



An Assessment of Post Tsunami Restoration and Conservation Initiatives in Thailand

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This is a working paper to be finalized during a stakeholder consultative workshop scheduled from March 16-19, 2009.

Executive Summary

IUCN Asia commissioned this assessment of post-tsunami restoration/rehabilitation and conservation initiatives in Thailand to use as a baseline for effective development of further restoration of ecosystems and livelihoods projects. In addition to reviewing all significant projects, the assessment was to recommend three major projects that IUCN should work with as partners in the future.

The report has been based on a desk review of project reports and other relevant documentation followed by interviews with key personnel in projects and with various officials.

The main findings of the study are:

- ❑ There has been relatively little coordination of environmental rehabilitation efforts between various NGOs, aid agencies and government departments.
- ❑ Some of the rehabilitation efforts have had unintended consequences to some groups of people or to conservation.
- ❑ It has been very difficult to obtain clear evidence of the success of environmental rehabilitation efforts because data is of poor quality. For example figures for mangrove restoration are given but without detail about location and without survival rates.
- ❑ Much of the work done has been site-specific and lacks a coordinated approach or an overall landscape approach.

In preparing the report it has been very difficult to make very detailed assessments of the success or achievements of various activities. For these reasons a major focus in recommendations is on improved monitoring and evaluation.

The report recommends:

- ❑ It is recommended that IUCN considers future work with the three “major” or “priority” projects identified: DMCR, TEI and Raks Thai. In addition to these three projects IUCN should consider collaborating with other projects including WFT, WWF, SAN and PDA.
- ❑ Improved Monitoring and evaluation of all project activities is essential. This includes:
 - Emphasis should be placed on making sure that social impact studies are carried out for all future projects and that the results are used to review project activities. These evaluations should involve community participation and should be carried out by independent people if possible.
 - Proper baseline data (location, resource condition etc) should be obtained for all natural resource rehabilitation work.

- All ecosystem rehabilitation projects should have a system for assessing the effectiveness of activities, preferably through some sort of independent verification.
- Monitoring of rehabilitation work should include survival rates.
- ❑ In order to achieve better coordination among NGOs who work in similar topic areas consultation meetings are essential. There is a need to identify clearly the roles of partners.
- ❑ Rather than focusing on achieving targets such as areas of mangrove plantation, emphasis could be placed on developing innovative ways of restoring mangroves and organising sustainable mangrove use etc.
- ❑ Emphasis should be placed on strengthening and widening networking among target work areas and organisations.
- ❑ IUCN could play a valuable role in advocating and facilitating a negotiated landscape approach in order to avoid both uncoordinated site-based rehabilitation and inappropriate centralised planning. This would help to address both ecosystem issues and social issues related to natural resource use.

Introduction

Background:

The six provinces along the Andaman Coast of Thailand that were affected by the 26th December 2004 tsunami were Ranong, Phang Nga, Phuket, Krabi, Trang and Satun. The tsunami damaged coastal ecosystems and livelihoods. A number of both government and non government organizations responded with action on immediate relief and long term restoration and/or rehabilitation of environment and livelihoods. Many agencies have been working on natural resources rehabilitation including mangrove, seagrass and coral reefs in these areas. Different areas have different issues and degrees of impacts and effectiveness.

IUCN Asia has commissioned an assessment of post-tsunami restoration¹ and conservation initiatives in Thailand to use as a baseline for effective development of further restoration of ecosystems and livelihoods projects.

Terms of Reference:

The purpose of this study was to carry out an assessment all post-tsunami restoration and conservation initiatives and projects in selected districts in Thailand and to synthesise the available information of activities including type of activity, duration, scope, geographical area, progress to date and budget of initiative.

During the study process, three major agencies involved in restoration and conservation work post-tsunami needed to be identified as well as a detailed summary of the restoration and conservation work of these three agencies. All major relevant initiatives/projects carried out by each agency and basic information on each initiative and the objectives and planned outputs of the work also were to be listed.

IUCN expected to see a thoughtful analysis of the successes and failures of the restoration through analyses of conservation work carried out by these 3 agencies, looking at aspects such as:

- how it has achieved/not achieved what it set out to do
- what the gaps and problems were
- suggestions for improvement
- gender aspects of environmental degradation arising out of tsunami rehabilitation (e.g. different impacts on the livelihoods of women and men).

¹ IUCN 2005 makes a distinction between ecosystem rehabilitation, where “most of the key ecological processes and functions are re-established and some but not all of the former biodiversity is recovered” and restoration where “all of the key ecological processes and functions are re-established and all of the original biodiversity is re-established”. The terms are not always used this way in the literature surveyed for this report (including in the TOR), but it is clear that most of the post-tsunami work has been ecosystem rehabilitation, not restoration.

Approach to assessment of projects:

The approach for the study was a combination of secondary data analysis, review of major project databases, literature reviews, and direct interviews with key informants from communities, NGOs and government agencies.

The study focuses on the impacts of rehabilitation projects including unintended impacts which have been identified during project implementation.

In assessment of performance particularly of the three major agencies, the following questions have been considered²:

- Have rehabilitation interventions involved relevant stakeholders in decision-making or adopted the participatory approach in the project work?
- Have projects taken an adaptive management or learning approach and adjusted activities and strategies according to impacts and the consequence of change during projects implementation?
- Do projects have effective scope/scale of work in order to reach sustainability of human and natural ecosystems? (What is the extent of coverage?)
- How effective have the projects been in achieving rehabilitation
- What has been the impact of the project?
- How sustainable are project activities?
- How well coordinated are the activities?

