

# Global Aspirations to Local Actions: Can Orangutan Save Tropical Rainforest ?

E. Purwanto<sup>1</sup> G.A. Limberg<sup>2</sup>

## Abstract

Flagship species are important icons for the international conservation lobby, because they are appealing, and need intact ecosystems for their survival. Orangutans are one such flagship species. However, its habitat continues to be threatened by development plans of both governments and companies. A pulp and paper company adjacent to the Kutai national park in East Kalimantan, complained that orangutans are increasingly a problem, destroying the young acacia trees of the plantation. To explore possible solutions they initiated discussion including a range of stakeholders to develop an orangutan survival action plan. This study presents the views of stakeholders on the importance of orangutans and conservation in general. We also examine examples from elsewhere in Indonesia to analyze the different approaches used by and incentives for stakeholders to participate in saving the flagship species and its habitat.

We conclude that international lobby and attention to flagship species does not reach the local stakeholders nor automatically translate into similar vision of stakeholders closest linked to the use and management of the flagship species habitat. This lack of interest and understanding leads to denial of the problem, limited understanding of the extend of the problem or partial solutions. International lobby will put pressure on big companies to adapt better practices, but the risks exists that they look for easy solutions and transfer the responsibility. The local government and population often perceive conservation as contradictory to development and of limited direct value.

What is needed in improve joint responsibility for public good such as conservation area? A mix of attention, incentives and pressure will be needed to ensure that key stakeholders to go beyond quick and superficial solutions.

**Keywords:** *flagship species, stakeholder engagement, orangutan conservation, Borneo, global policy-local action*

## Introduction

Tropical rainforest have always received special attention, due to the high biodiversity found in them and because they play a vital role in life on earth. Species in tropical rainforests provide us with food, medicines, shelter and a variety of other needs. One

---

<sup>1</sup> Kutai National Park Management Unit, e-mail: [dy\\_wanto@yahoo.co.id](mailto:dy_wanto@yahoo.co.id)

<sup>2</sup> Researcher Forests and Governance Program, Center for International Forestry Research, e-mail: [g.limberg@cgiar.org](mailto:g.limberg@cgiar.org)

estimate is that although the tropical rainforests only occupy 12% of the earth's land surface they contain perhaps 50% or more of the species on earth (Buttler, 2008). At the same time these forests are under great pressure from unsustainable and illegal logging, and conversion for other uses such as agriculture, commercial plantations and mining. Over recent decades the international world has increasingly realized the important role of the tropical forests for life on earth and initiated the conservation of the tropical rainforest (McKinnon, 1993).

The conservation movement often uses flagship species. These are in mostly large, charismatic mammals or birds relative well known to the general public, for example elephants, rhinos, tigers, and great apes. These species are used as icons to rally sympathy, attention and funds (see box 1).

#### Box 1: Use of flagship species to draw attention to conservation issues and raise funds

##### **Changing attitudes to gorillas and other wildlife**

Back in the 1970s I was closely involved in starting the **Mountain Gorilla Project**. **David Attenborough** had just returned from Rwanda where he had been filming the Gorillas for his TV series *Life on Earth*. And Digit, the 'star' had been killed by poachers. I was running the **Fauna and Flora Preservation Society** (now FFI) at the time, and he contacted me to see if we could do anything. We got together with a group, which included Sandy and Kelly Harcourt, (young gorilla researchers) Brian Jackman (a travel writer on the Sunday Times). As a result, an appeal was launched the following weekend in the Sunday Times, which raised several thousand pounds for gorillas. A clear demonstration of the effectiveness of using flagship species.

From: *Do Gorillas Help Conservation?* Using Flagship Species to Promote Conservation

John Burton, CEO of the World Land Trust, discusses the use of popular, 'cuddly' animals to raise funds for conservation. <http://www.worldlandtrust.org/news/gorillas.htm> accessed 10 May 2008

In this paper we examine how effective the international attention created around orangutans through campaigning has been to save the orangutan and its habitat. We start by looking at why and how orangutans are used as flagship species. We then use the example of the Kutai National Park and its orangutans to explain how different stakeholders have different views and interest related to the presence of orangutans and the conservation of its habitat. We link the international attention to the actions taken at the national level in Indonesia and how the two impact (or not) on the events in the field; what has been done, did it work or not and why? Based on this we come up with some suggestions how the movement to protect the orangutan and its habitat can be made more effective.

#### **Orangutans as a flagship species**

One flagship species that is featuring dominant in the struggle to conserve the last remaining rainforests in Sumatra and Borneo is the orangutan. Its cute and fluffy look together with its gentle appearance easily wins the sympathy of its human relatives. Together with the other great ape, gorillas, chimpanzees and bonobos, the genetical makeup of orangutan is very similar to humans, approx. 95% (Pickrell, 2002; Sept,

2004). As with other flagship species the condition of the orangutan population is used as an indicator of the overall status of its habitat, the tropical rainforests of Sumatra and Borneo (see box 2).

