Program activities include: an evaluation of wild plants in Israel and Jordan as suitable food sources for insect pollinators; a stratigraphic and structural mapping of the Eritrean Southern Red Sea Lowlands to provide a framework for the sustainable use of natural resources; and the scientific development of a framework for conserving and monitoring Eritrean coral reefs.

# EGAT/Environment and Science Policy: Support to the Consultative Group on International Agricultural Research Centers and Biotechnology/Biodiversity Interface Research

FY 2003 Obligation: \$6.219 million (DA)

EGAT's Office of Environment and Science Policy supports 15 CGIAR centers for applied research and implementation of pilot programs, some of which relate directly to biodiversity conservation in forests, reefs, inland waters, savannahs, deserts, and steppes. Examples of these activities are illustrated in the work of the International Center for Research in Agroforestry (ICRAF), which seeks to influence policies and institutions that mediate the interactions between agroforestry and biodiversity conservation. Activities include enriching biodiversity in working landscapes, diversifying tree cultivation systems, developing sustainable seed and seedling systems and managing genetic resources of agroforestry trees, and domesticating indigenous tree species for conservation.

Under the Alternatives to Slash and Burn Program, ICRAF has been conducting research on agroforestry systems in Cameroon, Indonesia, Kenya, and Uganda. Results show high levels of plant biodiversity in agroforestry systems in the humid tropics (when compared to primary forests), the potential for these landscapes to create habitat for wild species, and the potential for enhancing connectivity and landscape heterogeneity in multi-functional landscapes. ICRAF has coordinated efforts to develop protocols and analytical tools to guide similar studies in other regions. In the Philippines and Uganda, ICRAF is engaged in agroforestry development in park buffer zones. The production of food and forest products within agricultural areas is reducing pressure for deforestation and forest extraction in parks. ICRAF and the Alternatives to Slash and Burn program are engaged in two new partnerships, the Rainforest Challenge and the Amazon Initiative, aimed at influencing development and conservation at the forest frontier. In Southeast Asia, ICRAF and partners coordinate the Rewarding the Upland Poor for the Environmental Services program. This multi-institute project explores possibilities for smallholder farmers to benefit from the provision of watershed protection, biodiversity conservation, and carbon sequestration services. In the Sahel, ICRAF is involved in projects looking at synergies between on-farm agroforestry and landscape-level biodiversity management across the parklands areas.



CIFOR promotes the decentralization of forest and protected areas management in Nicaragua.

The Center for International Forestry (CIFOR) has been engaged in a number of efforts that have direct biodiversity conservation impacts. In Latin America, CIFOR is engaged in decentralization of forest management that is expected to significantly improve the management of forests, reduce conflict in forested areas, and further participation and democratic practices. In 2003, CIFOR's research with its partners made major contributions to the new Nicaraguan and Mexican forestry laws, greatly increasing state and municipal government rights and responsibilities related to forest policies, land-use planning, forest fires, plantation incentives, protected areas, and other forestry matters. The laws also created a series of checks and balances by emphasizing multi-stakeholder municipal commissions, rather than simply re-enforcing the mayors' authorities.

In Indonesia, CIFOR is addressing illegal logging and money laundering from the illegal harvest of logs. CIFOR has been researching relevant legislation, the institutional aspects of enforcing money laundering laws, and the practical implications for financial institutions. During the last two years, CIFOR has worked to enforce money laundering laws with U.S. government agencies including the U.S. Forest Service, Department of Treasury, and Department of Justice; Indonesian government agencies including the Financial Crimes Unit; national media; multilateral donors; and large banks.

The EGAT Bureau's Office of Environment Science Policy's Biotechnology and Biodiversity Interface (BBI) Grants Program, initially launched in 2001, was re-initiated in 2003 as part of the

new Biosafety Systems program. The BBI competitive grants component will fund biosafety research to address the effects of agricultural biotechnology, particularly genetically engineered crops such as rice, maize, cotton, and fish on natural biodiversity in Africa, Asia, and Latin America. Merging BBI into the broader Biosafety Systems program facilitates the linkage between biodiversity risk assessment research with respect to non-target species conducted under BBI and the application of that research to regulatory decision-making supported by Biosafety Systems program.