These questions are used to assess the work of various agencies that have activities on the ground. However, as the information available is not comprehensive, it has not been possible to apply each question to every project. The questions are more a list of possible questions to be asked for each project.

Impacts of Tsunami and Relief Efforts

Overview of Andaman coast

The Andaman Coast of Thailand is a part of the Bay of Bengal and is approximately 1,014 Kilometres in length running from Ranong to Satun province.

All along the coast areas are covered by natural resources such as mangrove, beach forest, seagrass, coral reefs and wildlife. Phang Nga is the richest of the natural resources with 41,971 hectares of mangrove (23% of the 6 provinces tsunami affected areas) and has 2,560 hectares of coral reef (33 % of the 6 provinces

² These questions have been partly based on suggestions from the IUCN Guidelines on post-tsunami rehabilitation of environment and livelihoods (IUCN 2005) and partly on the type of issues considered in a joint evaluation of the first few months of tsunami response carried out for World Vision and Care International (Mashni et al 2005) which looked at a number of key issues to assess rehabilitation of livelihoods.

tsunami affected areas). Satun has also a large number of mangrove areas as well as Krabi and Trang (DMCR, 2005).

Table of mangrove, seagrass and coral reef areas along the Andaman Coast before tsunami 2004

| Province | Mangrove* (Hectare) | Seagrass (Hectare) | Coral Reef (Hectare) |
|-----------|------------------------|-----------------------|-------------------------|
| Ranong | 27,254 | 123.4 | 257 |
| Phang Nga | 41,971 | 1,900 | 2,560 |
| Phuket | 1,876 | 1,000 | 1,663 |
| Krabi | 35,094 | 2,100 | 1,353 |
| Trang | 35,788 | 2,800 | 449 |
| Satun | 39,332 | 13.9 | 1,579 |
| Total | 181,315 | 7,937 | 7,861 |

* Modified from mangrove coverage data in year 2000-2002 (DMCR, 2005)

An analysis of coastal resources in Thailand in the *Thailand Environmental Monitor 2006* (World Bank 2006) provides an overview of coastal resources in Thailand without providing detailed breakdowns of regions such as the Andaman Coast. While the report mentions the tsunami, it deals with longer term trends and pressures. Some key points are:

- ❑ Large areas of mangroves have been lost in the past, especially as a result of conversion to shrimp farming. Mangroves remain under pressure, but the total areas of mangroves have increased due to replanting work.
- ❑ 80% of coral reefs in the Andaman are classified as being between “fair” and “very bad” condition.
- ❑ Sea grass beds generally remain healthy.
- ❑ Major threats include natural hazards, development activities (including tourism development, tin mining, sand mining and industrial development) and unsustainable fishing.

While the impacts of the tsunami have been considerable, it is important to recognise these continuing threats to coastal resources and livelihoods.

Tsunami impacts covered extensive areas and affected both physical environment and human use values. While the most affected areas in terms of human lives and human use (community areas and intensive urban area) were in Phuket, Phang Nga had highest degree of impact on environment and natural resources (Vimut, 2005). Krabi, Trang and Satun are considered to have low impacts on natural resources and livelihoods.

According to DMCR (2006) and de Silva (2007) relatively little damage was done to seagrass and mangrove ecosystems in Thailand. However, this differed in various locations. Most of the damage done to mangroves occurred in Kuraburi District, Phang Nga Province, including Koh Phra Tong. Along the Andaman coast 306

hectares of Mangrove forest was found to have been destroyed by the tsunami³, of which there were 304 hectares in Phang Nga and 2 hectares in Satun (Vimut, 2005). There was some evidence of mangrove destruction through uprooting. However, the long term impact will occur with mangrove areas having mud and clay on their root systems.

The tsunami had little impact on seagrass affecting 5% of the total seagrass area in Andaman coast which is found in Koh Yao Yai, Phang Nga province and Koh Libong, Trang where is considered to be the biggest seagrass area of the coast. According to ONEP (2006)⁴, the seagrasses are naturally resilient and mostly recovered naturally within two years.

Coral reefs were among the resources affected directly by the tsunami waves. The ONEP report (2006) mentions that there were 80 square kilometres of coral reefs in the Andaman Sea prior to the tsunami and approximately 80 square kilometres were damaged by the tsunami in different ways (and to different extents). The damaged coral areas were found mostly in Phi Phi island in Krabi province and Surin and Similan islands in Phang Nga province as well as the shallow water reef around Phuket island (DMCR, 2006a). Presumably this means the "most" damaged areas.

In the ONEP report, there is little detail about the impacts of rehabilitation and the report mentions that constraints such as "the size of the areas needing assistance, budget and personnel, restricted the pace of rehabilitation" leading to dependence on "mostly on... natural recovery which took time" (p 45).

Relief Efforts and Issues

Before reviewing the activities of particular projects involved in post-tsunami rehabilitation, it is useful to look at some of the general issues raised about rehabilitation and relief efforts. A report prepared for World Vision and CARE International (Mashni et al 2005) was based on study only a few months after the tsunami. It deals only with initial relief efforts and not longer-term rehabilitation and reconstruction. But some of the issues raised are relevant over the longer term also. Some of the issues were:

- There were problems of coordination between agencies.
- There were gaps in the types of people assisted by the relief efforts. This included attention paid to minorities (such as Moklen and Burmese migrants)
- There were problems related to tenure.

