

The Heart of Borneo Initiative

Borneo is the world's third largest island, next to Greenland and New Guinea. It covers an area of approximately 745,567 square kilometers. Most of the island is Indonesian territory, which is Kalimantan (540,000 square kilometers); the rest is covered by the Malaysian states of Sabah (73,711 square kilometers) and Sarawak (124,449 square kilometers). Brunei Darussalam is also located in this island. Borneo straddles the equator and, as such, receives about 4,000 to 5,000 millimeter of rain every year. The climate is wet during the Southwest Monsoon from April to September, and even wetter during the Northeast Monsoon occurring from October to March. Humidity is constantly high, with daytime temperatures ranging from 25 to 35 degrees Centigrade in low-lying areas

1

Amidst this favorable climate lies a vast forested land, located right in the middle of Borneo. In being the entire island's lifeblood, where the headwaters of major rivers are located, the expanse came to be known as the "Heart of Borneo" (HoB). The HoB covers an area of 22 million hectares stretching across the territories of Brunei Darussalam, Indonesia and Malaysia. The three territories are inhabited by about 19 million people. The HoB Initiative is designed not only to protect the large area of forests, but also to provide food security and adequate water to its inhabitants.

In 2007, the governments of Brunei Darussalam, Indonesia and Malaysia agreed that the remaining vital areas of the rainforest needed protecting

2

. Through the World Wide Fund for Nature (WWF) and an international cooperation led by the Bornean governments, a network of protected areas and sustainably-managed forests was established. Resource assessments, science expeditions, community development and other related activities are continuously being undertaken to enhance the management and conservation efforts within the HoB.

HoB Biodiversity

The area is rich by virtue of its natural resources and the local culture. The rainforest has more than 15,000 species of flowering plants, including 3,000 species of trees, of which 267 are dipterocarps. The HoB is also home to 13 different primates, including orangutans and proboscis monkeys. It provides a habitat to 44 endemic mammals, such as the rhino and dwarf elephants; 39 endemic bird species; and over 160 species of fish. Moreover, in it may be found 100 endemic amphibian species, 47 lizards, and 41 snakes – all of which are endemic to the

Heart of Borneo

Written by

Thursday, 10 November 2011 10:57 - Last Updated Wednesday, 16 November 2011 15:21

territory. The Bornean mountains, which in itself cradle 24 endemic bird species, is classified as an Endemic Bird Area.

Most plant species in Borneo can be found in forest habitats. There are mangrove, peat swamp and freshwater swamp forests; lowland dipterocarp forests; ironwood forests; and hill dipterocarp forests. Borneo is also home to the largest heath forests in Southeast Asia

3

.

From 1994 to 2004, an expedition to the HoB discovered at least 361 new species of plants and animals. A total of 52 new species were discovered between July 2005 and September 2006, comprising 30 fish species, 16 ginger species, three tree species, two tree frog species, and one large-leaved plant species. Dipterocarps hold the greatest insect diversity in Borneo, where as many as 1,000 species could be found in just one tree

4

.

Borneo holds more than 2,000 species of orchids, over 50 species of the carnivorous pitcher plant, and two of the largest flowers in the world: the Rafflesia and the Amorphophallus.

The Lambir Hills National Park in Sarawak, Malaysia holds the record of having the highest tree diversity in the world. In just 0.52 square kilometers of forest in the 70-square kilometer park, a total of 1,175 species of trees has been recorded; and the prospect of even higher diversity elsewhere in the HoB is very likely

5

.

The most widespread mammals found are bats, with some 90 species. There are also 10 species of tree shrews (squirrel-like primates), 14 species of flying squirrels, and the mysterious Moonrat . The freshwater crocodilian *Tomistoma schlegelii*, a flagship species of the remaining peat swamp forest, counts Borneo among its last strongholds. It is also home to the Earless Lizard (*Lanthanotus borneensis*), a strange-looking semi-aquatic burrowing endemic species, whose natural history traits still remain unknown

6

.

The HoB is also inhabited by the Dayaks, locally interpreted as “interior” or “upriver” person. This term refers to the variety of indigenous peoples living in the area, each having a unique culture and language. When humans inhabited the island, their populations lived in hundreds of tribes across the islands. In Kalimantan alone, over 140 languages are spoken. Sabah natives have 50 languages and dialects, while those in Sarawak speak over 30 different ones.

Emerging concerns

In the mid-1990s, Borneo’s forest cover was calculated at 75 per cent. By 2005, only 50 per cent remained. Borneo lost an average of 850,000 hectares of annually within that 15-year period. It has been estimated that by the year 2020, Borneo would have lost about two-thirds of its forest cover.

Monitoring in Sabah revealed that orangutans are able to adapt to significant changes in habitats. Proof of this is that over 60 per cent of orangutan subpopulations occur in commercial forests outside protected areas. As such, over 55,000 of these primates still remain in numerous subpopulations in Borneo. However, a 2020 projection of forest loss showed that very few orangutan populations would exist by then.

In Malaysian Borneo, the average annual increase in the size of oil palm plantations was nearly eight per cent between 1998 and 2003, where over 1.6 million hectares of oil palms now exist in Sabah and Sarawak alone. In Kalimantan, the area planted to oil palm increased by 11.5 per cent or to nearly a million hectares in 2003

7

. The conversion of natural forests into other uses remains as one of the major causes of forest loss, and ultimately, to the loss of biodiversity in the region.

[See Heart of Borneo Map](#)

Endnotes

1

Pio, Dorethea. 2005. Borneo's Lost World: Newly Discovered Species on Borneo. WWF-Indonesia, Jakarta 2005 accessed on 17 March 2010 at <http://assets.panda.org/downloads/newlydiscovered-species-on-borneo25042005.pdf>

2

WWF-Cannon. 2010. Heart of Borneo: My Home, My Island, My Future. British High Commission Brunei Darussalam, CfBT, WWF, and International School Brunei accessed on 1 August 2010 at <http://heartofborneo.cfbt.org/bn/Heartofborneo/images/hobpamsec.pdf>

3

Rautner, Mario, Martin Hardiono, and Raymond J. Alfred. 2005. Borneo: Treasure Island at Risk. Status of Forest, Wildlife and related Threats on the Island of Borneo. WWF Germany, Frankfurt am Main, June 2005 accessed on 17 March 2010 at <http://www.worldwildlife.org/what/wherewework/borneo/WWFBinaryitem7589.pdf>

4

Pio, Dorethea. 2005.
op. cit.

5

Pio, Dorethea. 2005.

6

Pio, Dorethea. 2005.

7

Rautner, Mario, et. al. 2005.
op. cit.

Heart of Borneo

Written by

Thursday, 10 November 2011 10:57 - Last Updated Wednesday, 16 November 2011 15:21

ASEAN Centre for Biodiversity 2010. ASEAN Biodiversity Outlook, pp120-121. Los Banos, Laguna, Philippines. 2010.