

Lo Go-Xa Mat National Park

Alternative site name(s)

Lo Go Sa Mat

Province(s)

Tay Ninh

Area

18,765 ha

Coordinates

11°19' - 11°40'N, 105°49' - 105°59'E

Agro-ecological zone

South-eastern

Decreed by government

Yes

Management board established

Yes

Investment plan prepared

Yes

VCF eligibility criteria met

A, B, C

Social screening criteria met

A, B, C

Conservation needs assessment prepared

Yes - 2003

Operational management plan prepared

Yes - 2003

Tracking tool completed

Yes - 2003 (score: 43)

Map available

Yes

Management history

Lo Go-Xa Mat was included on Decision No. 194/CT of the Chairman of the Council of Ministers, dated 9 August 1986, which decreed the establishment of a 10,000 ha nature reserve (MARD 1997). Before being designated as a Special-use Forest, Lo Go-Xa Mat was under the management of Hoa Hiep and Tan Binh Forest Enterprises (Le Trong Trai verbally 2000). In December 1996, Ho Chi Minh City Sub-FIPI prepared an investment plan for Lo Go-Xa Mat, which proposed establishing a 16,754 ha cultural and historical site (Anon. 1996). This investment plan was approved by Official Letter No. 842/NN-PTLN-CN of MARD, dated 21 March 1997, and by Decision No. 261A/QD-UB of Tay Ninh Provincial People's Committee, dated 16 July 1997. Upon approval of the investment plan by Tay Ninh Provincial People's Committee, a management board was established (Tay Ninh Provincial FPD *in litt.* 2000). The management board currently has 22 permanent members of staff, plus 53 contracted staff, based at 13 guard stations.

A review of Vietnam's Special-use Forests network conducted by the Forest Inventory and Planning Institute (FIPI) and BirdLife International in 1999 recommended expanding Lo Go-Xa Mat (Wege *et al.* 1999). Consequently, FIPI and BirdLife International conducted a rapid field survey of the site in December 1999, which concluded that it was an important site for biodiversity conservation (Le Trong Trai and Tran

Hieu Minh 2000). Subsequent surveys by BirdLife International, the Institute of Ecology and Biological Resources (IEBR) and Ho Chi Minh City National University further highlighted the biodiversity values of the site (e.g. Tordoff *et al.* 2002).

On 12 July 2002, the Prime Minister issued Decision No. 91/2002/QĐ-TTg, officially revising the management category of Lo Go-Xa Mat to national park. According to the Prime Minister's decision, the total area of the national park is 18,765 ha, comprising a strict protection area of 8,594 ha, a forest rehabilitation area of 10,084 ha, and an administration and services area of 87 ha. Management responsibility for the national park was transferred from Tay Ninh Provincial DARD to the provincial people's committee.

Lo Go-Xa Mat is included on a list of Special-use Forests to be established by the year 2010, prepared by the FPD of MARD, as an 18,765 ha national park (FPD 2003); this list has not yet been approved by the government.

Topography and hydrology

Lo Go-Xa Mat National Park lies in the lowlands of southern Vietnam. The topography of the site is very flat, with altitudes reaching only 20 m. The site is drained by the Vam Co river, which originates in Cambodia and forms 16 km of the international border between Vietnam and Cambodia. Within the national park, a number of streams and small rivers feed the

Vam Co river, including the Da Ha, Mec Mu, Xa Nghe, Ta Dot and Ba Diec.

Biodiversity values

Lo Go-Xa Mat National Park contains the single largest forested area in Tay Ninh province, and includes 26% of the province's total natural forest cover (Le Trong Trai and Tran Hieu Minh 2000). The national park supports a mosaic of lowland semi-evergreen forest and lowland deciduous forest (which, because of poor soil and hydrology, is stunted and without a closed canopy), with smaller patches of lowland evergreen forest along watercourses, and *Melaleuca* forest. Close to the international border with Cambodia, there are extensive patches of seasonally inundated grassland with large sedge beds (J. Eames *in litt.* 2001).