#### Box 2: Use of orangutan as flagship species to protect tropical forests

“...*Noting* that orangutans can be used as a flagship species to curb and prevent further forest loss and habitat conversion in North Sumatra and Aceh provinces, ...”  
from Sumatran Orangutan Conservation Action Plan workshop, meeting in Berastagi, North Sumatra, Indonesia, from 20-23 September 2005 at  
[http://www.conservation.or.id/home.php?catid=23&tcid=270&page=g\\_peluang\\_detail](http://www.conservation.or.id/home.php?catid=23&tcid=270&page=g_peluang_detail) accessed 26 April 2008

“.....WWF Indonesia's Species Programme aims to ensure the survival of populations of Javan and Sumatran Rhino, Sumatran Tiger, Sumatran Elephant, Orangutan, marine turtles, and cetaceans, as well as to ensure sustainable use of tree species such as Gaharu and Ramin in Indonesia. By saving these flagship species, thousands of other species and their important ecosystems and landscapes will be saved as well. ... “

from Program Spesies WWF Indonesia

[http://www.wwf.or.id/index.php?fuseaction=whatwedo.species\\_about&language=i](http://www.wwf.or.id/index.php?fuseaction=whatwedo.species_about&language=i) accessed 26 April 2008

“..... The [Nature] Conservancy has chosen the orangutan as a “flagship species,” around which it is basing its efforts in the forests of East Kalimantan. Successful protection of orangutan habitat is then also a measure of success in the conservation of representative biodiversity at the landscape level. .... “

from factsheet: Orangutans in East Kalimantan <http://www.nature.org/pressroom/files/orangfacts.pdf> accessed 26 April 2008

#### **Orangutan conservation and it's problems**

Great efforts have been made both by international donor organizations and conservation organizations from abroad and Indonesia. However, all this attention for the orangutan has not yet touched at the core of the problem. Equally the Indonesian government has produced many policies and regulations that are counterproductive for orangutan protection.

The decline of orangutan population is taken very seriously at the international level. IUCN has categorized the Sumatran orangutan as “critical endangered” while in Borneo they are categorized as “endangered” (IUCN, 2002). The orangutan is also on the Appendix I CITES (*Convention on International Trade in Endangered of Wild Species of Fauna and Flora*) meaning that no orangutan or any part of it is to be traded. This campaign has increased the awareness and concern of the public at large, proven by the generous amounts of funding from NGOs and government donor agencies for orangutan conservation. For example during the COP 13 meeting (December 2007) the American government pledged \$ 8 million for the orangutan conservation services program. People concerned about orangutan, tropical rainforests and indigenous people

are increasingly debating the potential negative impacts of biofuel development on these.

In Indonesia the conservation of orangutan dates back to the Dutch colonial time (1924) and extended by the *Peraturan perlindungan Binatang-Binatang Liar 1931* (Regulation of Protection of Wildlife) (*Staatsblad* 1931, No. 226 jis. 1932 N0.28 dan 1935 No.513). This protection concerns not only the live animals but also any body parts. Over time the number of regulations has increased e.g. Law no. 5/1990, Ministerial decree 10 June 1991, Ministerial decree no. 301/Kpts-II/1991 and Government Regulation no. 7 / 1999.

In Indonesia a total of 10 orangutan rehabilitations centers have been build, initiated and supported by funding from abroad. The aim of these centers is to rehabilitate confiscated and wounded orangutans. This was seen as a first step towards resolving the orangutan problem. Presently, however, the rehabilitation centers are experiencing increasing problems to fulfill their role, up to the point that Borneo Orangutan Survival Foundation (BOSF) rehabilitation centers in Samboja (East Kalimantan) and in Nyaru Menteng (Central Kalimantan) can not accepted any new animals because they are overcrowded already. This is caused by the lack of appropriate sites to release orangutans that are rehabilitated. As a matter of fact the conversion of orangutan habitat still continues, resulting in even more orangutans being captured and in need of rehabilitation and release sites.

The Indonesian government has tried to support orangutan conservation both in situ and in the rehabilitation center by issuing regulations and trying to stop trade in orangutans. To implement these policies several action plans have been developed, the latest "*Strategi dan Rencana Aksi Konservasi Orangutan Nasional untuk Tahun 2007 - 2017*" (National Strategy and action plan for Orangutan Conservation 2007 – 2017), was launched during the COP 13 meeting in December 2007 in Bali. The execution of these actions plans, however, often fails and the action plans remain mere documents filling filing cabinets.

Recently law enforcement has increased. This is an important step to suppress or even stop the trade in baby orangutans as pets. This has had the unforeseen impact that the number of pet orangutans that is voluntarily returned increased dramatically. Because there is no space or funding available to properly rehabilitate these animals the related offices face a big problem. They clearly face a dilemma: if they do not enforce the law hunting and trading will continue. If they do enforce the law and are not prepared to handle the situation it which may result in negative publicity about orangutan conservation and weakened support by others or even apathy.

