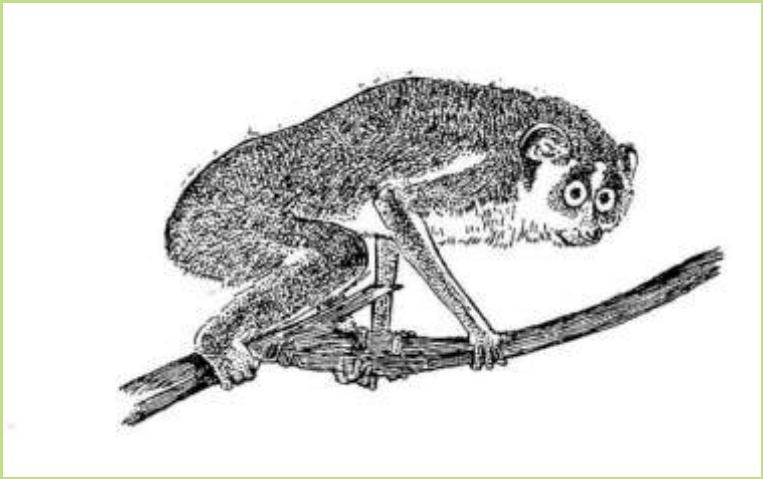
WORKING PAPER

Integrated Conservation Development Projects for Biodiversity Conservation: The Asia Pacific Experience

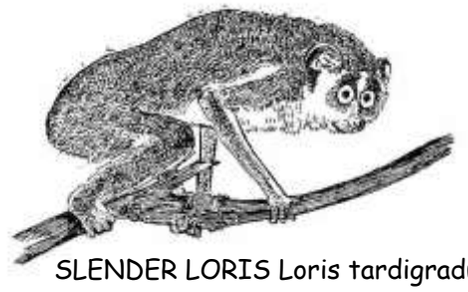
Shekhar Singh

WOR/E&F-WL/1995



RAAG

Research, Assessment and Analysis Group



SLENDER LORIS Loris tardigradus

Scripted in February 1995, it was prepared at the request of the World Bank, Washington DC, and submitted by the Bank to the Ministry of Environment and Forests, Government of India.this report essentially describes some of the main issues involved in the preparation of Integrated Conservation and Development Projects (ICDP) in Asia, with the purpose of helping countries prepare better ICDPs. Though drawing heavily on the "Workshop on Biodiversity Conservation Projects, Development and Strategy - Asia Pacific Region", held in Padang, Indonesia (June 16 - 20, 1994), it also reviews some of the writings on the subject (see references) and the proceedings of an earlier, similar workshop held in Washington D.C. (January, 1994).

The sketch on the cover is by Pratibha Pande.

TABLE OF CONTENTS

1. BACKGROUND

The conservation of wilderness areas in their pristine form has been an imperative in all human societies, with the possible exception of the city states of ancient Greece. Ancient civilisations were not always able to define the reasons why they thought it important to conserve natural areas and ecosystems. Perhaps, at some level, it was and is a primordial need. The fact that nature and natural objects were often deified or wound up with myths and fables aimed at promoting their conservation, seems to suggest a complex view of nature involving the spiritual, the cultural and the aesthetic sensibilities of human societies, apart from their rational ones. Arguably, much of this still remains, though the imposition of State control and governance over what was formerly an area of local, community, concern has perhaps inhibited its affectivity. Social injustice and poverty, in many parts of the world, have also contributed to the straining of traditional community ties with nature.

Modern societies have created and maintained "nature reserves" for various specific reasons. Till the turn of the century, many wilderness areas were conserved as hunting and recreational sites for the local aristocracy. India, for example, is dotted with national parks and sanctuaries which, till not so long ago, were the hunting preserves of the erstwhile rulers of princely states. [Is this true for China, Thailand and Indonesia?]

With changes in the political management of these countries, elite preserves were opened up to the public and these areas became the hunting and recreation grounds for much of the country's populace. Over hunting and habitat destruction led to such a rapid decline in animal populations that many countries started regulating and even banning hunting, of certain species and in certain areas. Many hunting preserves were constituted into wildlife protected areas, like national parks and sanctuaries, where hunting was either totally banned or severely restricted. This signified the "wildlife conservation" or. more accurately, the "big mammal conservation" phase.

The concept of a "national park" originated in United States in the nineteenth century (Wells and Brandon 1992)[1]. Essentially, this meant "demarcating" an area and "protecting" it from human uses so that it could remain "natural". The principle of national parks gave birth to many other types of PAs, including sanctuaries, reserves, nature reserves and protected areas. Most countries in the region set up a network of parks and sanctuaries.

Despite these measures, the populations of many of the high profile mammals continued to decline, sometimes at an alarming rate. Among these were the tiger,

[1]Michael Wells and Katrina Brandon, 1992, *People and Parks : Linking Protected Area Management with Local Communities*, The World Bank, WWF,USAID

the panda. the rhino, the cheetah (which finally became extinct in India in the 1950s), the musk deer, and the snow leopard. It was clear that mere regulation, or even banning, of hunting was not enough. This was partly due to the fact that whereas such measures were reasonably effective in controlling hunting as a "sport", poaching for commercial purposes continued and even increased as the demand for animal products continued to increase. Though trade in fur and feathers. and later in ivory, was checked due to the growth of public opinion against their use and due to stepped up international and national regulations, the demand for other animal parts and products, like tiger bones, has shown a steep upward trend.

Apart from this, in many cases the decline in population of certain species was less due to poaching and more due to the degradation and destruction of their natural habitat. In most parts of the region infrastructure projects, commercial and industrial activities, and the subsistence needs of a growing population made increasing inroads into natural habitats. Pristine habitats were submerged under dam reservoirs, logged to feed industry, mined over or covered by mining overburden, and inundated with domestic livestock, with fisherfolk or with fuelwood gatherers. Wild herbivores had to increasingly compete with cattle, and the predators found their territories and their prey base shrinking. Contact with domestic livestock spread disease and conflicts between human beings and wild animals, fighting over the same bit of turf, led to casualties on both sides.

As a next step, many governments tightened the management of wildlife protected areas (PAs), increasingly making these exclusively for wild animals and excluding human pressures from them. Simultaneously, countries also started expanding their network of protected areas, some times in response to gap analysis carried out to identify biogeographic segments not covered under the PA network. However, this resulted in greater deprivations for those local, rural and tribal, communities who were dependent on the resources of these, sometimes newly set up, protected areas.

To make matters worse, the PA management objectives went through a significant change, in response to the growing consciousness regarding biodiversity conservation. Therefore, it was no longer possible to maintain the ecological integrity of an area if human pressures or extraction were allowed, even if what was affected was known to be of no direct use for, and sometimes even detrimental to, the well being of the big mammals that were earlier the focus of conservation. Each element of nature was important and needed to be conserved.

This effectively meant that local communities could no longer graze their livestock, collect firewood or use the wide variety of non wood forest produce that was so critical for their subsistence. Efforts to enforce this new understanding of conservation understandably led to heightened conflicts between the local communities and the PA authorities. The antagonism of local communities was heightened by the fact that, in most cases, the PA was managed without in any way involving or even consulting them and that the direct financial benefits from the PA, usually in the form of earnings from tourism related activities, went almost totally to either the government or to commercial operators from the cities. In return, they not only lost access to the natural resources of the PA, which in some cases had been theirs for generations, but also lost what little income they used to get from working in the forests before it was made into a PA and most or all forest working was stopped.

Very soon, given the rapid deterioration of natural resources outside protected areas and the equally rapid growth in human population, protected areas started becoming akin to "biodiversity super markets" surrounded by a growing throng of hungry people.

The plight of the local communities, put in such a predicament, has not only been seen to be unjust but it has also been recognised that, as long as such antagonism exists between the PA and the local people, it would be impossible to conserve the PA. In response to this recognition of the undesirability and impracticability of a purely protection approach, through policing, the alternate ecodevelopment or Integrated conservation and Development approach developed.

2.DEFINING AN ICDP

Though a wide variety of project initiatives and ideas are currently being subsumed under the label of ICDP essentially, as the name suggests, integrated conservation-development projects must have both components, namely conservation and socio economic development. Further, these two components must not just be incidentally present but must have a causal link.