# **Global Health/Population and Reproductive Health: Population, Health and Environment Programs** FY 2003 Obligation: \$1 million (DA)

Addressing the negative impacts of human population dynamics on the environment is essential to achieving long-term biodiversity conservation. USAID's Global Health Bureau supports the integrated Population, Health and Environment Program in collaboration with EGAT Bureau's Biodiversity Team in the Office of Natural Resources Management. The program is based on the recognition that people, in both their numbers and practices, have severe and often irreversible effects on the environment, and that individuals cannot exercise adequate stewardship over their natural resources unless their basic needs for health, nutrition, and livelihood are addressed. The Population, Health and Environment Program works to create partnerships between conservation/natural resource management NGOs and health service delivery NGOs that deliver integrated programming on primary health care interventions, including family planning, malaria, water and sanitation, and HIV prevention to communities inhabiting biodiversity hotspot areas. The goal is to address population-based threats to biodiversity while capitalizing on programmatic synergies achieved by combining health service delivery with conservation and natural resource management activities.

In Madagascar's last remaining corridor of primary forest, the Global Health Bureau, in collaboration with EGAT's Global Conservation Program and USAID/Madagascar, has supported the Voahary Salama association. Meaning "health and all that is natural" in Malagasy, Voahary Salama represents 29 partner organizations, including Conservation International and the World Wildlife Fund, as well as nine local NGOs implementing field activities. The goal of Voahary Salama's population, health, and environment approach is to provide a cost-effective means of linking conservation and natural resource management with health and family planning activities through interventions in family planning, water and sanitation, reforestation, and slash-and-burn farming practices. Systematic monitoring and evaluation has demonstrated substantial improvements in key population, health, and environment indicators that include reductions in slash and burn farming (from 55 percent to 25 percent) as well as increases in contraceptive prevalence rates (from 12 percent to 17 percent) and access to safe water (from 19 percent to 24 percent).

In the Philippines, the Global Health Bureau supports the PATH Foundation/Philippines' Integrated Population and Coastal Resource Management Program (IPOPCORM) that addresses the interconnected issues of population growth, overfishing, and food security. The IPOPCORM also provides skills training and micro-credit for small enterprise development in coastal areas dominated by commercial and subsistence fishing. To date, the IPOPCORM project has created 13 new marine protected areas and obtained financial and administrative support from local mayors for enforcement and maintenance activities. The communities surrounding these marine sanctuaries have become the focus for IPOPCORM's environmental education, livelihood, and family planning activities. The program has been successful in obtaining program support and buy-in from local government officials.

Partners include: Conservation International, World Wildlife Fund, PATH Foundation/Philippines, and Voahary Salama-Madagascar.

# **INTERAGENCY PROGRAMS**

### **Tropical Forest Conservation Act**

FY 2003 Obligation: \$20.0 million<sup>15</sup> (DA)

Many of the most diverse tropical forest habitats in danger of degradation and deforestation are in developing countries that have substantial bilateral debt. Through the TFCA, the United States is authorized to provide debt relief for low- and medium-income countries while generating funds for conservation of tropical forests. This innovative financing mechanism concurrently addresses developing nations' debt and the conservation of their tropical forests.

To date, the TFCA program has completed three debt reduction agreements with Bangladesh, El Salvador, and the Philippines, and three subsidized debt swap agreements with Belize, Panama, and Peru.<sup>16</sup> These agreements will generate more than \$60 million in forest conservation funds during the next 24 years in these countries.

In FY 2003, a new agreement was completed in Panama. The fund aims to improve the management of the Upper Chagres River Basin, encompassing Chagres National Park and important areas outside the Park. This watershed provides 50 percent of the necessary water for Panama Canal operations and 80 percent of the water for human consumption in Panama City. The funds resulting from this agreement will support conservation activities in the Chagres National Park for the next 14 years and create a permanent endowment to provide sustainable funding to the park.

In addition to the new agreement in Panama, Colombia, Sri Lanka, and Jamaica expressed interest in TFCA during FY 2003 and have been declared eligible.