A good example of this is the condition in and around Kutai National Park. This area in East Kalimantan was initially proposed as a wildlife reserve to protect big mammals such as the Sumatran rhinoceros, *banteng*, proboscis monkey, gibbons, and orangutans. Based on the distribution of these species an area of 2 million hectares was proposed for protected. Over time due to economic development the total acreage has

decreased and presently only 10 % remains. This decrease in acreage has resulted in increased pressure on the remaining area, especially as a habitat for all these species, and in the 1980's the Sumatran rhino was declared extinct in this area (Wirawan, 1985). The orangutans are facing a similar fate where their populations continues to decline, especially due to the fires in the severe El Niños of 1982/83 and 1997/98. The orangutan population in the Kutai National Park is now estimated to be 600 animals (PHVA in Soehartono et al., 2007).

Beside the decrease of the orangutan population inside Kutai NP, increasingly there are 'conflicts' between the local development needs and the interest of orangutan habitat conservation. For example there are several cases where orangutan populations are found in pulp or palm oil plantations causing in significant loses for the companies, resulting in the companies regarding the orangutans as a high risk liability. A little mistake in managing orangutans in their concession can have severe consequences due to international loss of image. Companies tend to look for easy solution to this problem.

Two plantation companies operating adjacent to Kutai NP, PT Surya Hutani Jaya and Sumalindo Hutani Jaya, are facing this problem. PT Surya Hutani Jaya is a pulp plantation of 156.000 hectares, directly bordering to west and south of the Kutai NP. It has reported significant damage to its acacia plantation by orangutans. Each hectare of young *Acacia mangium* that is severely damaged by feeding of orangutan incurs a loss of 7 to 8 million rupiah (almost \$1,000). So far already over 25 hectares have been completely damaged.

The PT Sumalindo concession, adjacent to PT SRH but is not directly bordering Kutai NP, is also a pulp plantation planting *Acacia mangium*. Of their total area of 70,000 hectares just 10,000 hectares has been planted and they are already experiencing "disturbances" by orangutan that are more severe than in the PT SRH concession.

The orangutan population in the PT Sumalindo and PT SRH concessions is significant (both estimated at over 100 animals). Given the present condition those areas are not ideal for orangutan and without human intervention the chance of survival are very slim. The private sector starts to realize the potential bad impact the wrong handling of orangutans can have. For example PT SRH, which is part of PT Sinar Mas Forestry has taken initiative to try to resolve their orangutan problem. They started to cooperate with the Natural Resource Conservation Office (BKSDA) and the BOS Foundation to relocate orangutans to Kutai NP. In an effort to deal with this problem the two companies have requested assistance from the government and Borneo Orangutan Survival Foundation to capture and relocate orangutans. PT Sumalindo has so far relocated 28 orangutan and PT SRH at least 16 animals to Kutai NP.

It turned out that this method was not effective and rather expensive (over \$ 1,000 for rescue of 1 animal and \$ 140 per month during rehabilitation). PT Sinar Mas has experience with a similar problem in Sumatra of a tiger and elephant problem in their concessions and a working group was set up. They initiated a meeting at the Kutai NP

headquarters (15 August 2007). PT Sinar Mas Forestry invited several organizations i.e. other companies with similar problems, conservation NGOs, related government services and academics, to assist them in identifying a solution for their problem. A bigger follow up meeting was conducted resulting in the formation of a working group orangutan with the task to: (1) collect baseline data, (2) propose an action plan (for in situ and ex-situ conservation), (3) institutional arrangements (divisions of roles), and (4) organize a workshop. A range of companies that face the same problem are involved: PT. Sumalindo Hutani Jaya (PT SHJ), PT. Kaltim Prima Coal (PT KPC, coal mine), PT. Indominco Mandiri (coal mine), PT. Badak NGL (natural gas liquefier plant) and PT. Pupuk Kaltim (fertilizer plant).

The working group has proven effective in collecting data on the number of orangutans in the two concessions (PT SRH and SHJ) and facilitated one survey in the PT SRH plantation. BOSF and The Nature Conservancy (TNC) designed the survey and TNC, the Kutai NP management unit, the natural resource conservation office and PT SRH implemented the survey. During the last meeting draft recommendations for orangutan and habitat conservation were produced.

Despite this great international attention and the protection under the Indonesian law the orangutan population and the condition of its habitat are constantly declining. The conversion of forests for economic activities such as pulp plantations, oil palm plantations and mining compounded by the regular forest fires that occur in Indonesia have resulted in a crisis of the orangutan habitat. Concern about the fate of the orangutan has not been translated to the grassroots' level, the people who live there or work on the plantations or in the mines.

## **Different perspectives on the importance of orangutans**

### **The international conservation movement**

Orangutans started to receive attention with the initiation of research by Rijksen in Ketambe, North Sumatra (1971) and Biruté Galdikas in Tanjung Puting, Central Kalimantan (1972) (Meijaard et al., 2001). Gradually orangutans developed into an icon in the struggle to save the tropical rainforests, especially in Sumatra and Borneo, their habitat. Documentaries tend to provide a black and white picture: survival of orangutans and its habitat must be supported at all costs because they are under imminent threat. Sometimes the documentary features the heroic saviour fighting a lonely struggle. Anyone who does not support this struggle is portrayed as the enemy, local people, ruthless companies that destroy orangutan habitat, forest ranger that are not able to stop encroachment or stop orangutan hunting, government offices that do not seem to care.