Brandon and Wells[2] define ICDPs as "projects which link the conservation of biological diversity in PAs with local social and economic development ... the core objective of these projects is protected area conservation, the projects aim to achieve this by promoting socioeconomic development and providing local people with

[2]Katrina Eadie Brandon and Michael Wells, 1992, 'Planning for People and Parks : Design Dilemmas', *World Development*, Vol 20, No. 4.

alternative income sources which do not threaten to deplete the plants and animals within the PA."

The **China** project, though not explicitly titled an ICDP, has the essential components of ICDPS, namely a link between the conservation of biodiversity and the socio economic development of the local communities. The project document[3] lists the following components of the China project:

1. Strengthening the protection and management of nature reserves
   1.1 Enhancing reserve management
   1.2 Improving field level protection systems
   1.3 Augmenting community participation
2. Natural forest management
3. Developing institutional capacity
4. Developing a nature reserve management information system
5. Project management

The **Indian** ICDP, known as ecodevelopment project, defines ecodevelopment as :

"..a strategy for protecting ecologically valuable areas (protected areas) from unsustainable or otherwise unacceptable pressures resulting from the needs and activities of people living in and around such areas. It attempts to do this by at least three means:

1: by identifying, establishing and developing sustainable alternatives to the biomass resources and incomes and other inputs being obtained from the protected areas in a manner, or to an extent, considered unacceptable.

2: by increasingly involving the people living in and around such protected areas into the conservation planning and management of the area, thereby not only channelising some of the financial benefits of conservation to them, but giving them a sense of identity with it.

3: By raising the levels of awareness, among the local community, of the value and conservation needs of the protected area, and of patterns of economic growth and development which are locally appropriate and environmentally sustainable.

[3]The People's Republic of China : GEF – B: Nature Reserve Investment Project

Though, by their very nature, ecodevelopment initiatives will differ from area to area (and even from village to village), the three basic principles defining ecodevelopment are:

1. Site - specific, micro-level planning
2. Sectoral integration
3. People's participation.

Ecodevelopment is not just rural development, for it is not solely directed at the economic development of the rural population for its own sake, but seeks to protect an ecologically valuable area by eliciting the support of local communities.

Ecodevelopment is not policing in the sense that it does not seek to protect an area by keeping the pressures out solely or primarily through the enforcement of laws aimed at excluding local people. Rather it involves the local people in the process of protecting the park from destructive activities.

For any ecodevelopment plan to succeed, it must be backed by an appropriate management plan for the protected area." [4]

The **Indonesian** concept of ICDP is described in the project document as follows:

" Following the limited success of traditional approaches to biodiversity conservation, which are largely based on trying to isolate national parks from their surroundings through fencing and law enforcement, during the past few years new approaches have been proposed which have in common that they attempt to integrate conservation - mostly inside the Park - with development - mostly outside the park."[5]

" The overriding, long-term objective of the Integrated Conservation and Development Project for KSNP is: to conserve biodiversity contained within the Park and adjacent areas. This long-term objective is to be achieved within the framework of overall regional development planning in which consensus is obtained on the partitioning of space, and where the legal basis has been put in place to ensure rational and enforceable use of resources. "[6]

---

[4]Singh, Shekhar, 'Tiger Conservation Through Ecodevelopment - A Conceptual Framework', paper presented to the first meeting of Tiger Range States to set up a Global Tiger Forum, New Delhi, 3-4 March, 1994.
[5]Project Brief, Integrated Conservation and Development Project (ICDP): Kerinci Seblat National Park, Republic of Indonesia, undated
[6]Ibid

In **Thailand**, ICDPs are known as ICADs : integrated conservation area development. The project document describes an ICAD as follows:

"The ICAD concept is relatively new to Thailand as well as other countries in the region. However, ... studies revealed three key findings critical for project formulation. First, effective biodiversity conservation requires the protection of conservation forest complexes rather than individual wildlife sanctuaries or national parks. Second, it is not enough for "buffer zone" programs to be predicated on the assumption that improving incomes alone will relieve the pressure on conservation forest incursion; they must include forest conservation as an explicit objective and there must be strong simultaneous demarcation and protection effort on the side of the conservation forest. Such a multifaceted approach is needed because the self interest of buffer zone villagers must be taken into account in the joint protection process. Those that have been deriving benefits from the forest on their own account or on behalf of others (e.g., as agents of speculators and wildlife traders) will not readily agree to discontinue their past behaviour unless (i) they are compensated for it or (ii) the cost of continuing their activities are made prohibitive (i.e., the hitherto open access nature of the conservation forests are restricted in practice). Third, joint consultation and participation of the affected villagers is necessary for successful joint forest protection and for sustainability in the protection process."[7]

1. **What is the most critical project management issue encountered during preparation of Asia GEF biodiversity ICDP project?**

* Because GEF biodiversity ICDP projects are complex to design and involve numerous stockholders, it takes more time to arrive at a shared vision of their objectives and scope. All project preparation consultant team leaders stressed the need for common and clear objectives to be agreed upon between the Bank and the government before preparation team goes to the field. Often the lack of agreement is over the right balance between conservation goals and development needs.

In China, project preparation was lengthened because of the lack of clear understanding between the Bank and the Government over the scope of the project. The preparation team had to devote additional time to developing a shared vision. In Indonesia, the lack of clarity about what sort of regional development is compatible with biodiversity conservation led to tension between the government, the Bank, and the preparation team as to the nature and goals of the project. The consultant firm

[7]Global Environment Facility : Initial Executive Project Summary, Thailand

undertaking project preparation was ill equipped to handle this tension and conflict resulting in inadequate preparation. It is now obvious that substantially additional time is needed to complete preparation. To prevent such problems the India project conducted pre-preparation workshops designed to bring together the major players and discuss the goals and objectives of the project as well as the terms of reference, and roles of all those involved in project preparation.[8]

3.**DESIGNING ICDPs**

In the designing of ICDPs certain critical questions have to be answered. Listed below are some of these questions along with the sorts of answers that ICDP design experiences have thrown up.

3.1 **Selecting PAs for ICDPs**

Considering the final objective of conserving biodiversity, the most important basis for selecting potential sites for ICDP is their biological richness and uniqueness. This is determined by listing and comparing species richness and diversity between different potential PAs, giving especial weightage to threatened and endangered species and to endemicity. The size and biodiversity significance of the area in terms of national conservation imperatives are also important criteria. The threats to the area and the feasibility of establishing a successful ICDP are other considerations.

Criteria for Site Selection : The Indian Approach[9]

#From the protected areas in India, a list has to be developed of those which are threatened by the types of pressures that can be tackled by ecodevelopment. Ecodevelopment, as a strategy, is appropriate only for those areas where the threats are due to pressures from local (rural) communities. In areas where the major threat is from a national highway, or from commercial logging or industrial pollution, strategies other than ecodevelopment might be more appropriate. Of course, an area can have both types of pressures. In such cases, ecodevelopment can become the means of tackling pressures from local communities while other strategies can be employed to tackle the other problems.

#After a selection has been done of potential areas for ecodevelopment, they need to be classified as follows.

---

[8]ASTEN Briefing Paper : Lessons Learnt From Preparing First Generation GEF biodiversity Projects : The Asia Region Story

[9]Singh, Shekhar, op. cit

I Areas where current, local community, needs for biomass (grass, fuelwood, fodder, non-timber produce etc.) are the major threats and these can be sustainably met from available resources, once these resources are better managed (closing/rotation of grazing areas, regeneration/plantation of fuelwood and other species, soil and water conservation activities etc.)

II. Areas where though current, local community, needs for biomass cannot be completely met, in a sustainable manner, from local resources, there is potential for reducing local needs for biomass to sustainable levels through indirect methods.

Such indirect methods could include minor interventions like stall feeding of livestock, replacement of local breeds of cattle with high yielding breeds, or introduction of smokeless chullahs, to major interventions like setting up schools and training programmes to enable villagers to seek non-biomass based employment, minor irrigation, water harvesting and soil conservation schemes to enhance agricultural productivity, development of cottage industries and artisanal skills, etc.

III. Areas where even the combination of direct (biomass regeneration) and indirect (diversion of biomass needs) strategies would not be adequate to remove the threat to the environment and where larger, perhaps regional, interventions would be required.

Within each category, the areas should be graded in accordance with the severity of the problem.

#A decision has, then, to be made on which areas are to be selected. In the long run it might be possible to cover all the areas, but in the short run a priority has to be established.