Funds generated by the TFCA also continued to support conservation activities in existing locations in FY 2003. For example, in El Salvador, 17 community residents were employed as park rangers and trained in conservation techniques to improve the management of four protected areas. In Belize, funds helped ensure full staffing at Blue Hole and Guanacaste National Parks and Tapir Mountain Nature Reserve.



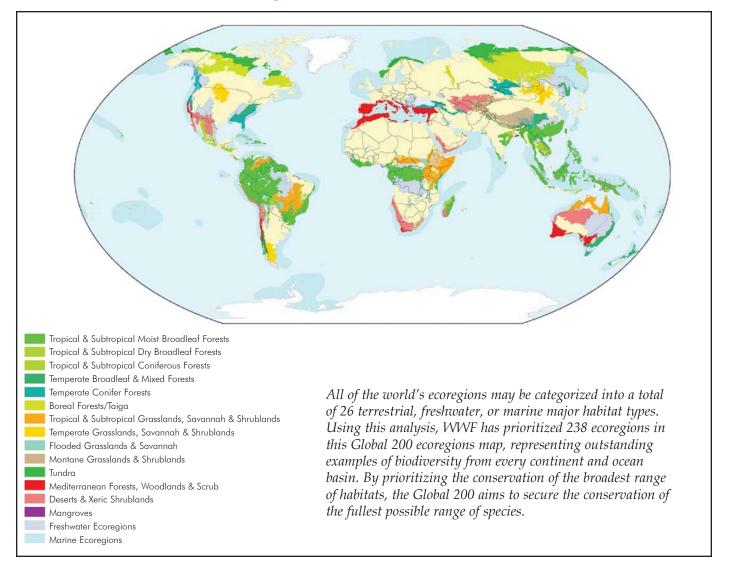
With TFCA funds, Belize's Cockscomb Basin Wildlife Sanctuary became one of five protected areas forming the Maya Mountain Marine Area Transect, a corridor linking the Maya Mountains with the Caribbean Sea.

<sup>15</sup> The TFCA funds are normally appropriated to the Treasury. In FY 2003, funds were appropriated to USAID and then transferred to the U.S. Department of Treasury. The Treasury Department managed the funds in FY 2003.

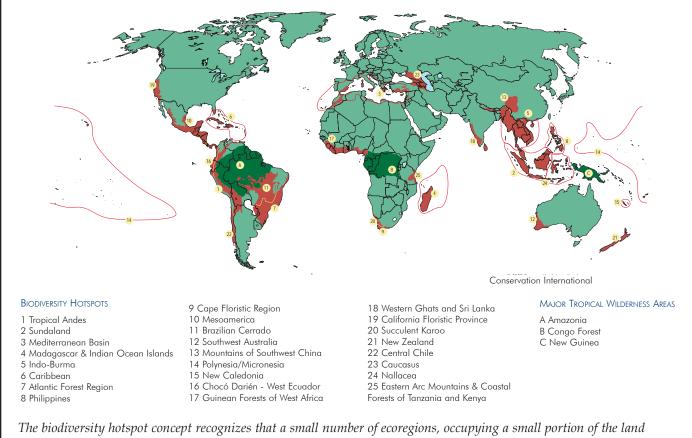
<sup>&</sup>lt;sup>16</sup> The U.S. Department of State has lead responsibility for negotiating tropical forest agreements between the U.S. Government and participating governments.

# **ANNEX I: MAPS**

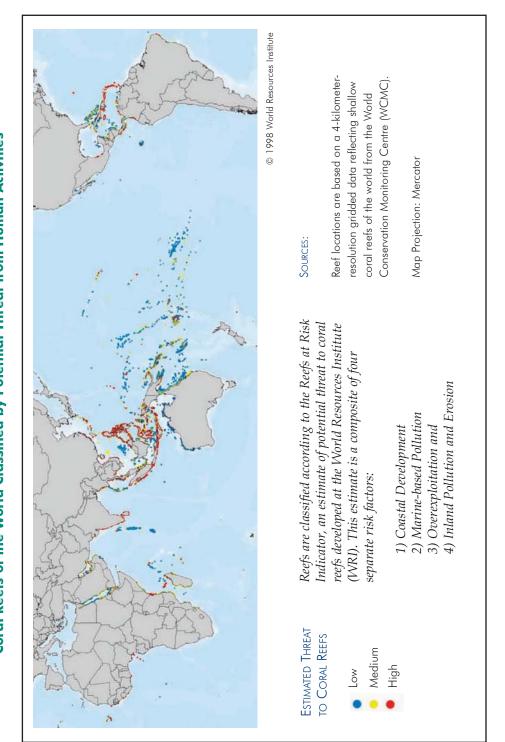
### World Wildlife Fund's "Earth's Ecoregions"