### **The Indonesian government**

In its push for national development since Independence in 1945, Indonesia has relied heavily on natural resource exploitation to provide the much needed funds to pay for national development. Unfortunately the natural resource exploitation was not properly managed. This resulted in huge profits to a small group of businesspeople, while the

people remained poor, and a lack of enforcement of regulation allowed companies to cut corners. Many companies were solely interested in obtaining the maximum profit in the shortest possible time without concern for long term business prospects, let alone the condition of creatures such as orangutans.

Another effort by the Indonesian government to try to protect the orangutan and its habitat were through the establishment of protected areas (national parks, nature reserves and wildlife reserves). With the increasing threat to Indonesian rich biodiversity the number of conservation areas has continued to increase; during the World National Park Congress in Bali, 1982 the Indonesian government declared 11 national parks. Now the number has increased to 50 and there are still a number of proposed national parks. National parks face a series of problems, starting from the moment they are designated, because they are designated without proper consultation with local key stakeholders, its boundaries are often not well defined resulting in overlap with adjacent land users.

Another problem is law enforcement. Since the political reform and decentralization law enforcement has become increasingly problematic. There are many instances where the local government and/or local people act well beyond their authority and often forget (or are unaware of) the bigger picture such as national interest, long term interest or environmental issues. The lack of law enforcement, amongst others, has resulted in on going hunting and trading of wildlife, including orangutans. Actually due to the increased rarity of orangutans its price (as a pet) has gone up. Despite the decline of the population in the wild there is an increasing number of reports of orangutans in captivity, both in the countries of origin (Malaysia and Indonesia) or neighboring countries such as Singapore, Thailand and Vietnam. This suggests that the illegal trade is still thriving, but maybe also that law enforcement is improving as more of the cases are uncovered.

### **Local people**

Many local people consider sustainable development and environmental issues not pressing matters. They are focused on immediate needs (or wishes) and not on conservation of orangutan habitat or orangutan itself. This point of view is clear in the expression "*mana yang lebih penting menyelamatkan orangutan atau kami?* (What is more important to save orangutan or us?)" (Kompas, 1999) often used by representatives of local people during events discussing conservation. This shows resentment of communities against concern for animals when they too are suffering. The people that have settled inside the Kutai NP consider the orangutan as of no importance or value to them. Sometimes they regard them as their enemy, because supposedly the protection of orangutan limits (and actually prohibits) the people to cultivate land inside the national park<sup>3</sup>. So far there have been no reports of people

---

<sup>3</sup> It should be noted that according to the law people are not allowed to cultivate inside a national park. People sometimes simplify the matter as if the Kutai National Park were solely established for the conservation of orangutans and other wildlife.

killing orangutans, because nobody has ever been threatened by an orangutan. Since there have been several instances where people in and around Kutai NP were keeping a baby orangutan obviously people are capturing and possibly trading orangutans. In other areas there are reports that a baby orangutan fetches approx. 3 million rupiah (approx. \$ 325) while at the international market they demand an estimated \$ 50,000 (SCTV, 2005; RIC-Sulawesi, 2007). These prices are very attractive to local people to obtain additional income (esp. because average monthly wages are below 3 million rupiah).

### **Companies**

Companies, esp. pulp and palm oil plantations view orangutans as an encroacher that harms their business because they destroy young plants. As a staff member of the Borneo Orangutan Survival Foundation put it:

*“It is already fortunate if a company is willing to request assistance to relocate the orangutan. They, the orangutan can be saved through the efforts of staff that transfers them to a rehabilitation center in Nyaru Menteng, Palangkaraya. The company can help with the cost of the rescue “ Masih untung jika ada perusahaan mempunyai itikad baik dengan meminta pihak terkait merelokasi orangutan. Mereka bisa tertolong dengan upaya penyelamatan oleh petugas yang memindahkannya ke lokasi rehabilitasi, di Nyaru Menteng Palangka Raya. Perusahaan bantu dengan biaya rescue “ (Banjarmasin Post, 2007. Translation by author)*

Initially to resolve the orangutan problem the companies involved the Natural Resource Conservation Office and Borneo Orangutan Survival Foundation to assist with relocation of orangutans. The companies were hoping that by moving the orangutans the lives of the orangutan would be better guaranteed and their business would not suffer any further losses. To PT Sumalindo a proposal to relocate the orangutans to their logging concession was unacceptable, because they do not have qualified / experienced staff. Another consideration was that this logging concession has been awarded Forest Stewardship Council ecolabel. The presence of the orangutans would mean an additional management risk, although would not directly incur financial costs. The relocation to the logging concession will mean more effort and risks for the next FSC assessment.

The presence of logging concessions, pulp and palm oil plantations opens access to forest and conservation areas, facilitating hunting, wildlife trade and illegal logging that all increase the pressure on the orangutan population (Meijaard et al, 2005). This problem has increased with political reform and decentralization. During the New Order regime companies could resort to repressive methods including the involvement of security personnel. This approach is no longer acceptable resulting in bigger freedom to the people and problems on the side of the companies to secure their operations (Wulan et al., 2004).