Given the circumstances, in some cases it might be preferable to first take up the easier areas (category I), especially if experience needs to be accumulated and resources are scarce. On the other hand, the more difficult areas (category II & III) might require attention more urgently and any further delay might cause irretrievable damage. Though the final decision would have to be made case by case, depending on the experience, training and confidence of the persons concerned, the resources available and the ecological value and level of threat pertaining to each area, as a general principle it is advisable to go from the simpler to the more difficult areas as the experience and confidence gained would help in facing increasing levels of difficulty.

Another factor that should influence the choice of the area is the willingness and ability of the local communities to participate in the process. Even simple problems cannot be tackled without involvement of local communities, while the most difficult ones can be overcome if the people are willing to co-operate.

#Initially it is advisable to deal with each area separately, though at a later stage it might be advantageous to link up the various ecodevelopment initiatives in a region.

3.2 **Demarcating the project area**

Generally speaking, ICDPs involve conservation and protection activities within PAs, and development activities outside, but adjoining, the PAs. However, whereas the PA is usually defined, the geographical spread of the "adjoining" area to be covered under the project has to be defined.

Considering the primary objective of ICDPs is to help conserve the park, essentially those areas would get covered in the project from where pressures and threats to the PA emanate. However, the extent and geographical location of threats and pressures are not always obvious at the start of the project design. Therefore, it becomes necessary to adopt some thumb rule which can be used to demarcate the original project area. Detailed investigations, at the time of project preparation, give a clearer picture of the issues involved and help in redefining project areas. For example, in India, the starting point is to take the 10 km radius around the PA as the initial project area as past studies have established that livestock rarely travel from distances greater than that for regular grazing in the PA.

Even within the demarcated project area there might often be a need to further prioritise the areas to be taken up mainly because there might not be adequate financial and human resources to take up the whole area, or to take it all up with the same intensity. There might also be a need to determine which areas and villages to take up first and which to leave later.

Such decisions have at least partly to be taken on the basis of the biodiversity value of that portion of the PA that a particular area is impacting on as compared to other parts of the PA. Also, the level of pressures (often directly in proportion to the proximity with the PA) and the state of habitat degradation are also considerations.

Sometimes, it is advisable to take up easier areas first so that success there not only gives confidence to the project staff but also creates a good example for others to follow or to be encouraged by.

Assessment Criteria for Project Area Prioritization: The Indonesian Approach [10]

1. Presence of *important biodiversity values* outside the Park represented by the distribution of lowland vegetation types in production forest areas (HPH).

2. Presence of current *major threats to the Park* as a result of fragmentation (e.g. road development) and encroachment (e.g. cassiavera cultivation, poaching, etc).

3. Hypothetical *impact of settlements* (e.g., Park edge and "Deep Park Settlements") to wildlife core areas.

4. *Unique biodiversity values,* referring to rare and unique vegetation and habitat types (e.g. alpine vegetation, highland dwarf swamp forest, lowland peatswamp, limestone forest).

5. *Demonstration value* referring to representation of farming systems as well as access.

6. *Tourist potential* based upon access, attraction and facilities.

3.3 Institutional arrangements and human resources development

Whereas specific institutional structures required for various ICDP activities are discussed in the sections dealing with these activities, an important component of ICDP design is the designing of the overall institutional structures that will govern the project.

Institutional structures need to be set up or strengthened at various levels. As in most countries dealings with international agencies is routed through the national government, there has to be a cell at this level to coordinate the project design, implementation and monitoring work. This cell has also to de-mystify World Bank and GEF documents and requirements, and ensure that donor conditionalities are properly negotiated and met. Given shortage of staff and resources, this work is usually entrusted as an additional responsibility to officers already fully employed. Though this might be unavoidable, especially at the senior level, such a cell can function effectively only if a credible national NGO or institution is retained to assist in its functions, and for the purpose adequate budgetary provisions are made in the project preparatory facility.

The national cell and the supporting NGO/institution needs to function as a networking institution linking up with other government and independent institutions

[10] Biodiversity Conservation in Indonesia, Op cit

and individuals, perhaps through committees and workshops, and involving them in the supervision of the design, implementation and monitoring activities.

A similar cell needs to be set up, with similar NGO support and networking functions, at the provincial/state level.

Institutional strengthening is most critical at the field or PA level. At this level there are at least three actors in an ICDP : the PA managers, the local NGOs and/or institutions, and the local community.

Apart from facilitating the **creation of appropriate institutional structures within the community** (discussed later in section 4.1), the project must also support community institutions through appropriate **human resources development** inputs. Community institutions need not only to design local level programmes but also to manage their execution, keep accounts and inventories, participate in the management of the PA and take up a variety of conservation and income generation activities. They also need to be involved with the monitoring and evaluation of the project, and in awareness campaigns and information dissemination activities. Many of these tasks require skills which are not always available at the rural areas. ICDPs must recognise this and build up a detailed HRD programme.

ICDP design and implementation also makes new types of demands on NGOs. For one, it integrates skills in community development with skills in biodiversity conservation : an integration not easy to find in the region. Therefore **NGOs and institutions** historically working in the area of biodiversity conservation need to acquire and update community development skills. Similarly, groups traditionally engaged in community development need to learn about biodiversity conservation and PA management. Participating NGOs also need to learn RRA and participatory rural appraisal (PRA) techniques and need themselves to become trainers for the PA managers and for community institutions.

At the **PA level**, the creation of adequate institutional capacity is a sensitive issue. In many externally funded projects, the funding agencies refuse to bear the cost of additional staff from project funds. Staff costs are considered to be one way, among others, in which the national and provincial governments contribute towards the cost of the project.

However, most governments are wary of creating additional positions in the bureaucracy, for such positions cannot be equally easily abolished, once the project is over and, consequently, become a permanent drain on the exchequer.

This results in governments sometimes attempting to implement the project without providing adequate additional staff. However, such an arrangement, especially for PAs already understaffed, leads to the neglect of other aspects of PA management. It is possible that, in such a circumstance, the ICDP does more harm than good.

Another way in which governments try and get around this problem is by transferring people from other areas to the project area. As this does not add to the basic stock of personnel, it means that some other PA or forest area would get inadequate attention because of the ICDP. This is clearly undesirable and even counter productive.

For these and other reasons, it is important that institutional strengthening at the PA level needs to be discussed in detail, right at the design stage, with the government and an agreement reached which satisfactorily resolves these issues.

Though most PA managers have skills in biodiversity conservation, these skills usually need upgradation, especially considering the fast pace at which the science and practice of conservation is changing and growing. In addition, an ICDP requires skills in various community development and income generation activities which are usually not a part of the PA managers repertoire. Though for detailed, technical inputs, it is desirable to involve a specialised agency and, where appropriate, even temporarily second experts to the PA management teams, some understanding of these processes must be shared by all those involved in the project. For this, orientation programmes and workshops need to be planned.

Perhaps most critical to the success of ICDPs is the necessity to change the attitudes of many PA managers to local communities, who have very often been seen as nothing more than poachers and criminals. These attitudes need changing, as do the attitudes of the local community who often see PA managers as insensitive oppressors. Obviously the attitudes can only change after the reality has changed, and ICDPs are designed to change the nature of relationship, so common in the region, between local communities and the PA managers. However, it is difficult to change the reality significantly and sustainably unless perceptions also change. Therefore, perceptions and reality has to be modified concurrently and this is, perhaps, the greatest challenge in an ICDP.

3.4 **Project Size**

A separate but related question is the size of the project. In many types of projects the project size can be almost arbitrarily determined on the basis of financial resources available. However, the optimal size of an ICDP project has an

inherent logic to it. As the basic objective of an ICDP is to conserve the PA, it seems unlikely that this objective can be met unless a significant proportion of the pressures on the PA, and certainly all the critical ones, are addressed. Therefore, an ICDP project which only covers one side of the PA or only a small part of the impacting population might not be adequate.

In fact, very often reduction of pressures from a small part of the community only results in pressures increasing from the remaining sources and their negating whatever little benefits might have initially accrued to PA. Therefore, the size of an ICDP should be adequate to deal with a significant proportion, if not the totality, of the pressures.

3.5 **Identifying beneficiaries**

Even after demarcating the project area and prioritising within it, it might not be possible to deal with the entire population living within this area. In many PAs the human population living in and around might run into hundreds of thousands. Also, all these people might not be directly impacting on the PA. However, it might become difficult to segregate those who are impacting from those who aren't.