### Conservation International's "Biodiversity Hotspots and Major Tropical Wilderness Areas"



The biodiversity hotspot concept recognizes that a small number of ecoregions, occupying a small portion of the land surface of the planet, account for an inordinately large share of Earth's terrestrial biodiversity. The hotspot concept targets regions where the threat is greatest to the greatest number of species, allowing conservationists to focus efforts costeffectively. The 25 biodiversity hotspots identified in this Conservation International map contain 44 percent of all plant species and 35 percent of all terrestrial vertebrate species in only 1.4 percent of the planet's land area.



# Coral Reefs of the World Classified by Potential Threat from Human Activities

# ANNEX II: USAID BIODIVERSITY PROGRAMS AND ACTIVITY FUNDING FY 2003

Program Name	Program Description	Biodiversity Obligations in US\$	Type of Funds
Africa Region			
Africa Regional Program – AFR/SD	Env. Governance; Innovative Technologies, FRAME	1,375,341	DA
Africa Regional Program – RCSA	Southern Africa Region	678,000	DA
CARPE/CBFP	Central African Regional Program for the Environment Congo Basin Forest Partnership	14,250,000	DA
CARPE/CBFP	Central African Regional Program for the Environment Congo Basin Forest Partnership	1,200,000	ESF
Gorilla Conservation	Mountain Gorilla Habitat Conservation	1,500,000	DA
Ghana	Community-based Ecotourism Project	500,000	DA
Guinea	Increased Use of Sustainable Nat. Res. Mgmt. Practices	3,000,000	DA
Kenya	Improved Nat. Res. Mgmt. in Targeted Biodiversity Areas	s 1,500,000	DA
Madagascar	Biologically Diverse Ecosystems Conserved	7,916,315	DA
Malawi	Incr. Sustainable Use, Conservation & Mgmt. of Nat. Res.	1,621,796	DA
Namibia	Conservation of Habitats & Promotion of Nature Tourism	n 1,837,000	DA
Senegal	Agriculture and Natural Resource Management	1,500,000	DA
Tanzania	Improved Conservation of Coastal Res. & Wildlife	3,910,000	DA
Tanzania	Improved Conservation of Coastal Res. & Wildlife	300,000	ESF
Uganda	Critical Ecosystems Conserved to Sustain Biodiversity	1,120,000	DA
Zambia	Community-Based Natural Resources Mgmt. & Sust. Ag.	300,000	DA

Total

\$42,508,452

Asia and the Near East Region			
ANE Regional Program	Program Development and Learning	5,900,000	DA
Bangladesh	Improved Management of Waters and Forests	2,700,000	DA
Egypt	Egyptian Environmental Policy Program	4,500,000	ESF
Indonesia	Strengthened & Decentralized NRM	13,136,000	DA
Nepal	Strengthened Governance of Nat. Res. & Selec. Inst.	326,827	DA
Philippines	Improved Environmental Governance	7,040,000	DA
	Total	\$33,602,827	

Europe and Eurasia Region			
Bosnia and Herzegovina Bulgaria	Mountain Conservation Biodiversity Conservation & Economic Growth	10,000 599,998	
	Total	\$609,998	