The case of Kutai NP illustrates that the perception of local people and the business sector towards orangutans does not support their survival.

### **Local Government**

Before political reform and decentralization the district government did not have authority to decide on natural resource management in its territory. This has changed with Law no. 22 / 1999 on local government, which devolves great authority to the district government. At almost the same time several new districts were formed. Kutai district was divided into 3 new districts and one municipality. According to local government officials development of an area and success as a district head is measured by the economic growth rate (and the construction of fancy infrastructure). They increased locally generated revenues by providing companies ample opportunity to exploit natural resources. In the case of East Kalimantan the main sources of income are: oil and gas, coal mining, timber and palm oil plantations. Local governments tried to convert as much forest areas as possible to plantations and mining concessions to maximize revenues.

This was done without considering other interests, such as conservation or the need to develop the income sources for the people. The private sector was stimulated to expand their concessions because of the increase of commodity demand and prices on the world market. This has resulted in many cases of overlap between concessions and the habitat of flagship species, such as Sumatran tigers, elephants and orangutans, eventually causing the use of the term “the conflict between humans and elephants” and “the conflict between humans and tigers”. Even an dramatic rise in reports on killing of flagship species, e.g. orangutans in Central Kalimantan (Antara news, 2007; Tobing, 2007; Republika, 2007; Soedarjo, 2007; ), and elephants in Sumatra (Departemen Kehutanan, 2002; kapanlagi.com, 2007; Kompas, 2007; Sinar Harapan, 2007; Uryu et al., 2008)

### **Why did some things not work?**

The initial focus of the orangutan conservation movement was geared towards the survival of the species. The strategy developed was to stop trade in orangutan, confiscate pet orangutans, rehabilitate them and reintroduce them into the wild. In support of this strategy orangutan and wildlife rehabilitation centers were built. Some of those centers were the initiative of NGOs. In hind sight this strategy was like fire fighting, because it did not touch the underlying causes of orangutan survival in its original habitat. The number of orangutans in the rehabilitation centers continued to increase over time: in 2005 already 765 in 4 rehabilitation centers (Menteri Kehutanan, 2005) and early 2008 796 animals (Nanang Qosim, pers. comm.). It was envisaged that this strategy would be used for a limited period of time. But eventually until today the rehabilitation centers are still very much needed.

One of the bottlenecks is that there are no potential areas for release of orangutans, as most of the lowland areas have been assigned to logging concessions or converted for agriculture and plantations and most of the protected forests are less suitable due to the

steep terrain. Furthermore regulations (Standard Operational Procedure) for orangutan release are not clear. Identifying appropriate areas for orangutan release is difficult because it has to fulfill a set of criteria, amongst others: (1) appropriate vegetation and geography (lowland and flat terrain), (2) sufficient carrying capacity to support the orangutan, (3) the long term conservation of the areas must be guaranteed, (4) sufficient distance from human settlement to avoid renewed contact with humans and (5) there should be no natural orangutan population (to avoid the risk of contamination of diseases to the natural population).

Another obstacle hampering the orangutan conservation efforts is that the relations between key stakeholders and others who care about the fate of the orangutans are not optimal. Prejudice and suspicion are common place, e.g. the suspicion of various organization of the determination of the Ministry of Forestry related to orangutan conservation in Indonesia and the accusations that some officials are involved in illegal wildlife trade (Gatra, 2006). There is concern that if funds were to be channeled through the Ministry of Forestry that the management would not be appropriately used. On the other side there exists the suspicion that orangutan conservation has become big business and an easy target for fund raising by big international conservation NGOs (Fadli, 2007; Burton, n.d.). Some complain that the conservation organizations act beyond their authority, or even act as if they are the supervisors of the government services that do have the authority (Gatra, 2006). This condition results in reluctance to cooperate amongst actors that are pursuing the same cause and the risk of duplication, lack of resources, lack of developing an effective overall strategy and role division.

For companies who operate in areas that are orangutan habitat, it is far easier to donate funds to a conservation organization than to apply orangutan conservation in the field, because that will require bigger sacrifices such as relinquishing some part of the concession, allocating staff time, organize special trainings etc. In situ conservation also constitutes a far greater risk for the company. Compared to this a donation to a conservation organization is cheaper and the chances of receiving positive appreciation by the government and the environmental movement are higher.

The real cause that the orangutan conservation efforts have born limited fruits is because the underlying caused are complex and more difficult to influence, the development paradigm that is focused on economic progress and disregard sustainable development, like expressed by the governor of Central Kalimantan:

"Moreover, what we have tried to conserve here would be pointless if the central government, in this case the Forestry Ministry, keeps issuing massive concession permits," he said. (Soedarjo, 2007)

Another problem is to explain to most ordinary people, such as locals, what the significance or importance is of orangutans. The direct impact of orangutan extinction in the ecosystem may be limited or not be noticeable for a long period. The main appeal will be to values and ethical considerations. Again the orangutan can be used as a symbol of degradation and depletion of natural resources that sooner or later will have an impact on welfare and well-being.