There are various problems in doing a selection of potential project beneficiaries strictly on the basis of the impact that individuals and families are having on the PA. Apart from the difficulty in correctly identifying these individuals and families, especially when it becomes known that there are some rewards at the end of it, there is the additional problem of seeming to reward only those who have, often illegally, threatened and degraded the PA. This not only creates a sense of outrage among the remaining people but also encourages them to purposely flout the law and degrade the PA in the hope that this would make them eligible for ICDP inputs.

Another method could be to determine who had a historical right of access to the areas now sought to be immunized from human use. However, the determination of rights to access, when they are not legally recorded, or sometimes even when they are, is a tricky issue. Ordinarily, proximity to the resource is taken as a basis for legitimacy of access. Therefore, people living in and around a forest would often be seen to have a greater right on the forest than those living further away. However, though proximity certainly facilitates access, it is often not the best basis for legitimising it.

Indonesia

The basis for compensation when land is re-designated should/could be:

- status according to national law and or adat law
- investments made/actual market value of resources and land
- status of settler: long term resident or newly arrive (sic) opportunist
- the needs of people to find themselves a proper alternative elsewhere[11]

This is a difficult issue and in order to avoid the feeling that ICDP is an amnesty scheme which not only forgives the culprits but also rewards them, a very careful selection of beneficiaries is required. For one, it is perhaps better to make all those below a certain economic level beneficiaries to the project rather than only those who are impacting on the PA. This not only negates the temptation to impact on the PA in order to become a beneficiary, but it also channelises the ICDP resources to that segment of the society which is least able to, without help, manage without impacting on the PA.

But, apart from the investment aimed at specific households and individuals, a significant proportion of the ICDP investment must also go into projects which address the needs of the whole community. Unless this happens, the project would most likely not get the support of the full community, especially of the richer and usually the more powerful segments of the society. This would be a serious handicap.

Remarks by a Government Representative at the Padang Meeting

" Why should we compensate the people impacting on the forests and give them money and other assets. Considering they were encroaching on the forests, they should be grateful that we are not putting them in jail."

3.6 Setting up a design team

Designing an ICDP is a painstaking, time-consuming, multi disciplinary task. It is rare for Governments to have, within themselves, all the expertise required for this and even rarer for government functionaries to find the required time. Consequently, almost all countries and all of the four countries currently being discussed employ outside expertise, in varying degrees, to assist in the design process.

[11]BV Sjaak Beerens and Jan Wind, op. cit.

Essentially the choice is between involving consultancy firms, individual consultants or NGOs. Also, there is a choice between hiring foreign versus national firms, individuals and organisations. In China the design work was carried out by a team of foreign and local consultants, assembled by the World Bank. In Indonesia, the Government hired a foreign consultancy firms to design the ICDP. In Thailand a Thai consultancy firm was hired, but with some foreign personnel. In India, the Government hired a national level Indian NGO to co-ordinate the design work. This NGO was assisted by other national and local NGOs and a few professional institutions and individuals, all Indian.

Three viewpoints

"With a firm, the Bank is relieved of some of the management and logistics. This helps when TMs have large project portfolios or if internal Bank technical support to the TM is insufficient. In the future, with GEF Phase II, one can expect that demands on Bank technical staff, at current levels, will increase dramatically. Therefore, the TM could use the reliable technical backstopping of a firm. It is also easier for the Team Leader, as his/her authority is more definitive and he/she is probably familiar with the consultants on the team and may have a long-term working relationship with them already.

"The main advantage of hiring an experienced consulting firm is quality control and sound management of the process. Firms also have more sophisticated logistical support technology and quick response times than individual consultants. In some organizations, peer review can be built into the process. Another significant advantage is the institutional understanding of Bank procedures for preparation and operations.

"Consulting firms are seen to be more expensive compared to hiring individual consultants. However, these costs are used to provide the logistical and management services."[12]

"The use of consulting firms should be encouraged. Due to the unique nature of GEF project preparation work however, no firm can be expected to have the diversity of expertise on their home office staffs to provide the high level of technical assistance required for GEF projects. Thus, in the evaluation of proposals submitted to undertake project preparation work, consulting firms should be able to demonstrate an ability to mobilize significant in-house technical resources as well as

[12]Scott McCormick, Team Leader - China GEF Preparation, in "Issues for Discussion Raised by GEF Biodiversity Projects- Asia", 1993

to attract high caliber outside technical consultants to work on pre-feasibility studies. In addition, international consulting firms should be required to associate with local/domestic consultants, to ensure that the local context is reflected in the project preparation process. Further, international and/or (at least) domestic consulting firms should have a demonstrated ability to work with local NGOs."[13]

"In India, it is better to have NGOs and individuals as consultants because their costs are much lower than firms. Also, firms find it much more difficult to get information out of the Government....NGOs and individuals are also better because they have a better feel of local people and the prevailing social, economic and environmental conditions. This is not always true of firms, especially foreign firms. Also, local NGOs and individuals can act as effective mediators between local people and the government."[14]

The need is to have a design team which has all the required professional skills, is able to understand World Bank and other GEF requirements, to liaise with Bank and Government personnel, to be able to interact with local communities and have a good understanding of local conditions. Where NGOs who meet these requirements are not available, firms have to be brought in. Where such expertise is not available within the country, foreign NGOs, firms, and individual consultants have to be hired. However, there appear to be, everything else being equal, advantages in hiring national organisations and firms for they are usually cheaper, have a better understanding of local conditions and a better rapport with local governments and people, and their expertise and inputs are available within the country even after the design period is over.

3.7 **The duration and cost of the ICDP design process**

The design of ICDPs requires a detailed understanding of micro-level reality based on extensive discussions with the villagers. However, such a process if properly done can take years in a project are with hundreds of villages. The time requirement goes up further when even basic management, biological, and socio-economic data are not available for the project area. There are further delays if strong antagonism exists between the local community and the government authorities, necessitating a process of rapport building.

---

[13]Anthony M. Zola, Team Leader, Thailand, in "Comments" submitted to the conference of GEF Pre-Investment Study Team Leaders, Washington, 5-6 January, 1994.

[14]Raman Mehta, "The Ecodevelopment Experience in India"

Nevertheless, in many cases, it is not possible to spend such a long period of time, and consequently so much money, in preparatory planning. Often there is an urgent need to act in order to halt further degradation of the protected areas. Also, in poor countries very expensive planning processes, involving costly international consultants, are inappropriate and, to say the least, insensitive.

One method of shortening the planning period is to use techniques such as rapid rural appraisal (RRA), which can help generate large amounts of data in brief time spans. This facilitates detailed micro level planning in a very short period of time. However, RRA does not bring out the seasonal and annual variation in the biological and socio-economic profiles of the area. Also, given the social stratification that exists in most of the countries of the region, RRA is often not adequate to capture the internal dynamics of decision making within the community. A good way of saving costs is to involve national NGOs, wherever possible, assisted by grass roots groups and organisations.

Another solution is to immediately enforce the required management prescription in a protected area, to further arrest degradation, pending the design and implementation of the ICDP. This would allow time for a detailed, long drawn out, planning process without allowing the PA to get further degraded. However, there is a danger that strict enforcement of the laws and regulations around a PA, without the corresponding development of alternative sources of biomass and incomes under the ICDP, would heighten the antagonism of the local people to the PA and its managers and make the successful implementation of an ICDP even more difficult, if not impossible. It is also seen as a difficulty that once local officials are oriented towards greater enforcement and the attendant power that goes with it, it would become even more difficult to reorient them, once the ICDP starts, towards a more participatory and reconciliatory approach towards the local communities.

How long should it take to prepare GEF biodiversity ICDP projects?

* Most projects took two to four years to prepare. Only one took less than one year. Although this time frame is relatively long, it appears to be necessary in order to introduce new concepts and bring all the stockholders on board.

* For most of the projects with long preparation time, the financing came from several sources such as PHRD grants in addition to GEF funds. For instance, the Thailand project carried-out a study of encroachment of reserve forests financed

by PHRD which then was followed by a more in-depth project proposal financed by the GEF Pre-Investment Facility.

* Increasing the number of people involved with project preparation cannot necessarily compensate for inadequate preparation time. Greater efficiency might be achieved by having smaller teams but longer preparation time with discretionary funds available to supplement expertise as needed. Ideally, a small consultant team should make frequent visits to guide the local preparation team. The composition of this consultant team can be expected to change as the project design evolves.