Program Name	Program Description	Biodiversity Spending in US\$	Type of Funding
Latin America and the Carib	bean Region		
Caribbean Regional Program	Improved Envir. Mgmt. of Public and Private Entities	610,000	ESF
Central American Reg. Env. Program	PROARCA – Strengthening of PA System & Env. Policy	4,915,000	DA
LAC Regional	Parks in Peril	3,500,000	DA
LAC Regional	Neotropical Raptor Conservation	500,000	DA
Bolivia	Forest, Water, & Biodiversity Resource Management	1,644,000	DA
Brazil	Environmentally Sustainable Land Use	6,348,000	DA
Colombia	Forestry and Sustainable Development Program	4,100,000	DA
Dominican Republic	Improved Policy for Environmental Protection	600,000	DA
Ecuador	Biodiversity Conservation in PAs & their Buffer Zones	5,531,000	DA
Ecuador	Biodiversity Conservation in Galapagos Marine Reserve	400,000	ESF
Guatemala	Improved Nat. Res. Mgmt. & Conservation of Biodiversity	3,467,600	DA
Honduras	Improved Management of Watersheds, Forests, & PAs	404,000	DA
Jamaica	Improved Quality of Key Natural Resources	1,400,000	DA
Mexico	Critical Ecosystems & Biological Resources Conserved	2,500,000	DA
Nicaragua	Natural Resources Management	836,800	DA
Panama	Sustainable Management of Canal Areas	3,908,400	DA
Paraguay	Sustainable Management of Globally Important Ecoregion	s 1,000,000	DA
Peru	Strengthened Environmental Management	1,455,857	DA
Peru	Strengthened Environmental Management	794,360	ACI

Total

\$43,915,017

# **Centrally Funded Biodiversity Programs**

	Total Biodiversity Obligation in FY 2003 Biodiversity Obligation in FY 2003 (DA Funds only)	\$164,952,913 \$156,178,535	
<b>Other</b> TFCA	Tropical Forest Conservation Act	20,000,000	DA
	Total	\$24,316,619	
GDA Secretariat	Biodiversity Conservation Alliances	4,046,000	DA
EGAT/Environment & Science Pe Global Health - Pop. & Reprod. H	5	ogram 6,219,000 1,000,000	DA DA
EGAT/Agric. – Israeli Programs		362,599	
EGAT/Agric. – Israeli Programs		, ,	ESF
EGAT/NRM – Land Resources EGAT/Agric. – University Rese	0	4; FRAME 960,000 1,435,000	DA DA
EGAT/NRM – Water Resources	Mgmt Coastal, Marine, Freshwater Mgmt; Aquaculture R	, ,	DA
EGAT/NRM – Biodiversity Con EGAT/NRM – Forest Conservat	5	5,914,000 3,520,000	DA DA
		E 01 4 000	DA

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# ANNEX III: SECTION 119 OF THE FOREIGN ASSISTANCE ACT OF 1961 AS AMENDED

# Sec. 119 Endangered Species<sup>17</sup>

(a) The Congress finds the survival of many animal and plant species is endangered by overhunting, by the presence of toxic chemicals in water, air and soil, and by the destruction of habitats. The Congress further finds that the extinction of animal and plant species is an irreparable loss with potentially serious environmental and economic consequences for developing and developed countries alike. Accordingly, the preservation of animal and plant species through the regulation of the hunting and trade in endangered species, through limitations on the pollution of natural ecosystems, and through the protection of wildlife habitats should be an important objective of the United States development assistance.

(b) In order to preserve biological diversity, the President is authorized to furnish assistance under this part, notwithstanding section 660, to assist countries in protecting and maintaining wildlife habitats and in developing sound wildlife management and plant conservation programs. Special efforts should be made to establish and maintain wildlife sanctuaries, reserves, and parks; to enact and enforce anti-poaching measures; and to identify, study, and catalog animal and plant species, especially in tropical environments.

(c) Funding Level. – For fiscal year 1987, not less than \$2,500,000 of the funds available to carry out this part (excluding funds made available to carry out section 104(c)(2), relating to the Child Survival Fund) shall be allocated for assistance pursuant to subsection (b) for activities which were not funded prior to fiscal year 1987. In addition, the Agency for International Development shall, to the fullest extent possible, continue and increase assistance pursuant to subsection (b) for activities for which assistance was provided in fiscal years prior to fiscal year 1987.