### **Can orangutans help to save the tropical rainforests?**

Given all the problems that we mentioned above is it realistic to expect that using orangutan can contribute to conservation of tropical rainforests? Orangutans remain a figure that easily solicits sympathy from anybody, starting from the international public to children living in the jungle close to orangutans. Its similarities to humans, its gentle manners and its behaviour stimulate people into action. This is a good starting point to use orangutans as icons in conservation campaigns. Orangutans need big home ranges. This need should be considered when spatial plans are being drawn, conservation and development should be integrated in the land use plan: there should be a core zone for orangutan conservation with minimal human interference, surrounded by development zones that consider environmental aspects including sufficient space for orangutans to survive.

As demonstrated in this paper conservation, in particularly orangutan conservation can not be done partial and individual by different actors because a large number of stakeholders influence the orangutan population and its habitat. A multistakeholder, collaborative approach, across sectors is needed from the international level to the local level. Since the overall outcome largely depends on the actions of stakeholders in the field, every strategy has to consider field conditions carefully.

How can an integrated management plan be achieved and what is the role of different actors? And how can we use orangutans as a rally point?

#### **International public**

A starting point to explain the broader pictures of interrelated problems, including poverty and ignorance or indifference of local people that may result in involvement in hunting, trading or encroachment into orangutan habitat.

- Support government and non governmental organizations that have programs to save orangutans and it habitat and also increase the well-being of the local people.
- Pressurize companies through media campaigns demand stricter implementation of the Convention on International Trade in Endangered Species (CITES).
- Pressurize to cease the exploitation of orangutans for entertainment that in turn can stimulate illegal trade.
- Boycott of products from companies known to not care for orangutan conservation in their concession.

#### **Private sector**

Companies, especially big ones, can not ignore orangutans on their concession, because of the high international attention and the impact on marketing could be disastrous. This concern is a good starting point for orangutan conservation. Most companies lack experience with this issue and they need assistance from others more experienced. Companies should be given the advantage of the doubt, although has to be taken to avoid mere greenwashing with little positive outcomes for the orangutan population or the environmental in general. The experience in Kutai NP provide some

suggestions for possible action to support the private sector to become more orangutan friendly. For example several documents exists to direct the handling of the orangutan issue in concessions, for example:

- Better Management Practices guidelines (Yuwono et al., 2007)
- Orangutan Action plans, starting from the national action plan (Soehartono, 2007) to the local level "Strategy and action plan to save the orangutan and its habitat in and around Kutai NP" (*Strategi dan rencana aksi Penyelamatan orangutan dan habitatnya di dalam dan sekitar TN Kutai*) (BTNK, 2007)
- Establishing a working group like the one initiated by PT Sinar Mas Forestry in East Kalimantan Timur was an effective start for a multistakeholder and collaborative approach.
- Design corridors between protected areas and small forest remnants (high conservation value forest) in the concession areas. A discussion has started on how to develop a corridor system that will connect these remnants to the Kutai NP, in an effort to save the orangutan population and reduce damage to the plantation. The working group has also been instrumental to involve NGOs with the know-how as partners.

### **Government**

At the national level orangutans are getting into the picture, as Indonesia is criticized over the way the deal with orangutan conservation. This critique is related to the global discussion on climate change and the rapid deforestation including areas that are orangutan habitat.

- Consistency of policies, i.e. key orangutan habitat is properly protected in land use plan and no permits are overlapping with orangutan habitat
- Development of regulations enhancing orangutan conservation, e.g. regarding management of bufferzones between protected areas and companies, obligation to develop corridors between concessions and protected areas
- Better law enforcement at all levels, from Jakarta to the jungle, is essential.
- Local governments have to be engaged to support and implement the policies to save the orangutan and its habitat
- Incentive mechanisms for districts containing large areas of orangutan habitat. Possible incentives could be subsidies from state budget, based on acreage of conservation area in the district, payment for environmental services, Reduction of Deforestation and Forest Degradation (REDD). Often prime orangutan habitat (peat forests) is also very important because of the carbon stock that they contain. Two important issues that need to be resolved are guarantee that the main stakeholders will cooperate to protect the area and a mechanism to divide the payment amongst these stakeholders. There is huge potential, but a lot will depend on how the present pilot projects will succeed whether or not more of these schemes will be developed in the future.

### **People living near orangutan habitat**

At the community level orangutans are a good starting point for environmental awareness campaigns, esp. for children in areas close to orangutan habitat. Children are easily moved by orangutans and sympathize with them. Of course parents and

other adults should be involved as well, although the percentage of adults changing their behaviour might be relative small.