In Indonesia, eight months was inadequate to fully consult with all stakeholders even though the consultants undertaking project preparation attempted to compensate for the teams, subcontractors and NGOs, without resulting in an acceptable project proposals. It is now estimated that an additional year or so will be required to complete preparation,. However, in Thailand the consultant firm took three years to prepare the project. This ensured that many of the parties involved could be adequately consulted and a detailed project preparation report that deals with the complexities of biodiversity projects could be developed.

Can preparation time be shortened ?

* In general, the answer is "no." There are no shortcuts to sensitizing all stakeholders to all the issues.

* However, some components of the project can be more fully defined during implementation instead of during preparation.[15]

Another option is to start the ICDP without bothering to collect a vast amount of data or do detailed planning. However, experience is that whenever such an approach has been taken in the past, in rural and community development programmes, it has resulted in a high incidence of failure, especially because of wrong identification of problems, the adoption of ineffective solutions and a lack of support from the local people.

An approach that is being tried (in India) is to break up the planning phase into two parts. There is an initial "Indicative Planning" phase of between six months and one year, where an indicative plan is made on the basis of a study of a small sample of villages, and of available information on the PA and its surrounds. Based on this

[15]ASTEN Briefing Paper, op cit

indicative plan, the Bank appraises the project and releases funds. Detailed planning is concurrent with implementation (see box below).

Ecodevelopment Planning

..."ecodevelopment planning needs to be site-specific, micro level, and participatory.

#Ecodevelopment is not a once-and-for-all, prior- to- project- implementation, planning process. It is a dynamic, ongoing, planning process which is concurrent to implementation.

#Considering the planning process is essentially participative (using appropriate participatory rural appraisal (PRA) techniques), it involves going into village after village and taking up many days of the villager's time. Whereas this would be justified when there is a certainty that funds are going to be shortly available for responding to the needs of the village, it seems very inconsiderate to waste so much of the villager's time and unnecessarily raise their hopes when funding is uncertain or much in the future.

#Therefore, detailed, micro level, ecodevelopment planning, for this and many other reasons, is seen as starting as soon as the project is approved and running concurrently with the first phase of the ecodevelopment project implementation.

#For the purpose of determining the broad thrusts and the budget required, and to avoid raising unnecessary expectations, a small sample of villages is visited and the costs worked out and extrapolated for the whole area. The village visits are conducted by non-governmental organisations selected and trained for the purpose, using PRA methodology, and the findings are incorporated into a preliminary, indicative, plan.

#The planning process involves detailed discussion with the village communities on various aspects, including:

- Negative impacts of the protected area on the village
    - Negative impacts of the village on the protected area
- Possibilities of minimising both types of negative impacts through ecodevelopment
    - Village level institutional structures and processes existing and required
- Finances, training, research and other inputs required for implementing ecodevelopment activities.
    - Constraints, if any, to the success of such activities

- Strategy for the transitional process and period, between the stopping of use of protected area and the establishment of the ecodevelopment initiative.

- Strategy for the withdrawal phase so that even after the completion of the project, when funding has stopped, the approach is sustained.

- Strategy to ensure that ecodevelopment activities in the surrounds of the PA do not result in attracting more people to the region and thereby increasing rather than decreasing the pressure on the PA.

- Perceptions of the villagers about the protected area, its value and management strategy.

Perhaps it is worth reiterating here that an indicative plan is supposed to be just that: indicative. It is supposed to:

1. give **basic information** about the project area;

2.broadly identify the **major management and ecodevelopment issues** in terms of the pressures on the PA, the pressures of the PA on the local population, and the management constraints;

3.broadly identify the **strategies** available for tackling the various management and ecodevelopment issues;

4.indicate some of the **types of biomass and income generating activities** feasible in the area, given the local ecological and socio-economic characteristics and the availability of natural, human and social resources;

5.indicate the **infrastructural inputs and support** that might be required to implement the management and ecodevelopment plans, especially in terms of human resources development education and awareness, and research;

6.indicate, broadly, the **levels of financial support** that might be required, more on the basis of the nature of problems and the populations involved, rather than on the detailed costing of specific activities, as the final selection of these activities would be made only in the micro-planning stage;

7.indicate the **biodiversity value of the PA** and the feasibility of taking up an ecodevelopment project, in terms of the need for ecodevelopment and the possibility of it succeeding and thereby helping protect the PA;

8.indicate the **processes and methodology** that would be followed in detailed planning and implementation of the project, including the financial, legal, policy and

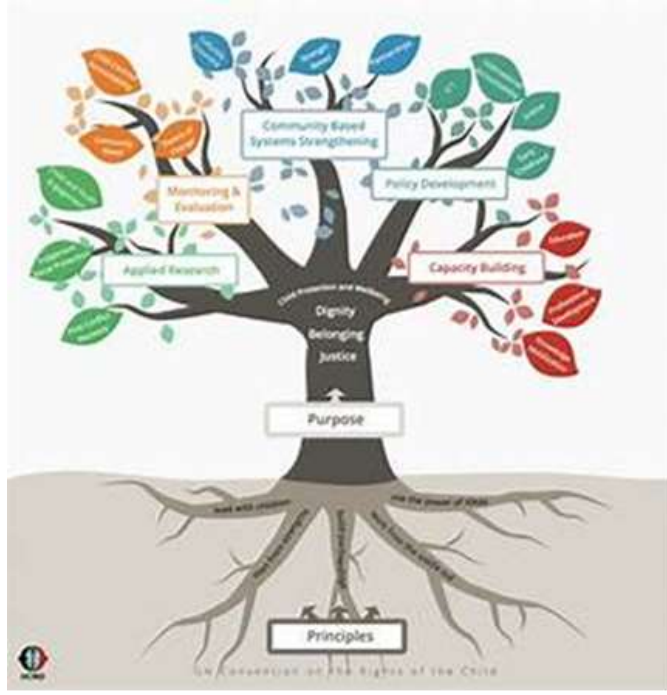
institutional mechanisms required or, where these have to be determined through micro level planning, indicating the relevant process.

It is hoped that, based on this indicative plan, the financial support required for the project would be committed. This would allow the second phase to start, where micro-level planning will be done for each village, through planning teams who would help the villagers to plan for themselves. [16]

Some of the other strategies suggested in the various workshops and in literature include the **use of the Bank's Project Preparation Facility (PPF) for pilot implementation**. This would involve taking up the most urgent protection and socio-economic development tasks, using some of the funds provided under the PPF, concurrent to detailed planning. This approach is being currently tried in India.

Another suggestion was to restructure programme development as indicated below

MARITA'S TREE APPROACH DIAGRAM[17]



[16]Indian Institute of Public Administration, New Delhi, India, *Biodiversity Conservation Through Ecodevelopment : An Indicative Plan*, 1994

[17] Accessed from: https://in.images.search.yahoo.com/search/images;_ylt=AwrwS5lU7clfZVsAzgm7HAx.;_ylu=Y29sbwNzZzMEcG9zAzEEdnRpZAMEc2VjA3Nj?p=marita%2Cs+tree+approach+diagram&fr=mcafee#id=2&iurl=http%3A%2F%2Fiicrd.org%2Fsites%2Fdefault%2Ffiles%2Fimages%2Ftree_iicrd_800_darker.jpg&action=click

3.8 **Establishing appropriate financial procedures**

Where ICDPs are funded through NGOs or through trust fund mechanisms essentially independent of Government procedures, the required amount of flexibility in financial procedures is usually possible. However, in many countries ICDP funding is routed through the government and is, therefore, ordinarily subject to various government rules and procedures. In such cases, the design of ICDPs must specify and get government agreement on financial procedures appropriate for ICDPs.

Essentially, ICDP financial procedures must ensure :

- timely release of funds to the PA and the ICDP managers so that work does not suffer due to cash flow problems

- that ICDP funds are not liable to lapse at the end of the year, thereby forcing reckless and often inappropriate expenditure just to prevent them from lapsing

- that there is adequate authority at the field level to sanction expenditure and that sanctions do not require time consuming, centralised, concurrence

- that there is adequate flexibility in the budget to support a wide range of activities that are identified by the villagers through RRA and PRA, and as a part of participatory micro-level, planning

- that, nevertheless, there is adequate transparency and accountability to ensure that funds do not get misused or misappropriated.

4.**ICDP ISSUES**

Though in all the four countries preparation of formal ICDPs is still underway[18], much experience has already been gained on the critical issues and questions that confront the ICDP preparation teams. Besides, for the last decade various projects addressing the issue of people and parks, or of conserving protected areas in harmony with local people, have been initiated in many countries. Though not necessarily ICDPs in the strict sense, such initiatives have provided valuable experience about what can go wrong and what is critical in ICDPs.