Tenure issues have come up in many reports. Some of the coastal people whose homes were destroyed by the tsunami lost the documents to prove their land tenure, others, such as many of the Moklen living on such places as Koh Phra Tong, did not

³ This is a very small amount of damage compared to the pre-tsunami mangrove areas. The reported post-tsunami mangrove rehabilitation seems to greatly exceed the areas damaged.

⁴ ONEP (2006) assessed the conditions of natural resources and environment before and two years after the tsunami.

have legal tenure and government authorities sometimes prevented relief agencies from providing new houses in such cases. Also on Koh Phra Tong, according to Ferrari et al (2006), Moklen access to their land has gradually been decreased since the tsunami as a result of new regulations. On the mainland, in some cases powerful people used the difficulty faced by of people trying to prove tenure as a chance to seize land (Kaewkuntee 2006).

Some interventions have unintended consequences. One unintended consequence of relief efforts was that too many fishing boats and too much fishing gear were supplied in some places. In the islands around Kuraburi District in Phang Nga Province de Silva (2007) mentions that the increased number of fishing boats due to the relief effort may have been a threat to the turtle populations. The provision of replacement boats also had social impacts. For example, fishermen sometimes needed capital for fishing or other expenses and some middlemen bought the boats and then paid the fishermen by weight of catch. The fishermen became paid workers instead of independent (personal observation). This has always happened but apparently was common after the tsunami.

Until it closed earlier this year, the Disaster Tracking Recovery Center (D-TRAC) focused on facilitating coordination between agencies by collecting and providing information on tsunami related aid organisations and researchers. According the D-TRAC there were over 135 organisations working in Thailand after the tsunami (www.d-trac.org). Some of these agencies have already ended their work and closed their offices (such as World Concern and North Andaman Tsunami Relief – NATR). Some have continued working, sometimes changing their focus from tsunami relief or immediate aid to long term coastal resource rehabilitation, protection, disaster preparedness, education etc.

Stephenson (nd), based on an internet search, identified fifty-two organisations that worked in “environmental restoration work and livelihood work that has a secondary impact on the environment” (“provision of fishing gear and provision of shelter”).

It is not possible to examine all of these agencies in the space available for this report. For this reason the report focuses on agencies involved specifically in environmental or livelihood rehabilitation and ignores organisations and projects focusing on assessment only and very small organisations.

It is fairly easy to get basic project information, but it is quite difficult to find the real impact and results of interventions.⁵ One reason is that the statistics provided by projects are not always accurate and sometimes ignore important aspects such as unintended consequences. For example plantation figures do not usually reflect the survival rate. It is not easy to check the reliability of statistics because they are not usually checked by people outside the project. The report mentions where there are reasons to doubt, but all figures should be seen as approximate at best.

⁵ Stephenson (nd) reports on a rapid assessment of NGOs working in environmental rehabilitation after the tsunami. She says that basic data on many organisations (available on the internet) was very incomplete. For example “4 of the 7 organizations that are purely humanitarian didn’t have their mangrove work documented anywhere” (p 13).

Overview of the agencies involved in rehabilitation

Department of National Parks (DNP)

Laemson National Park is located on the Andaman coast in Ranong and Phangnga provinces. It consists of approximately 60km of coastline and 15 islands.

| <i>Name of Project and Description</i> | <i>period</i> | <i>Approx. Budget</i> | <i>Geographic area /eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|---|---------------|---|---|--|---|
| Joint Management of Protected Area- Rehabilitation for Environment Effects of the Tsunami (JoMPA-REEFT) | 2004-2007 | 18 Million THB (Plus the annual budget support 5.2 million THB) | Located on the Andaman sea coast in Phang Nga and Ranong It is a marine national park with coastal environment. The sea around the islands and offshore is rich in marine life with many habitats present including coral reefs, open water, seagrass beds, mangrove swamp, estuarine and beach. | <ul style="list-style-type: none"> - Forest ecology rehabilitation by beach forest and quick growing planting - Community capacity building - Sharing knowledge and experience to other tsunami affected national parks | <ul style="list-style-type: none"> - 500 rais Mangrove planting (target area was 200 rais) - 800 rais forest conservation by people's participation - Organise training courses for communities on aquaculture, food processing and natural conservation |

Assessment and comments:

The mangrove planted area has been changed from 200 rais to 500 rais when the national park survey showed the tsunami affected mangrove areas are more than 200 rais. The areas to plant mangrove is 10 metres off shore along the original mangrove forest which was considered as a degraded area. There is no report of the success of planting (survival rates etc.).

The project was suggested by the project committee to work more on people's participation. This is also the same lesson learned from a study visit to a national park in Indonesia that there is a need to work collaboratively with Laemson national park stakeholders such as TAO, community leader, representatives from community mangrove forest network and project staff.

The project has organised a training course on mangrove restoration and only focused on students (not other stakeholders) and gets student to plant mangrove trees.

No information on joint management was available in the documentation seen, although “joint management” is apart of the project title.

The project staff are concerned with the boundaries of the national park rather than with the resource boundaries. The traditional style of national park management makes it difficult for them to work in a participatory way with villagers.