The dominant tree species at Lo Go-Xa Mat include *Anisoptera costata*, *Dipterocarpus alatus*, *D. dyeri*, *Hopea odorata*, *Shorea roxburghii*, *Xylia xylocarpa*, *Azelia xylocarpa*, *Sindora siamensis*, *Dialium cochinchinensis*, *Dalbergia* sp., *Pterocarpus macrocarpus*, *Lagerstroemia* sp. and *Shorea cochinchinensis*. There are also some monospecific stands of deciduous dipterocarp species, such as *Dipterocarpus costatus* and *D. intricatus*. The forest at Lo Go-Xa Mat supports a number of globally threatened plant species, including *Azelia xylocarpa*, *Dipterocarpus alatus*, *Hopea odorata* and *Shorea roxburghii* (Le Trong Trai and Tran Hieu Minh 2000).

Although the fauna of Lo Go-Xa Mat National Park has not been comprehensively studied, a series of rapid field surveys conducted to date have recorded a several species of conservation concern (Le Trong Trai and Tran Hieu Minh 2000, Tordoff *et al.* 2002). A number of globally threatened or near-threatened primates have been recorded at the national park: Pygmy Lorises *Nycticebus pygmaeus*, Northern Pig-tailed Macaque *Macaca leonina* and Long-tailed Macaque *M. fascicularis* have been confirmed to occur, while Silvered Leaf Monkey *Trachypithecus villosus* and Black-shanked Douc *Pygathrix nigripes* have been reported by local people (Tordoff *et al.* 2002).

Regarding birds, the forested wetlands at the national park support a number of large waterbird species, including Woolly-necked Stork *Ciconia episcopus*, Lesser Adjutant *Leptoptilos javanicus* and

Asian Openbill *Anastomus oscitans*. The forest habitats at the site support the globally near-threatened Siamese Fireback *Lophura diardi*, and two restricted-range species: Germain's Peacock Pheasant *Polyplectron germaini* and Grey-faced Tit Babbler *Macronous kelleyi*. In addition, Lo Go-Xa Mat appears to be a stop-over area for Sarus Cranes *Grus antigone* migrating between the Mekong Delta of Vietnam and their breeding areas in Cambodia (Tordoff *et al.* 2002). Based upon its importance for globally threatened and restricted-range bird species, Lo Go-Xa Mat qualifies as an Important Bird Area (Tordoff 2002).

Le Trong Trai and Tran Hieu Minh (2000) received unconfirmed reports from local fishers of the occurrence of the globally critically endangered Siamese Crocodile *Crocodylus siamensis* in the Vam Co river at Lo Go-Xa Mat. Tordoff *et al.* (2002) received a second-hand report of a crocodile being captured in the Vam Co river in Cambodia, upstream of the national park. To date, however, there has been no survey of the river to establish the status of this species.

Conservation issues

During the Second Indochina War, the Lo Go-Xa Mat area was subjected to extensive bombing and spraying of defoliants. Conservation at Lo Go-Xa Mat today still faces many obstacles. The national park covers a large, easily accessible area, which the management board has insufficient staff and resources to manage effectively.

Potentially the greatest threat to biodiversity at the national park is conversion of seasonally inundated grasslands to agriculture. During early 2001, a network of roads and drainage canals were constructed within the largest seasonally inundated grasslands in the national park, with a view to resettling communities there. Fortunately, following realisation of the biodiversity values of the area among the provincial authorities, this project was halted. However, there remains a danger that, without a wide appreciation of the site's values, development visions inconsistent with wetland conservation will continue to be pursued at Lo Go-Xa Mat.

Other threats to biodiversity at Lo Go-Xa Mat identified in the conservation needs assessment include illegal timber extraction, hunting and trapping, over-

exploitation of non-timber forest products and forest fire. Of these, hunting and trapping was assessed as the highest ranked threat to biodiversity at the site.