[18]In India, the first of formally prepared and externally funded ICDPs started, with IDA assistance, around two protected areas, from mid 1994. The second project for eight protected areas is currently under preparation.

Based on the experience of those involved in the formulation of such projects and on published case studies and evaluations of ongoing similar projects across the world, the following issues and questions emerge as among the most critical.

4.1 **How to meaningfully involve local communities in ICDP planning and implementation?**

Involvement of the local communities in the planning and implementation of ICDPs is critical to the success of the project. In fact, a properly established ICDP should progressively have local communities planning for themselves and managing their own finances and activities, with only solicited support from external agencies and the Government. However, field experience has identified various constraints to effective people's participation.

First, often **conservation is not a priority with the local communities**. In fact, given the history of PAs, in many cases local populations are antagonistic to conservation objectives. Also, the activities to be decided upon under ICDP must be such that they divert or minimise pressures from the PA. However, this is not always in keeping with the villagers priorities. Very often they are interested in activities which give them the greatest amount of economic returns for the least investment in time and effort. Also, their priorities might be such that investment in these would exhaust the projects resources without any discernible gain to the PAs.

One option is for the project planners to initially not divulge the conservation agenda of the programme. Once the villagers have, independently of the conservation objectives of the project, indicated their priorities then the project planners could focus on those which are most likely to divert pressures from the PA.

However, such an approach essentially undermines the crucial pre-condition of trust-building between the local communities and the PA authorities. Also, if the real objective of the project is not known to the local communities they would hardly be in a position to participate, leave alone independently manage, the planning and implementation of the programme.

Another option is to precede project planning activities with detailed awareness campaigns to raise the acceptability of conservation goals in the eyes of the local communities. It is, however, not quite clear whether educational awareness, by itself, would, or should, change the priorities of a rural community living in poverty and fighting for survival.

One approach is to make the "rules of the game" very explicit to the local communities right from the start. The local community is told that the sole objective of ICDP is to better conserve the PA. However, what makes ICDP different from earlier strategies is that it seeks to do this by ensuring that the local communities, who depend on the PA for certain basic needs, are not negatively affected and are fully involved in the planning and implementation of the project. Certain basic conditions are then laid down which are, in a sense, assumptions to the project, and define the types of activities and investments possibly under the ICDPs. Subsequent project planning and implementation is necessarily to be in keeping with these assumptions.

The obvious drawback of this approach is that it limits people's participation by considering several fundamental assumptions as given and allowing for participation and participational decision making only in the remaining aspects of the project.

What is the appropriate framework for NGO and affected peoples participation in project preparation?

* Including local NGOs as partners in a project has been valuable; NGOs not only have credibility with people in rural areas but also with international NGOs, though the reverse is not always true.

* The project preparation team should separate operational NGOs from advocacy NGOs and then focus on using the operational NGOs as partners in project design and implementation. However, mechanisms should be established to consult and inform the advocacy NGOs on project-related matters from time to time. This would help to reduce conflict and misunderstanding between the preparation team and NGOs.

* Existing governmental mechanisms for consultation with affected peoples should not always be relied on to achieve "true" participation except in countries with socialist governments such as Laos where there may not be an alternative to going through government channels at present.

* The project preparation team should be ready for a few false starts when garnering NGO and community participation.

* Care should be taken not to raise the expectations of immediate benefits from a project among local people. To minimize this risk, one project consulted with only a small sample of villages (10%) during the design phase.

* True local participator planning may need to wait until project implementation when there is a clear commitment to follow-up activities and assured funding.

The consultant team for the Thailand project was able to identify, work with, and build on the experiences of operational NGOs working in the proposed project sites through holding several workshops to allow the local operational NGOs and the preparation team to come to a common understanding of goals and objectives and field visits of projects being implemented by NGOs. Operational NGOs were invited to participate in the buffer zone development activities and an Environmental NGO trust fund will be established to fund activities proposed by local operational NGOs. Likewise, the Indonesia project has developed good communication channels with local, national, and international NGOs. This is now being used as a model for NGO involvement in preparation work on other Bank projects in Indonesia.

To minimize raising expectations of local people while collecting socio-economic information from local people, the Thailand and India projects used university or independent institute teams to conduct the study as part of research thus avoiding inadvertently raising expectations. It may also be appropriate in some instances for the preparation team following consultations with the local communities to fund small community development activities as goodwill gestures. This lends a sense of credibility to the project from the perspective of the local communities but care should be taken to limit such gestures and not undermine the credibility of other projects.[19]

Second, even where genuine people's participation has been stimulated during the design phase, how does on **institutionalise such true participation in project design**. Obviously the involvement of grass-roots NGOs in the design and implementation of the project goes a long way in ensuring that people's participation is sustained. In this aspect, there is a distinct advantage in involving NGOs rather than firms, and national NGOs rather than foreign or international ones. However, for such participation to not always be routed through NGOs, it is important to develop community institutions which can manage the project and interact with Government and Bank staff. Besides, it is not always certain that the NGOs involved with the project are truly representing the people's views.

[19]ASTEN Briefing Paper, op cit

In India, the ecodevelopment project envisages the formation of village ecodevelopment committees which would be the institutional structures for planning and implementing ecodevelopment activities.

Another factor inhibiting true participation is the **social stratification among rural communities**. Such stratification is not only class based but also gender-based, age-based, and even occupation-based. The process of micro-level planning must include methods to ensure that not only the powerful and the dominant but also the weak and oppressed segments of a rural society are able to participate in the process of decision making. However, efforts to bypass established community institutions and hierarchies can mean dilution of community support for the project. Therefore, this issue has to be dealt with sensitively and with some flexibility.

At the implementation stage, the level and quality of community participation depends very largely on the **sense of ownership** they feel towards the project and the various project components. Letting the community decide on the design of the project significantly helps in giving them a sense of ownership, but it is rarely enough, especially over the long term. Assured legal titles and financial contribution by the community or the individual are two possible ways of giving a sense of ownership. Where this is not possible, for example on land owned by the government, a joint management strategy with a memorandum of understanding between the community and the government, is sometimes adequate.

The China GEF project will develop an interactive process of co-management of the reserve's resources. Communities and nature reserve bureaus will develop contracts that define responsibilities and benefits for each party. Local government will sanction the contracts and resolve conflicts between the parties. The community will develop (with respective reserve bureaus) resource management plans and receive community investment grants to be used to meet critical needs consistent with the resource management plans.[20]

In India, large tracts of Government forests are currently being jointly managed with the local communities living in and around these forests. These communities protect the forests through village forest protection committees, and have a memorandum of understanding with the government which assures them of access, sometimes exclusive access, to various forest produce.

[20]Scott McCormick, op cit

Recent assessment has shown that forests jointly managed with the communities were not only in better condition but cost a fraction to protect, compared to those being exclusively managed by the government.

4.2 Should ICDPs be target driven and time bound?

Whereas there is no getting away from targets, they must be kept to a minimum in ICDPs and expenditure targets must be avoided altogether. Whereas it might be appropriate to have targets for the PA management components of ICDPs (staff in position, kilometers of fire lines, numbers of vehicles and pieces of other equipment procured, etc.), most of the other activities, especially those directly involving the local community, must be process driven. As ICDP planning is participative, micro-level and site specific, there is no way to anticipate how long the simultaneous process of micro level planning and implementation will take from one village to another.

For example, in one hamlet the local people might be very hostile towards the PA management and trust building might take a whole week, while in another the people might already have discussed the project and be willing to participate and clear about what they want within a day.

Such flexibility must be allowed within the design of the project. However, while ensuring that project activities are not hurried, at the cost of quality and real participation, just to meet some inappropriate targets, it also has to be ensured that project momentum does not slacken just because there are no deadlines. An innovative monitoring system has to be designed and operationalised so that it can keep a tab on the pace of project implementation.

One disadvantage of providing such flexibility in the project design is that the project period and consequently project funding might come to an end much before the project area is covered and, consequently, many of the villages and communities might get left out. One way of preventing this is to set up a "trust fund" so that much or all of the project grant is invested and only the interest used for project activities.[21] This ensures that funding is available even after the initial project period and that project implementation has neither to be hurried nor prematurely terminated.