Sources:

JoMPA-REEFT progress report, 2006.

Population Development Association (PDA)

Established in 1974, PDA is a non-government organization operating from Bangkok, 16 regional development centres and branch offices in rural Thailand. PDA was first active in promoting family planning in urban and rural areas of Thailand. Now there are many programs including integrated rural development, water resource development, local institution building, medical and health services, population control and AIDS care activities, income generation and occupational training, and forestry and environmental conservation.

| <i>Name of Project and Description</i> | <i>period</i> | <i>Approx. Budget</i> | <i>Geographic area /Eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|--|-----------------------|-----------------------|---|---|--|
| Post-Tsunami Sustainable Livelihood Rehabilitation Project | 2005-2008 On going | 225 Million THB | 64 villages in Phang Nga and Krabi which has tree planting in 52 villages. In July 2007 plan to work in Phuket. | <ul style="list-style-type: none"> - Develop quality of life (education, youth activities, income generation, livelihoods improvement) - Strengthen local community in environment management (Tree planting and coastal zone protection) | <ul style="list-style-type: none"> - Mangrove planting in Krabi 176 rais and Phang Nga 132 Rais |

Assessment and comments:

PDA with 30 years experience working with community has a very clear process with clear steps in community preparation and empowerment including: 1. Assessment and preliminary planning, 2. Field trips for additional ideas (“eye opener”), 3. Detailed planning and 4. Implementation and monitoring. This approach means that PDA often works quite independently of other NGOs, but they have good relationships with government officials because they are well known.

PDA's philosophy is to build community capacity particularly on health and social issues and to respect local traditions, but there is not much on natural resources management. However, they have found a lesson learned from project implementation that environmental and natural resources management should become a greater focus in the future as local people rely on natural resources heavily and affected by natural resource changes. The idea to give 20 baht per each tree planting is a good strategy to generate income and encourage local peoples' participation after the tsunami, but it cannot be ensured this idea will create sustainability.

PDA has strongly encouraged gender equity with a rule to have 50% women members in community committees as well as the representatives from variant group such as youth, official leaders.

PDA has strengths in rural development areas. However, they prefer to work with government organisations rather than NGOs.

Sources:

Post-Tsunami Sustainable Livelihood Rehabilitation Project Report, May 2006

Save Andaman Network (SAN)

| <i>Name of Project and Description</i> | <i>period</i> | <i>Approx. Budget</i> | <i>Geographic area /Eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|--|--|-----------------------|--|---|---|
| Save Andaman Network | Phase I 2004-2006 | 140 Million THB | 6 Post-tsunami provinces. There are 418 villages on | - Tsunami recovery: revolving fund, house construction, boats and fishing equipments and livelihoods rehabilitation | - 80 % of the target achieved on tsunami recovery |
| | - Community capacity building and local wisdom | | | - Integrated coastal zoning in 4 pilot communities in Trang | |

| | | | | | |
|--|-----------|---|---------------|---|--|
| | 2007-2009 | - | Andaman coast | rehabilitation on coastal resources management - Coastal community networking and enhancement - Integrated coastal zone | - There are 4 villages in Satun have planted 20 Rais in degraded mangrove areas. |
|--|-----------|---|---------------|---|--|

Assessment and comments:

In the first phase SAN concentrated on relief work, especially providing boats and fishing gear. It has now changed its focus to also work on capacity building and networking.

SAN has developed based on local coastal NGO network and is strong in the community fishery movement and works closely with the Federation of Southern Fisher Folk and Small Scale Fishing Clubs in southern provinces (they work with CHARM⁶, WFT and Sustainable Development Foundation-SDF). SAN is good at networking.

SAN claims they are an area based organisation and works closely based on local needs and situation. SAN points out that the activities designed on a project basis (with a time frame ending when the project ends) limit SAN's long term work such as developing a learning process in community and capacity building through which they try to promote a self-initiative approach by local people. Many communities prefer to work with only a short term project and expect concrete aid or funding.

Revolving fund projects failed mostly in communities which have too many organizations working on funding support.

SAN is the only NGO among the NGOs reviewed which is working in Satun. In Satun four communities collaborated among themselves to pool financial resources for in-filling degraded mangrove areas.

SAN is very effective on networking, but has only one staff member for each province to manage a very large program so it often sub-contracts to other projects.

Sources:

- Progress report (January 2005-March 2006)

⁶ CHARM is the Coastal Habitats and Resources Management Project (2003-2007).

- ❑ Draft progress report (April 2006-March 2007)
- ❑ "Life, Community and Sea Restoration-Post-Tsunami Community Rehabilitation Approach
- ❑ <http://www.saveandaman.com>

World Wide Fund for Nature (WWF)

The Marine and Coastal Unit, WWF Thailand, is one of the organizations that work in conserving Thailand 's marine and coastal resources. This unit does so by integrating multiple processes in reaching the ultimate goal of sustainable development. Throughout this time, there have been various operations. Such operations include policy lobbying for conservation of natural resources and environment.

| <i>Name of Project and Description</i> | <i>period</i> | <i>Approx. Budget</i> | <i>Geographic area /Eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|--|---------------|-----------------------|--|---|--|
| Integrated coastal management zone project | 2005-2007 | 9 Million | Khao lampi-Had Tai Muang National Park, 16 communities from 4 sub- districts, Tai Muang District, Phang Nga. | <ul style="list-style-type: none"> - To build Had Tai Muang national park officers capacity in integrated coastal zone management - To promote and help those coastal communities that affected by tsunami, get strong realizing on economic value and ecosystem of marine and coastal resources. | <ul style="list-style-type: none"> - 50 rais mangrove planting in Ban Tha Dindang - Improve fish habitat using 200 cement square blocks - Artificial coral reef |

Assessment and comments:

The land issue is a critical point for WWF Thailand's lesson learned. After the tsunami some local people sold land to outsiders and later they come back to the village with a legal document or land title which covers the villager's land.