Other documented values

During the Second Indochina War, Lo Go-Xa Mat was a base for South Vietnam Liberation Radio and, also, a revolutionary base for liberation troops. Therefore, the site has historical significance. Additionally, the forest within the national park performs an important role in protecting the watershed of the Vam Co river. Many households depend upon the aquatic resources, especially fish, of this river.

Related projects

The budget for the activities of the national park management board comes from the national 661 Programme, which replaced the national 327 Programme in 1999.

The national park management board is currently implementing a project entitled *Supporting Wetland Conservation at Lo Go Xa Mat National Park, Tan Bien District, Tay Ninh Province*. The objectives of this project are to increase the capacity of national park staff to manage wetland resources, to raise awareness of wetland values among all stakeholders, and to ensure that all areas of key wetland habitat have appropriate management status. The project is being funded by the Cat Tien National Park Conservation Project Small Grants Scheme, and is being implemented from 2003 to 2004.

The Asian Development Bank is currently appraising a proposed rural development loan to MARD for the development of the *Phuoc Hoa Water Resources Project*, a large water resources project in Tay Ninh, Long An, Binh Duong and Binh Phuoc provinces. One activity will be the expansion of the Dau Tieng irrigation scheme into Tan Bien district, Tay Ninh province, including the buffer zone of Lo Go-Xa Mat National Park. The potential environmental impacts of this project on the national park include increased human population density in the buffer zone of the national park and consequent increased human pressure on natural resources. However, a comprehensive buffer zone management and park protection programme has been proposed as a

mitigation measure for the potential impacts of the project on Lo Go-Xa Mat. This programme is projected to be implemented over seven years.

Conservation needs assessment

A conservation needs assessment was conducted for the site in August 2003 by BirdLife International, in collaboration with the national park management board, with support from the Cat Tien National Park Conservation Project. Based on an assessment of the biodiversity values of the site, and the direct and indirect threats to them, six high priority activities for VCF support were identified:

- capacity building for national park staff;
- improved coordination with other enforcement agencies;
- awareness raising for decision-makers, enforcement staff and local communities;
- community co-management;
- participatory boundary demarcation;
- establishment of monitoring programme for wetland habitats and key species.

Operational management plan

An operational management plan was prepared for the site in August 2003 by BirdLife International, in collaboration with the national park management board, with support from the Cat Tien National Park Conservation Project. The priority management actions formulated were as follows:

1. maintain the integrity of all seasonally inundated grasslands;
2. protect all lowland forest from conversion to other land uses;
3. demarcate the national park boundary;
4. control illegal timber extraction;
5. control hunting and trapping of animal species;
6. control over-exploitation of NTFPs;
7. control forest fires;
8. conduct targeted biological research;
9. strengthen the capacity of the national park staff;
10. provide necessary equipment and infrastructure for the management board;
11. improve coordination with local authorities and other enforcement agencies;

12. implement an education and awareness programme;
13. develop the economy of the buffer zone communities.

Eligibility against VCF criteria

Lo Go-Xa Mat is eligible for VCF support because it meets criteria A, B and C.

Criterion	Eligibility
A _I	
A _{II}	VN059 - Lo Go-Xa Mat
B _I	Decision No. 91/TTg, dated 12/07/02
B _{II}	National Park
B _{III}	Under provincial management
C _I	Management board established
C _{II}	

Social screening requirements

A social screening report was prepared for the site in August 2003. Lo Go-Xa Mat meets social screening criteria A, B and C. Lo Go-Xa Mat does not meet criterion D, because the management board has not yet negotiated and reached agreement with local communities on acceptable levels of local use of specified resources within the national park.

Criterion	Eligibility
A	The people's committee chairmen of all communes located in the buffer zone and core area of the national park were consulted in the preparation of the conservation needs assessment
B	People living in the buffer zone and core area, and all sections of these communities, were consulted during the preparation of the conservation needs assessment
C	Draft results of the conservation needs assessment were fed back to all local communities and their comments were taken into account in the final conservation needs assessment
D	

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