- Environmental awareness campaigns, focusing on the direct impact of environmental degradation on the community
- Law enforcement: At this moment the main negative impact of local people on the orangutan population is linked to hunting. Hunting occurs because there is a market for baby orangutans. So beside the need to eliminate (or at least reduce to a minimum) the trade, strict enforcement in the field is needed
- Alternative livelihoods identification and development: this can include involving the local population in development of tourism related to orangutans and protected areas

### **Conclusion**

Orangutans are important as a flagship species because they are very appealing to animal lovers and conservationist in developed countries. This support is crucial to ensure that sufficient funds are available for activities in the field and to support and pressure if necessary government agencies to implement the existing policies. There is the risk, however, that the use as a flagship species is too successful and all attention focused on the one species or even to the individual animals. The value of a species as an indicator for the condition of its habitat is lost!

“For instance, although Indonesian legislation prohibits killing of protected species, it is still possible to destroy the habitat of such species outside protected areas, apparently one excuse for this oversight is that no one has yet demonstrated that those destroying habitat are responsible for species loss” (Meijaard and Sheil, 2007)

On the ground the use of orangutan as a flagship species has not yet resulted in changes. Orangutans are not regarded as creatures (quite close to humans) that can and should be provided space to survive. Often orangutans are ignored as long as they are not causing loses, sometimes they are chased away or even killed, because they are perceived as pests and sometimes they are a source of income through illegal trade. Local governments and communities seldom regard orangutans as an asset of the area, something to be proud of. During decentralization economic indicators are the only measures for success.

Creative ways have to be developed to involve these key stakeholders. (1) Local governments may be won for this cause by providing the right (financial) incentives through subsidies by the Indonesian government or international payments schemes. (2) Companies with applying better management practices could get tax reduction, priority in processing of administration etc. Premium prices on the international markets are another option. (3) For the local people environmental education for children is a good option, awareness campaigns for adults are important, sometimes incentives or compensation might be possible, but law enforcement is a must.

General interest in biodiversity conservation by focusing on large, well-loved, charismatic mammals like the tiger, the great apes, rhinos and elephants can be effective. The campaigns should not be limited to highlighting these flagship species, but should also stress that saving them involves protecting their habitat and all the other species that live there. In practical terms this means collaboration between key stakeholders in banning harmful trade, protecting against poachers, effective law enforcement, public education, and involvement of local populations. Only then can the use of a flagship species be helpful in saving its habitat.

## References

- Antara news, 2007; 1.500 orangutan Katingan terancam mati (1,500 orangutans in Katingan threatened to death). Antara news, 27 March 2007.
- Banjarmasin Post, 2007: Habitat Orangutan Terus Tergusur - Harus Berdesak-desakan di Kandang (Orangutan habitat continuously destroyed – They are squeezed in cages). Banjarmasin Post, August 29, 2007
- BTNK, 2007; Strategi dan rencana aksi Penyelamatan orangutan dan habitatnya di dalam dan sekitar TN Kutai (Strategy and action plan to save orangutans and its habitat in and around Kutai National Park). Balai Taman Nasional Kutai, Bontang, Kalimantan Timur, Indonesia
- Broadhurst, C., 2007: Released orangutans face shrinking space. The Jakarta Post, May 29, 2007
- Burton, J., n.d.: Do Gorillas Help Conservation? Using Flagship Species to Promote Conservation. World Land Trust, Suffolk U.K.  
<http://www.worldlandtrust.org/news/gorillas.htm> accessed 9 may 2008
- Buttler, R. 2008; Tropical Rainforest of the World.  
[www.rainforest.mongabay.com/0101.atm](http://www.rainforest.mongabay.com/0101.atm) accessed 26 April 2008
- Departemen Kehutanan, 2002: Siaran Pers nomor 757/II/PIK-1/2002 Selamatkan Harimau, Badak dan Gajah (Press release Save the tiger, rhinoceros and elephant). Departemen Kehutanan 6 August 2002
- Fadli, 2007; Perselingkuhan Konservasi (Conservation Conspiracy), 24 February 2007. <http://timpakul.blogspot.com/2007/02/perselingkuhan-konservasi.html> accessed 28 April 2008
- Gatra, 2006; Membungkam Anjing Penjaga (To shut up the watch dog). Gatra, 22 Mei 2006
- IUCN, 2001; IUCN Redlist Categories and Criteria: version 3.1. IUCN Species Survival Commission. IUCN, Gland, Switzerland and Cambridge, U.K.
- Kapanlagi.com, 2007; Konflik Gajah Sumatra dan Manusia tewaskan 42 warga (Conflict between Sumatran Elephant and Humans killed 42 people).  
<http://www.kapanlagi.com/h/0000188650.htm> accessed 27 April 2008
- Kompas, 1999; "Kami tak mau kucing-kucingan lagi". ("We do not want to hide anymore") Kompas, 19 Juli 1999.
- Kompas, 2007; Gajah di Tesso Nilo Terancam (Elephants in Tesso Nilo National Park Threatened). Kompas, October 4, 2007
- Marshall, K., White, R. and Fischer, A., 2007; Conflicts between humans over wildlife management: on the diversity of stakeholder attitudes and implications for conflict management. Biodiversity Conservation (2007) 16:3129–3146 DOI 10.1007/s10531-007-9167-5
- McKinnon, J. and McKinnon, K., Child, G., and Thorsell J., 1993; Pengelolaan Kawasan yang Dilindungi di Daerah Tropikal (Management of protected areas in the tropics). Gajah Madah University Press, Jogjakarta, Indonesia.
- Meijaard, E., Rijksen, H.D., and Kartikasari, S.N., 2001: Di ambang Kepunahan. Kondisi Orangutan Liar di Awal Abad ke-21. Indonesian version of Our vanishing relative. The status of wild orangutans at the close of the twentieth century. Gibbon Foundation Indonesia, Jakarta, Indonesia, 2001