WWF Thailand can see a big gap between the government reform and building the capacity of TAO officers which are not consistent as the officers lack understanding and experience on working with communities. So they support the capacity building of all stakeholders (community, TAO, PAO, national park officers).

WWF Thailand believes that alternative livelihoods need to be promoted as well as natural resource management.

A strength of the WWF Thailand project is that the staff are very open and active. The project shows a lot of potential as a learning project. However it is very small (only one district) and would have limited potential as an MFF partner.

Sources:

Draft of project final report

Wildlife Fund Thailand (WFT)

Established in 1983, under The Royal Patronage of H.M. the Queen of Thailand. WFT is a private, non-profit organization dedicated to the conservation of natural resources and the maintenance of biological diversity and to a balanced environment to ensure long term success in national development. WFT's main objective is to invite and encourage people to help manage and be aware of environmental issues developed or developing in Thailand, through studies conducted by various WFT projects.

| <i>Name of Project and Description</i> | <i>period</i> | <i>Approx. Budget</i> | <i>Geographic area /Eco-system</i> | <i>What they try to do</i> | <i>Actual/Progress</i> |
|---|-----------------------|-----------------------|--|--|--|
| Participatory mangrove management of the Andaman coast (Phuket-Phang Nga) using local knowledge | 2004-2006 Finished | - | 20 mangrove forest communities along Andaman Coast in Phang Nga and Phuket | <ul style="list-style-type: none"> - To encourage and facilitate the community to develop appropriate community mangrove forest practice by using participatory and local knowledge - To strengthen the capability of the community forest - To strengthen networking among coastal and mangrove forest communities along the Andaman coast | <ul style="list-style-type: none"> - 13 community mangrove forest plans have been developed - 5 communities with 2000 rais of mangrove forest have registered community forest with RFD and 8 communities with 4000 rais of mangrove on waited list in registration process - Mangrove planting in 2 communities and most of the work on conservation and protection such as community demarcation has been done in 12 villages |

Note: This project is one of several WFT activities on mangrove rehabilitation. It is now complete, but the other projects continue with separate budgets.

Assessment and comments:

WFT made some comments about lessons learned: They found the community learning network had started among communities in the project. An attempt to link community resource management and religion was a good strategy and incentive for local people's participation. The project has been supported by UNDP to empower communities to work on their own practice to manage mangroves.

They also learned that building relationships and local government participation are essential to community mangrove forest management and that the capacity of communities needs to be built continuously and regularly as there are some communities that still need to be motivated by NGOs. There are many skills and issues required for field staff such as facilitation skills, conflict management, understanding and recognising of the goal or work and participatory approach etc.

WFT is a partner with many other NGOs and is strong in participatory approaches and networking. They have considerable potential as partners.

Sources:

The implementation and impacts analysis of community mangrove forest management in Phuket and Phang Nga.

The United States Agency for International Development (USAID)

USAID through the Regional Development Mission/Asia (RDM/A) is supporting a program designed to enhance the capability of local government to coordinate and plan strategic rehabilitation efforts in coastal areas. This 36-month effort is implemented by the Asian Institute of Technology, University of Rhode Island, and University of Hawaii in cooperation with the TAO (Tambon Administrative Office) and other supporting government and non-government partners. The program was designed in response to the priority needs for international assistance requested by Royal Thai Government through several task forces formed by the cabinet immediately following the disaster.

| <i>Name of Project and Description</i> | <i>period</i> | <i>Approx Budget</i> | <i>Geographic area /Eco-system</i> | <i>What they try to do</i> | <i>Actual/Progress</i> |
|--|-----------------------|----------------------|--|---|--|
| Post-Tsunami Sustainable Coastal Livelihoods Program: The goal of the program is to | 2005-2007 on going | 2 USD million | Implementing a demonstration rehabilitation effort in five villages - Tale Nok, Tub Nua, Champion, Phukhao Thong and | - Rebuild and Diversify Sustainable Livelihoods: Livelihood Development Revolving Fund, alternative livelihoods | - - Set up revolving funds in 5 villages - - Community-based disaster |

| | | | | | |
|---|--|--|--|--|---|
| demonstrate how participatory, issue driven and results-oriented processes can be applied to restart livelihoods and rehabilitate coastal communities affected by the tsunami in several coastal villages along the coast of the Andaman Sea. | | | Hadsai Khao - along the Andaman Sea coast in the Suk Samran District of Ranong Province. | <ul style="list-style-type: none"> - Coastal Public Infrastructure and Disaster Management Preparedness - Capacity Building: TAO planning and Better Governance Training, Exchange Program | <ul style="list-style-type: none"> management curriculum and outreach materials - - livelihoods and income generating projects - - TAO capacity development training |
|---|--|--|--|--|---|

Assessment and comments:

The USAID project has a significant budget, but is focused on a small number of villages. The project is quite well conceptualised with a strong emphasis on integrated planning. There is not much information available on the extent of actual impacts. Although a detailed Participatory Rural Appraisal (Pongquam et al 2005) was carried out to identify needs and constraints, there does not appear to be much information on the actual impacts of the project.