[21]For more details refer to the various documents and guidelines issued by the World Bank/GEF secretariat on trust funds. For example: *Issues and Options in the Design of GEF Supported Trust Funds for Biodiversity Conservation*, The World Bank, May 1994

4.3 How to phase in and phase out ICDPs?

Often there is a need to immediately restrict activities damaging to biodiversity resources in a PA, especially when any delay might cause irreversible loss or damage. However, substitution strategies for those local community incomes currently dependent on continued access to the PA might take a year or more to become operational. In such a circumstance a transitional phase strategy needs to be developed. This can make a provision to involve those affected by the proposed restrictions in soil and water conservation, afforestation and environmental regeneration activities in and around the PA. The project budget should have a provision for paying wages to these people in the interim before their own income generation activities, which are more sustainable than wage labour, have got off the ground.

In order to ensure that the phasing out of ICDPs is "painless", the project design must provide for a gradual reduction of investments over the last two years so that at the end of the project there is not a sudden and sharp decrease in financial support. However, if the option of setting up a trust fund, described earlier, is adopted, then the phasing out period available becomes much longer and it is easier to gradually phase out project funding without adversely affecting the sustainability of the project initiatives.

4.4 Are people and PAs necessarily incompatible?

One of the big questions in designing ICDPs is: how much and what types of human activities can be legitimately allowed in a PA? In recent years there has been a polarisation of perceptions in many of the countries in the region, with environmentalists often asking for all human "disturbance" to be stopped in a protected area while other groups want to open up protected areas to even greater than the present level of human use. The question becomes even more difficult when there are human settlements within protected areas and a decision has to be made on their relocation.

In rare cases, where traditional inhabitants of an area continue to live within a protected area in the same way as they lived historically without significant interaction with the world outside, there seems little reason to consider them a threat to the biodiversity of a PA. However, very few such communities remain today. In other cases, the law of the land clearly defines the human uses allowed inside a PA. However, where things are not so clear cut, difficult choices lie ahead.

Clearly involuntary relocation should be avoided, as it is not in harmony with the participative approach that characterises ICDPs. In some cases exclusion of human settlements from within a PA can be effected by redefining the boundaries and excluding those areas from the PA where human settlements exist. This is especially valid where the boundaries of a protected area have been arbitrarily defined, where the settlements are near or on the edge of the PA, and where the area so excluded is not of high ecological value and can be compensated by the same amount of area being added elsewhere to the PA.

Where such soft options are not available, efforts should be made to persuade the people to shift voluntarily. This is not always easy. However, it is possible if the track record of the PA management and the project authorities is good. For example, if those villagers who have shifted voluntarily are happy with their relocation site and facilities then others are encouraged to follow suit. Sometimes shifting settlements from the center to the periphery of the PA rather than taking them far away also helps to encourage them, especially when the new sites clearly have all the benefits of civilisation.

Can these projects be designed without any need for resettlement?

* The need to move people out of the target area is usually only a small part of the much bigger problem of encroachment. Any plan for resettlement should be placed in the context of a more comprehensive program to deal with other causes of encroachment (such as removing economic incentives to clear land inside the protected area for cinnamon growing as in the Indonesia case).

* Sometimes, despite best efforts, there is no alternative to resettling people to protect critically threatened biodiversity, but task managers are afraid to recommend it because the Bank's O.D. seems too onerous and/or because they fear criticism by NGOs. This significantly reduces the options available for biodiversity protection.

In Thailand, the threat of resettlement of recent encroachers living in reserve forests adjacent to the Huay Kha Khaeng Wildlife Sanctuary has been effectively used by the Sanctuary superintendent and staff in inducing these villagers to cooperate in containing certain destructive activities (e.g., grazing cattle inside the Sanctuary, hunting of wildlife, and setting uncontrolled fires).[22]

[22]ASTEN Briefing Note, op cit

In terms of other human uses, the carrying capacity of each PA has to be determined. However, considering the objective of ICDPs is biodiversity conservation, assessment of carrying capacity must include an assessment of the impact of such activities on the biodiversity of the area.

Indonesia

At a later stage resettlement became an issue and deadlock in project preparation. GOI had planned relocation of some 15,000 families. World Bank, following its own operational guidelines concluded that it could not be involved in the project as long as people would be involuntarily resettled. This in turn was declared by the Indonesian Government as interference in internal affairs and policies...[23]

4.5 How to find a correct balance between conservation objectives and development objectives?

One of the issues often debated regarding ICDPs is how much of the focus should be on the social and economic development of the people impacting on the PA, and how much should be on upgrading PA management and doing other things directly aimed at the conservation of biodiversity. In fact, this issue has become so contentious that there are "schools of thought" supporting both extremes. However, this is not a real issue. Given the generally accepted definition of ICDP (see section 2 above), almost all investments and activities in an ICDP project must be aimed at conservation. Even where investments are made in activities designed to promote the economic and social well being of the local people, they can only be justified in an ICDP if the ultimate aim of such investment is better conservation of the PA.

Some investment might be made in activities which are designed to gain the support of local communities by meeting what they see as critical priorities, even though these activities might not directly contribute to PA conservation. However, such activities could be justified as a part of ICDPs only if the goodwill and trust they create facilitates the main agenda of biodiversity conservation.

Another related question that is sometimes asked is : does the social and economic development of local communities at all contribute to biodiversity conservation and to the better protection of the PA? In other words, the whole basis of the ICDP approach is questioned.

[23]Sjaak Beerns and Jan Wind, op cit

Clearly there is no simple answer to this question, especially as there is no inherent link between socio-economic development and biodiversity conservation. In fact, it can be argued with merit that certain types of socio-economic development, especially when it leads to high levels of affluence, is detrimental to biodiversity conservation in so far as such affluence is usually accompanied by increased consumption and wastage of natural resources.

What are appropriate activities for an Integrated Conservation and Development Project or ICDP ?

* Although biodiversity conservation projects have traditionally focused on active protection measures, recently there has been a shift to include consideration of livelihood of people living in and around protected areas. This shift towards ICDPs has been necessary but problematic because of the difficulties of striking the right balance between conservation and development.

* The goal of an ICDP project should be the long-term protection of biodiversity using some socio-economic development activities in concert with active protection measures as means of achieving this goal.

* There should be an acknowledgment of the need to strike a delicate balance of scope and scale of socio-economic development activity. The proposed development activity should not be so lucrative as to attract new settlers to the protected area. Where development or ICDP activity cannot provide an attractive alternative to a high-income generating activity (such as cinnamon growing) within a protected area, it may be necessary to either exclude the area from the proposed park, or to involuntarily resettle people.

* All ICDP activities envisioned under the project should be clearly shown to directly address the threats to biodiversity. Pressures on park and target groups (income dependent and resource dependent groups) should be identified. Interventions should be directed at these groups and not conducted in the standard mode of rural development.

In Indonesia the government and the Bank/GEF had very different views on what ICDP activity is appropriate in a regional development context. There was a lack of agreement on the types of regional development activities that were compatible with biodiversity protection and the types of safeguards needed to ensure that

critical and important biological resources are protected. This disparity has substantially delayed the protect.[24]

A necessary precondition to linking socio-economic development with conservation is to establish a tradeoff, in the minds of the local community, between ICDP inputs to the community and the community's commitment to desist from degrading the PA and protecting it from others. Such a tradeoff should be codified in a "memorandum of understanding"(MOU) , with the continued flow of ICDP inputs being subject to the village community respecting the MOU.

Such MOUs have been generally successful in joint forest management programmes. However, MOUs might be difficult to ensure after project funding has stopped and the community sees no financial reason to continue to respect the MOU. It is, therefore, important that apart from legal and administrative instruments, the local community recognises and respects the fact that the socio-economic inputs coming through the project are in lieu of the access they have enjoyed to the PA and not in addition to it.

However, this is not easy to establish. First, there is sometimes a naive assumption that there is a finite income level at which people would be satisfied and not aspire for more. Unfortunately, even if the project ensures that better management of the PA does not result in a fall of incomes for the local communities, and perhaps even results in a modest increase, the natural tendency would be to seek further enhancement of incomes by continuing to use the PAs resources.

For this and other reasons, it is now generally recognised that any ICDP must go hand in hand with the strengthening of PA management and, therefore, ICDP plans must have corresponding PA management plans, with a clear interface between the two. In some cases, ICDP plans contain both the socio-economic plan and the PA management plan.

In other words, in a "worst case scenario", ICDPs make the enforcement of conservation laws and prescriptions politically and administratively easier, and somewhat less unjust. This they do by providing alternatives and substitutes to the impacting communities, and by opening up a dialogue with them and giving them a greater sense of ownership over, and participation in the management of, the PA.