- Meijaard, E., Sheil, D., Nasi, R., Augeri, D., Rosenbaum, B., Iskandar, D., Setyawati, T., Lammertink, M., Rachmatika, I., Wong, A., Soehartono, T., Stanley, S., O'Brien, T., 2005: Life after logging - Reconciling wildlife conservation and production forestry in Indonesian Borneo. CIFOR, Bogor, Indonesia, 2005
- Meijaard, E., and Sheil, D., 2007: Is wildlife research useful for wildlife conservation in the tropics? A review for Borneo with global implications Biodiversity and Conservation Volume 16 Number 11 (s): DOI : [10.1007/s10531-007-9161-y](https://doi.org/10.1007/s10531-007-9161-y) Page: 3053 – 3065
- Menteri Kehutanan, 2005; Sambutan Menteri Kehutanan pada Acara Deklarasi Pekan Peduli Orangutan, Jakarta 16 November 2005 (Speech of the Minister of Forestry during the Declaration of the Care for the Orangutan Week, Jakarta 16 November 2005).
- Pickrell, J., 2002: Humans, Chimps Not as Closely Related as Thought? National Geographic News, September 24, 2002  
[http://news.nationalgeographic.com/news/2002/09/0924\\_020924\\_dnachimp.html](http://news.nationalgeographic.com/news/2002/09/0924_020924_dnachimp.html) accessed 10 may 2008
- Republika, 2007; Kebijakan Biodiesel mengancam Orangutan (Biodiesel Policy threatens Orangutans). Republika 23 Mei 2007
- RIC-Sulawesi, 2007; Orangutan menanti ajal (orangutan awaiting its fate).  
[www.Alamsulawesi.net/news.php?id=379](http://www.Alamsulawesi.net/news.php?id=379) accessed 26 April 2008
- SCTV, 2005: Busines sitaan satwa langka bagi sang pelestari (The confiscation business of rare animals for conservationists).  
[www.mobile.liputan.com/?c\\_id=8&id=114394](http://www.mobile.liputan.com/?c_id=8&id=114394) accessed 26 April 2008
- Sept, J., 2004: Classic Primate Taxonomy, lecture material at Indiana University  
[http://www.indiana.edu/~origins/teach/A105/lectures/L8\\_A105\\_2004apes.PDF](http://www.indiana.edu/~origins/teach/A105/lectures/L8_A105_2004apes.PDF) accessed 10 May 2008
- Simamora, A.P., 2007: Global warming brings additional woes to orangutans . Jakarta Post 8 October 2007
- Sinar Harapan, 2007; Gajah Sumatera dan Kalimantan Terancam (Sumatran and Bornean elephants threatened). Sinar Harapan, August 29, 2007
- Soehartono, T., Susilo, H.J., Andayani, N., Atmoko S.S.U., Sitihe, J., Saleh, C., Sutrisno, A., 2007; Strategi dan Rencana Aksi Konservasi Orangutan di Indonesia 2007 – 2017. Dirjen PHKA, Departemen Kehutanan, Jakarta, Indonesia
- Suzuki, A., 1994. Feeding Adaptations of Orangutans after the Forest Fires in East Kalimantan in Azuma, S., (ed.), 1994. Early Recovery Process of Kutai Ecosystem – A preliminary report. Kyoto University, Kyoto, Japan.
- Tobing, S., 2007; Populasi Orangutan Terancam Konsesi Perkebunan Sawit (Orangutan population threatened by palm oil plantations). Koran Tempo, 26 Juli 2007
- Wirawan, N., 1985; Kutai National Park Management Plan 1985 – 1990. Direktorat Jenderal PHPA, WWF dan IUCN. Bogor, Indonesia
- Uryu, Y., et al., 2008; Deforestation, Forest Degradation, Biodiversity Loss and CO2 Emissions in Riau, Sumatra, Indonesia. WWF Indonesia Technical Report, Jakarta, Indonesia

Wulan, Y.C., Yasmi, Y., Purba, C., Wollenberg, E., 2004; Analisis Konflik di Sektor Kehutanan 1997 – 2003 (Analysis of conflicts in the forestry sector 1997 – 2003). CIFOR, Bogor, Indonesia

Yuwono, E.H., Susanto P., Saleh C., Andayani N., Prasetyo D., Atmoko S.S.U., 2007: Guidelines For The Better Management Practices On Avoidance, Mitigation And Management Of Human-Orangutan Conflict In And Around Oil Palm Plantations *Petunjuk Teknis Penanganan Konflik Manusia-Orangutan Di Dalam Dan Sekitar Perkebunan Kelapasawit*. WWF Indonesia, Jakarta, Indonesia