The project has a strong strategic focus on working with the TAO.

The project is mostly concerned with sustainable livelihoods but makes points out the connection between sustainable livelihoods and conservation.

Project staff made a number of points (lessons learned) about the implementation of the project:

- ❑ Because of the complexity of culture and social aspects, project activities need to be appropriate and well designed for both ethnic Thai and Muslim cultures.
- ❑ USAID is flexible about working with other NGOs and participates in joint activities such as with CARE accounting skills training and NART eco-tourism training
- ❑ Suggest to focus on particular issue not to variety topics to work on.
- ❑ To work on revolving funds really needs staff to have appropriate skills and it is essential to ensure that villagers will be able to hand on the activities.
- ❑ Different NGOs work on waste management in the same village, but they have different methods and there is no coordination between organisations.

The project has many strengths, especially as a learning project, but will be closing soon.

Sources:

Pongquam et al 2005.

Yadfon Association

Yadfon Association is a Thai NGO based in Trang, which was established in 1985, and works with local communities to promote the sustainable management of coastal natural resources. Yadfon has been working in villages located along the Palian River watershed to oppose inappropriate development projects and support local conservation efforts.

| <i>Name of Project and Description</i> | <i>Period</i> | <i>Approx. Budget</i> | <i>Geographic area /Eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|--|---------------|-----------------------|---|---|---------------------------------------|
| Community mangrove forest in Palian river watershed: Yadfon tries to link different groups in the watershed to promote conservation and resource management issue or this program is called mountain to reef. | | | <ul style="list-style-type: none"> - 9 community mangrove forest with 20,778 rais of total mangrove area covered in 4 districts of Trang province - Yadfon has been working with total 22 mangrove forest communities 6 district cover 32,300 rais - Working area are covered swamp, sago palm, mangrove forest and seagrass | <ul style="list-style-type: none"> - To strengthen the capability of the community in developing and implementing community forest management - To develop learning processes and widen networking among forest user groups in the watershed - To encourage and facilitate the community and different group of people (teachers, health dept. officers etc.) to develop an appropriate research for sustainable and rare production of mangroves as a learning process. | Not Available |

Assessment and comments:

YF has been developing an innovation to restore abandon shrimp farming area to sago palm and they believe this will help to stop oil palm plantation expansion. YF is looking mangrove resource issue as a tool to promote local peoples' participation and strengthen local community and outsiders work on biodiversity and sustainable use

YF has strong comments on government methods to plant mangrove. They found evidence (photos) that DMCR clear cut and burnt forest areas to replant mangrove. They believe this is a result of mangrove plantation policy and the way DMCR tries to reach the target for area planting and budget expenditure. In fact there is not much area for new planting mangrove.

YF also argues that many government development projects affect mangrove ecology and livelihoods (for example sand digging where they put sand onto mangrove tree roots which gradually die and change the hydrology of mangrove).

YF works in only one province (Trang). It has a reputation for being very critical of other projects and for not being easy to work with.

Sources:

Booklets on mangrove community forest in Palian river watershed

Priority projects

This section identifies three major projects which each have a lot of potential for coastal resource and livelihoods rehabilitation in different ways. A clear structure of organization and legal and financial support are vital needs for rehabilitation work. Organization also need to have a very clear scope of work and good strategies to achieve the goal. This report focuses on reasonably large projects as the “major” projects, but there are also small projects which have influence in the area and have essential capacity for rehabilitation. For example the Mangrove Action Project (MAP) is a small international NGO which has been promoting Ecological Mangrove Restoration (EMR) by local participation and has contributed to this by giving training courses on this topic for the field workers. Many projects are not happy if mangrove planting is just a way to get people to work together and want to see the long term result as successful plantation. Naucrates, a small NGO from Italy has demonstrated mangrove restoration project on Koh Pra Thong, Phang Nga. There have been used at least 7 mangrove species replanted and created as reference forest (looking at the natural forest nearby) in the tsunami degraded area. Local young people have been involved and learned with the project staff as well as the international volunteer.

Department of Marine and Coastal Resources (DMCR)

| <i>Name of Project and Description</i> | <i>Period/ Status</i> | <i>Approx Budget</i> | <i>Geographic area /eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|--|--------------------------|----------------------|------------------------------------|---|---|
| Her Majesty the Queen's Seventy- | 2004 –2007 (Finished) | | 23 coastal provinces in | - Mangrove new plantation and restoration | <i>Goal</i> (in 23 provinces): - New planting 52,000 rais (8,320 ha) |

| | | | | | |
|---|--|--|--|---|---|
| second Birthday Mangrove Plantation Project | | | Thailand 6 post-tsunami affected provinces are included in these 23 provinces | <ul style="list-style-type: none"> - Capacity building "Coastal resources protection volunteer" - Promote sustainable community forest - Fishery and coastal zone rehabilitation | <ul style="list-style-type: none"> - Restoration 368,000 rais (58,880 ha) <p><i>Done (in 23 provinces):</i></p> <ul style="list-style-type: none"> - new planting 19,540 rais (3,126 ha) - Restoration 135,178 rais (21,626 ha) - 220 Coastal resources protection volunteer training courses |
|---|--|--|--|---|---|

Note: There is no data about mangrove plantation by provinces

Assessment and comments:

The tsunami did not completely destroy many mangrove areas and much of the planting is on areas where mangroves did not exist at the time of the tsunami. The areas of mangrove replanted and restored are much more than the areas reported damaged by the tsunami. Most of the former mangrove areas are abandoned shrimp farm and areas affected by shrimp farming activities. The DMCR lacks skills and experience to look for alternative restoration. The project's main objective is to increase the number of planting areas, but it did not concentrate on learning process or innovation. The process seemed to aim at meeting targets for reforestation rather than focusing on tsunami damaged areas. There have been some claims that the project cut down mangrove trees to plant new ones.

