Bat Dai Son Proposed Nature Reserve

Alternative site name(s)
None
Province(s)
Ha Giang
Area
10,648 ha
Coordinates
$23^0$04' - $23^0$11'N, $104^0$54' - $105^0$02'E
Agro-ecological zone
North-eastern
Decreed by government
No
Management board established
Yes
Investment plan prepared
Yes
VCF eligibility criteria met
A, B, C
Social screening criteria met
None
Conservation needs assessment prepared
No
Operational management plan prepared
No
Tracking tool completed
No
Map available
Yes

Management history

Bat Dai Son is not listed on any government decision regarding the Special-use Forests system. However, Vu Van Dung and Nguyen Huy Thang (1999) proposed establishing a nature reserve at the site, in order to conserve a recently discovered species of conifer. An investment plan for Bat Dai Son was prepared by FIPI in 1999, and approved by Official Letter No. 1437/BNN-KH of MARD, dated 28 April 2000 (Ha Giang Provincial FPD *in litt.* 2000). Subsequently, a nature reserve management board was established, following Decision No. 2601/QD-UB of Ha Giang Provincial People's Committee, dated 6 October 2000. The management board currently has six members of staff, and is under the management of the provincial FPD (Ha Giang Provincial FPD *in litt.* 2003).

The total area of the proposed nature reserve is 10,648 ha, comprising a strict protection area of 6,298 ha, a forest rehabilitation area of 4,071 ha and an administration and services area of 315 ha. In addition, the buffer zone covers 5,194 ha (Mrs. Van, Forest Management and Protection Section, Ha Giang Provincial FPD verbally 2000).

Bat Dai Son is not included on a list of Special-use Forests to be established by the year 2010, prepared by the FPD of MARD (FPD 2003).

Topography and hydrology

Bat Dai Son proposed nature reserve is located in Bat Dai Son, Can Ty and Thanh Van communes, Quan Ba district. The proposed nature reserve is centred on a ridge of limestone karst, which runs in a south-easterly direction from the Chinese border. Most of the proposed nature reserve is higher than 1,000 m in elevation, and the highest point is 1,645 m. The proposed nature reserve is situated in the watershed of the Gam river. The eastern and north-eastern boundaries of the nature reserve are formed by the Mien river, which flows into Vietnam from China.

Biodiversity values

Bat Dai Son proposed nature reserve supports 6,611 ha of forest, equivalent to 62% of the total area (Ha Giang Provincial FPD *in litt.* 2003). The natural forest at Bat Dai Son is dominated by limestone forest, distributed at middle elevations. The high mountains in the north-east of the nature reserve previously supported lower montane evergreen forest, although this has mostly been converted to secondary grassland and scrub, as a result of human activities. In valley bottoms, the dominant land-use is cultivation and pasture.

Because Bat Dai Son is the most northerly protected area in Vietnam, the composition of the flora is quite unique, with a high proportion of Sino-

Himalayan elements. In particular, Bat Dai Son supports a high diversity of conifer species, including *Pseudotsuga brevifolia*, *Calocedrus macrolepis*, *Taxus chinensis* and *Podocarpus brevifolius* (Vu Van Can *et al.* 1999a). In addition, in 1997, a conifer was discovered at the site, which was recently described as a new genus and species to science: *Xanthocyparis vietnamensis* (Farjon and Nguyen Tien Hiep 2002). This conifer, which was initially described incorrectly as *Thuja quanbaensis* (Vu Van Can *et al.* 1999b) is currently known from nowhere else in the world.

Regarding the fauna of Bat Dai Son proposed nature reserve, Vu Van Dung and Nguyen Huy Thang (1999) report that the site supports populations of Southern Serow *Naemorhedus sumatraensis* and Asian Black Bear *Ursus thibetanus*.

Conservation issues

A total of 7,085 people, mostly from the Hmong and Tay ethnic groups, live in the proposed nature reserve and buffer zone. These people practice cultivation and livestock raising, and experience, on average, three to four months of food shortages per year (Ha Giang Provincial FPD *in litt.* 2003). The underlying causes of biodiversity loss at the site are reported to be the low socio-economic level of the local people, in particular, food shortages stemming from a lack of suitable agricultural land (Ha Giang Provincial FPD *in litt.* 2000).

Other documented values

The proposed nature reserve has watershed protection value for the Gam river catchment.

Related projects

No information.

Conservation needs assessment

A conservation needs assessment has not been conducted for the site.

Operational management plan

An operational management plan has not been prepared for the site.

Eligibility against VCF criteria

Bat Dai Son is eligible for VCF funding because it meets criteria A, B and C.

Criterion	Eligibility
A_I	NH2 - Northern Highlands Limestone
A_{II}	
B_I	Proposed Special-use Forest
B_{II}	Nature Reserve
B_{III}	Under provincial management
C_I	Management board established
C_{II}	

Social screening requirements

A social screening report has not been prepared for the site.

Criterion	Eligibility
A	
B	
C	
D	

Literature sources

Farjon, A. and Nguyen Tien Hiep (2002) A new genus and species in Cupressaceae (Coniferales) from northern Vietnam. Novon 12(2): 180-182.

Vietnam News Agency (2002) Yellow Cypress - a new tree found in Vietnam. Press release by Vietnam News Agency 15 February 2002.

Vu Van Can, Vu Van Dung and Le Van Cham (1999a) [The gymnosperms of Bat Dai Son Nature Reserve, Ha Giang province]. Pp 21-24 in: Le Sau ed. [Protection and sustainable development of forest and biodiversity in limestone areas of Vietnam] Hanoi: Forest Inventory and Planning Institute. In Vietnamese.

Vu Van Can, Vu Van Dung and Le Van Cham (1999b) [Discovery of a new species of Cupressaceae,

Thuja quanbaensis sp. nov., from a limestone area in Ha Giang province]. Pp 12-13 in: Le Sau ed. [Protection and sustainable development of forest and biodiversity in limestone areas of Vietnam] Hanoi: Forest Inventory and Planning Institute. In Vietnamese.

Vu Van Dung and Nguyen Huy Thang (1999) [Proposal for a number of new nature reserves in limestone areas in Vietnam]. Pp 110-117 in: Le Sau ed. [Protection and sustainable development of forest and biodiversity in limestone areas of Vietnam] Hanoi: Forest Inventory and Planning Institute. In Vietnamese.