(d) Country Analysis Requirements. – Each country development strategy statement or other country plan prepared by the Agency for International Development shall include an analysis of-

- (1) the actions necessary in that country to conserve biological diversity, and
- (2) the extent to which the actions proposed for support by the Agency meet the needs thus identified.

(e) Local Involvement. — To the fullest extent possible, projects supported under this section shall include close consultation with and involvement of local people at all stages of design and implementation.

(f) PVOs and Other Nongovernmental Organizations. – Whenever feasible, the objectives of this section shall be accomplished through projects managed by appropriate private and voluntary organizations, or international, regional, or national nongovernmental organizations, which are active in the region or country where the project is located.

(g) Actions by AID. - The Administrator of the Agency for International Development shall-

(1) cooperate with appropriate international organizations, both governmental and nongovernmental;

(2) look to the World Conservation Strategy as an overall guide for actions to conserve biological diversity;

(3) engage in dialogues and exchanges of information with recipient countries which stress the importance of conserving biological diversity for the long-term economic benefit of those countries and which identify and focus on policies of those countries which directly or indirectly contribute to loss of biological diversity;
(4) support training and education efforts which improve the capacity of recipient countries to prevent loss of biological diversity;

(5) whenever possible, enter into long-term agreements in which the recipient country agrees to protect ecosystems or other wildlife habitats recommended for protection by relevant governmental or nongovernmental organizations or as a result of activities undertaken pursuant to paragraph

(6), and the United States agrees to provide, subject to obtaining the necessary appropriations, additional assistance necessary for the establishment and maintenance of such protected areas;

(6) support, as necessary and in cooperation with the appropriate governmental and nongovernmental organizations, efforts to identify and survey ecosystems in recipient countries worthy of protection;

(7) cooperate with and support the relevant efforts of other agencies of the United States Government, including the United States Fish and Wildlife Service, the National Park Service, the Forest Service, and the Peace Corps;

(8) review the Agency's environmental regulations and revise them as necessary to ensure that ongoing and proposed actions by the Agency do not inadvertently endanger wildlife species or their critical habitats, harm protected areas, or have other adverse impacts on biological diversity (and shall report to the Congress within a year after the date of enactment of this paragraph on the actions taken pursuant to this paragraph);

(9) ensure that environmental profiles sponsored by the Agency include information needed for conservation of biological diversity; and

(10) deny any direct or indirect assistance under this chapter for actions which significantly degrade national parks or similar protected areas or introduce exotic plants or animals into such areas.

(h) Annual Reports. – Each annual report required by section 634(a) of this Act shall include, in a separate volume, a report on the implementation of this section.

# ANNEX IV: ACRONYMS

AEEB	Assistance for Eastern Europe and the Baltic States
AFR/SD	Africa Bureau, Office of Sustainable Development
BBI	Biotechnology and Biodiversity Interface
CARPE	Central African Regional Program for the Environment
CBD	Convention on Biological Diversity (United Nations)
CBFP	Congo Basin Forest Partnership
CCD	Convention to Combat Desertification (United Nations)
CGIAR	Consultative Group on International Agricultural Research
CIFOR	Center for International Forestry
CITES	Convention on International Trade in Endangered Species
CRMP	Coastal Resources Management Program
CRSP	Collaborative Research Support Program
DA	Development Assistance
EAPEI	East Asia and Pacific Environment Initiative
EGAT	Bureau for Economic Growth, Agriculture and Trade
ESF	Economic Support Funds
FSA	Freedom Support Act
FY	Fiscal Year
GCP	Global Conservation Program
GDA	Global Development Alliance
ICRAF	International Center for Research in Agroforestry
IPOPCORM	Integrated Population and Coastal Resource Management Program
IUCN	World Conservation Union
NGO	Non-governmental Organization
PROARCA	Regional Environmental Program for Central America
RCSA	Regional Center for Southern Africa
SANREM	Sustainable Agriculture and Natural Resources Management
SCALE	Systems-based Collaborative Action for Livelihoods and the Environment
TFCA	Tropical Forest Conservation Act
UNCCC	United Nations Framework Convention on Climate Change
USAID	U.S. Agency for International Development

For more information, visit http://www.usaid.gov/our\_work/environment/biodiversity/ or http://www.usaid.gov/missions/

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