The progress figures provided by the DMCR have not been independently checked. It is questionable whether the project has involved communities in participatory planning very much.

The evaluation and assessment of the Queen's project report has shown mangrove restoration activities including new planting, in-filling in degraded mangrove areas that the innovation, integrated management and indigenous knowledge approach have not been applied in the project implementation (Silapakorn University, 2006).

The DMCR now needs to be more open to different approaches. It has no areas to plant mangrove, but how to promote sustainable mangrove management should be emphasized. Some suggestions from mangrove unit officers are to have pilot areas where the mangrove unit works in participatory learning process with multi-stakeholder. Fortunately, the special project format gives more space for field staff to work rather than the annual policy from DMCR.

The mangrove unit officers who graduated in community forest management are the key actors for the Queen's project implementation. The capacity on awareness development, participatory concept and approach as well as information system techniques are needed for the project.

There were some recommendations that the local mangrove unit should build relationship and support with local people in many aspects such as quality of life development and have well understanding on local culture (Silapakorn University, 2006).

Although there are problems with the way the DMCR has concentrated on planting targets at the cost of quality and the apparent lack of effective participation. It is included as a major project because of its scale and formal role as a government project.

Sources:

Final Report of the Assessment of Her Majesty the Queen's Seventy-second Birthday Mangrove Plantation Project for the 2549 [2006]

Thailand Environment Institute (TEI)

Established in 1993, TEI is a non-profit, non-governmental organization working for the conservation of natural resources and the sustainable development of the environment in Thailand and in the region. TEI advocates a participatory approach to the shared environmental responsibility by working closely with the government, private sector, local communities, civil society partners, as well as international organizations. TEI helps to formulate environmental directives and link policy with action to encourage meaningful environmental progress in Thailand.

| <i>Name of project and description</i> | <i>Period/ Status</i> | <i>Approx. Budget</i> | <i>Geographic area /eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|---|-----------------------|-----------------------|--|---|--|
| 1. Building Local Administrative Organization Capacity in local participatory rehabilitation plan | 2004-2006 Finished | - | - Na Kha District, Ranong - Bang Wan District, Kuraburi, Phang Nga - Ko Koh Khao District, Tagua Pa, Phang Nga | To strengthen the capacity of Tambon Administrative Office (TAO) | Not Available |
| 2. Sustainable Management of Mangrove Resources | 2004-2008 On going | THB 15.5 Million | - Na Kha District, Ranong - 2 villages in Bang Wan District, | - To strengthen the capability of the Tsunami affected communities in coastal ecosystem rehabilitation - To develop learning processes and | - Mangrove nature trail at Bang Muang Mai, Ko Koh Kha - 169 Rais (27 ha) plantation in 3 districts and mangrove |

| <i>Name of project and description</i> | <i>Period/ Status</i> | <i>Approx. Budget</i> | <i>Geographic area /eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|---|-----------------------|-----------------------|---|--|---|
| through Local Community Action Project | | | Kuraburi, Phang Nga - 5 villages in Ko Koh Khao District, Tagua Pa, Phang Nga | widen networking among coastal community - To promote collaborative activities and working together amongst local stakeholders (school, TAO, communities) | management plan in Ko Koh Khao - Small seeding fund (10,000 baht each) for schools in project area for Environmental Education project - Pilot project for developing other project |
| 3. Tsunami Victims Rehabilitation Project | 2005-2009 On going | THB 6.45 Million | Ko Khao Island, with 5 villages on the island and Ban Tung La-Ong in Pang Nga and Ban Laem Nao, Ranong. About 250 affected fishermen families. Most villagers are small-scale fishermen and rely heavily on coastal resources and mangrove. | - To improve villagers economic status - Strengthen community groups' skills through specific training in accounting, self-evaluation and group management - Improve the natural environment through the planting of 5,500 rais of mangrove trees and the management of tsunami waste and debris and the formation of a coastal resource preservation group. | Not available as progress report not received from TEI. |

Assessment and comments:

TEI found it is difficult to work with TAO and local community leaders in capacity building because they found that these local leaders (mostly business people and politicians) had no concept of a participatory approach. They are mostly looking for personal gain from participating with the project. TEI showed it's learning approach here. The field staff adjusted the strategies to work more closely with villagers on natural resources issues. The village committees were set and this give the particular role and responsibilities to villagers. Instead of working with only TAO which was found to be not really active, TEI tries to encourage schools to participate in the project. Giving a small seed grant to teachers who are active and keen in environment work was used in the project and expects to continue these issues in the future. TEI normally have one year overlap to develop a new project from the current work and look for a new challenge issues to achieve.