However, ICDPs attempt to much more, and in an ideal scenario they would establish a pattern of sustainable use of natural resources in and around PAs. They would

[24]ASTEN Briefing Paper, op cit

ensure that, by linking up socio-economic inputs with conservation goals, the pressures on the PA were voluntarily removed and that local communities increasingly took up their protection and management. Most ICDPs are perhaps destined to fall in between these two extremes.

4.6. Is developing an economic stake in conservation essential for sustainability?

It is often stated that rural communities would not be interested in conserving natural resources unless they can see some economic advantage for themselves in doing so. Consequently, there is pressure on ICDPs to build-in activities which add economic value to biological resources. Some of the more popular such activities involve bio-prospecting, commercial use of medicinal and aromatic plants, use of biological raw materials for artisan activities etc.

For one, a belief that people will only conserve if they have a economic incentive to do so is unnecessarily cynical and contradicted by the numerous examples of community based conservation, both past and present, which have been well documented. Perhaps what is important to recognise is that, with the best of will, people cannot conserve nature if they do not have the wherewithal to meet their basic subsistence needs without destroying it. In other words, conservation cannot be done when it means starvation to the conserving community. However, once basic needs have been met, then there is no reason to believe that local communities would only conserve if they are paid to do it. Perhaps what they need is a sense of ownership towards their natural resources and a confidence that conservation benefits would continue to be theirs, even if they are, in economic terms, less than the cost.

In fact, there is an inherent danger in the commoditisation of biological resources that this would lead to greater pressure on these resources. For example, it is because the bones and other parts of the tiger are being used for traditional medicines that tiger poaching has got so rampant. Similarly, many plants in the wild face the threat of extinction because commercial value has been attached to them and, therefore, their exploitation has become lucrative and, consequently, unsustainable.

4.7 How to prevent the "magnet syndrome"?

Another major fear associated with ICDPs is that investments in socio-economic development around the periphery of a PA would lead to immigration into the area thereby, in the medium and long term, heightening rather than lessening pressures

on the PA. This fear is lent credence when one witnesses, in the region, large movements of rural populations to urban centers, in search of jobs and a "better" life.

Though this danger is ever present in ICDPs, it can be anticipated and minimised. In many cases, the areas surrounding the PAs are historically neglected by the "development" process and therefore relatively poorer, economically, than other areas. As part of the ecodevelopment planning process in India, a detailed socio-economic study was carried out of the districts within which the eight selected protected areas were located. The findings showed that in each and every case the areas adjacent to the PA were relatively less advantaged, in terms of economic indicators and infrastructure, than the rest of the district. As ICDP inputs are restricted mainly to the adjacent area, if they are appropriate, and do not construct large infrastructures like dams and irrigation canals, it is very unlikely that the levels of investment available would take the region even to the level of the rest of the district, leave alone surpass it and, thereby, become a potential magnet.

Another option, especially for areas which are not clearly disadvantaged, is to distinguish between geographical and economic buffers to a PA. Whereas the geographical buffers are adjacent to the PA, economic buffers can be established away from the PA boundaries, and a bulk of socio-economic infrastructural development focussed there. This would encourage human pressures to move away rather than towards the PA.

These projects should be designed carefully, so as to attain a balance between incentives (sufficient to encourage movement out of protected areas and inner buffer zones) and sanctions (to inhibit additional forest encroachment and increased use of forest resources). Without this balance, the inherent conflicts in ICDP projects will be enhanced. Incentives may instead serve as a magnet attracting rural poor to ICDP sites that provide more easily accessible public facilities and services. At the same time, sanctions that are applied too strictly and without sensitivity to local customs and cultures may result in abridgement of human rights.[25]

In order to minimize the danger of ICDP investments becoming counterproductive to PA conservation, it is also important to develop a land use policy for the surrounding areas and to ensure that human activities in the buffer zones are

[25]Anthony M. Zola, Op cit

regulated so that activities and concentrations detrimental to PA conservation are not allowed to come up. Plans and activities of other agencies, including government agencies, active in the region must also be in harmony with the ICDP objectives. And, in order to facilitate proper coordination, the surrounds of a PA, especially as far as the ICDP activities extend, must be put under the control of the PA manager.

In India, the Environment (Protection) Act is being invoked in areas adjacent to the PAs executing ecodevelopment projects. Under this act, only specified activities and land use are permitted. Also, control over the project area outside the PA is being transferred to the PA manager.

Nevertheless, however successful an ICDP is, in the long term it would not be sufficient to conserve the PA unless the provincial, state and national processes of development became environment friendly. For this reason, the ICDP process must not restrict its influence to just the PA and its surrounds, but must impact on larger policies and plans. Only when ICDPs were established for whole nations, and for the world, would individual PAs become secure.

Biodiversity projects should not be restricted to assisting local communities at the border of conservation areas (this is still the main perception by public, local governments and NGOs in the case of Kerinci Seblat). The scope should be much wider and include "push and pull mechanisms" of investment over a whole region and beyond.[26]

4.8 **How to integrate among sectors and levels of the Government?**

Integrated and coordinated action, by sectors and agencies active in the project area, is critical for the success of an ICDP. This is not only essential to ensure that activities of other agencies do not negate ICDP efforts, but also in order to focus sparse human and financial resources in a manner that is optimal.

Unfortunately, in most countries of the region this is not easy to achieve. Bureaucracies have been aptly described as having vertical loyalties and horizontal animosities.

Just as it is important to integrate sectorally, so is it important to integrate different levels of the government. In many countries, environmental concern is significant either at the local, grass roots level, where it links up with traditional community conservation values and is fuelled by the immediate socio-economic

[26] BV Sjaak Beerens and Jan Wind, DHV Consultants, "Integrated Conservation and Development Project : Kerinci Seblat National Park - Indonesia : Lessons Learnt", December, 1993

impacts of environmental degradation, or at the national level, where powerful national and international environmental lobbies operate. Much of the middle ranks of the government have little interest in environmental issues. However, it is this middle level of the government which directly controls ICDPs.

In the Thai context, the local administration offices (district and provincial levels) are the key central government units responsible for conflict resolution. They tend to be bias against conservation, have little understanding of conservation concepts, and thus lack conservation ethics.[27]

In order to facilitate sectoral integration at the local level, a formal coordination mechanism, with representation from all concerned agencies, needs to be set up. It must be an important objective of ICDPs to operationalise and make effective such a mechanism. In order to get the support of various agencies, it is crucial that they be involved in the ICDP right from the design phase and their views and expertise be appropriately dealt with. Without involving them from the beginning, neither line agencies nor the local community should be expected to support the project.

Integration across levels needs coordination structures at these various levels : province/state, and national. It is always useful to involve senior government persons in these committees so that the process gains prestige in the eyes of the bureaucracy. It is also important to clearly explain the character of ICDPs at senior levels, especially to politicians. Experience has shown that, initially there is a lack of interest and sometimes even a lack of support for ICDPs, among politicians, because they assume that it is another protection and conservation programme which seeks to further restrict access to the PA, and thereby cause resentment among local people. However, when they understand the development component of the ICDP, they often become avid supporters and help build a support for the approach within the government.

4.9 **How to interface with traditional methods of conservation?**

In many parts of the region there is a strong tradition of conservation of both specific species and of wilderness areas. Almost all religions prescribe protection for specific species of plants and animals. This is reinforced by cultural mores. Specific areas have also been conserved in various ways, for example as sacred groves and temple forests. Consequently, there is often a demand and also a justification for incorporating traditional methods of conservation into the design of ICDPs.

[27]Anthony M. Zola, op cit

Traditional methods of conservation have been tried and tested and have evolved over hundreds, sometimes thousands of years. Also, many of these strategies have been adapted to local ecological and socio-economic conditions. They also involve skills and attitudes already present in local communities, thereby obviating the need for expensive and time consuming human resources development and attitudinal changes.

However, there are certain inherent dangers in depending too much on traditional strategies, especially without careful study. For one, many of these traditional systems were effective in the conditions which prevailed at the time of their evolution. As, since then, much has changed, the systems need to be reassessed for their affectivity.

For example, many of the traditional conservation strategies were based on religious and cultural beliefs. As the hold of religion is becoming tenuous, and cultural beliefs are fading, especially among the younger generations, the efficacy of a religious and cultural conservation ethics needs to be reexamined.