The field work needs to then concentrate on a long learning and capacity building process with community members. This brings about internal contradictions in TEI where senior management did not really support a long term process in the community. Some of these managers think that mangrove rehabilitation is simply mangrove plantation which needs only one year to do the work. TEI collaborate with Raks Thai and Action Aid for the community work such as meetings for natural resource management planning, mangrove planting and lesson learned summarizing. TEI see themselves as one of the NGOs who work more closely on the ground rather than other NGOs.

The lessons learned to encourage women to join the activities turned out good results. Women's participation could help the group work to better understand and the outcome is mostly good and on time. TEI found that in Muslim communities, women are very active and well understand activities. In both Muslim and non Muslim communities, saving and revolving fund activities provide opportunity and skills which can be capacity building in women.

TEI has many strengths. It has friendly and cooperative staff who are open to working with other organisations and new issues and who are good at learning from experience. It has a strong concentration on mangrove issues, but in a very participatory way. It is therefore an important partner.

Sources:

- ❑ Annual Sustainable Management of Mangrove Resources through Local Community Action Project report
- ❑ Koh Kho Kao natural management plan, workshop proceeding.
- ❑ Final Report UN-habitat project

Raks Thai Organization (CARE Thailand)

Established in 1979 to support Cambodian refugees fleeing into Thailand, CARE's presence in Thailand reflects its dual role as a national NGO, CARE Raks Thai, and as a CARE International member. Working in several regions across the country, CARE/Raks Thai has applied its considerable expertise in HIV/AIDS, conservation, education and microfinance programming to longer term development efforts. Working through a broad network of local partners and joint programming, CARE/Raks Thai is a leading voice in advancing a right based approach working with the most vulnerable communities in the country.

| <i>Name of Project and Description</i> | <i>Period/ Status</i> | <i>Approx. Budget</i> | <i>Geographic area /eco-system</i> | <i>What they try to do</i> | <i>Rehabilitation Actual/Progress</i> |
|--|--|---|---|---|--|
| <p><i>South Thailand Tsunami Affected Areas Rehabilitation and Strengthening(STAARS):</i> After the initial response of relief, CARE/Raks Thai initiated the process of rehabilitation for the vulnerable communities and affected families. Their focus is on local fishing communities who lived along the coast and on island.</p> | <p>2004-2009 On going</p> | <p>300 Million (USD 8-9 million)</p> | <p>Goal of project to reach 130 local fishing communities hit by the tsunami in Ranong, Phang Nga and Krabi provinces.</p> <p>There are 33 communities work on community based natural resource management.</p> | <p>To support the community to be able to help themselves through occupational training, and assistance with rebuilding the community. There are a number of rehabilitation activities:</p> <ul style="list-style-type: none"> - Revolving Fund Revolving loan system- 2300 families (USD 500-1800 per loan) - Livelihoods rehabilitation - Environmental recovery Natural resources, sanitation - Emergency disaster preparedness - Youth activities - Marginalized groups - Stateless and Moklen issues - Health Issues - Advocacy and Rights based issues - Waste management | <ul style="list-style-type: none"> - About 300 rais (48 ha) mangrove planting in Krabi - 100 Rais mangrove planting in Phang Nga |

Assessment and comments:

Raks Thai has taken the opportunity to reflect on the accomplishments and challenges of the past year. The first step of work, Raks Thai focus on community economic and livelihoods. Later the focus will move to work on improving the quality and expanding existing activities, building capacity of staff and communities, psychosocial and emergency preparedness/disaster risk management.

Mangrove planting has been included as a part of learning process and youth's awareness development activities in community. CARE found planting mangrove activities give a chance to share informally ideas among villagers for forest management plan and other activities came out such as artificial fish habitat, carrying eggs mud crab and seagrass conservation. Some villages in Phang Nga use this activity for collaborating with government.

Raks Thai found that work in the field is sometimes interfered with by local influential people (sometimes they are middlemen or local politicians such as District Officer, TAO etc.) who controlled the finances of the villagers before NGOs came to the village. Raks Thai also found to have less cooperation from local government, but had good relationships with NGOs. Working on providing funds (saving and revolving

fund) it may not guarantee they will reach the goal of livelihood improvement. Raks Thai understands that this is always a weakness of focusing on giving money to community.

Raks Thai believes that NGOs work in the same area topic should join activities and learn together.

Raks Thai has set a rule that for revolving funds it is necessary to have women in the committee.

Among the strengths of Raks Thai are their commitment to participation and their reflective learning approach.

Raks Thai has a well developed philosophy and a lot of experience in rural development which fits well with livelihoods rehabilitation. They have well-established organisation, experienced and open staff and office bases in Phang Nga and Krabi. They are also open to learning from experience.

Sources:

- Thailand and Indonesia Multi-Agency Evaluation Tsunami Response (draft) report
- Socio-economic data of Taling Chan community report
- Rebuilding Lives and Communities (Draft, internal report)

Table: The major activities of each agency

| Agency | DMCR | TEI | Raks Thai | WFT | DNP | PDA | W WF | SA N | US AI D | YF |
|---|------|-----|-----------|-----|-----|-----|------|------|---------|----|
| Major activities | | | | | | | | | | |
| Mangrove restoration | ✓ | ✓ | | ✓ | ✓ | ✓ | ✓ | | | ✓ |
| Mangrove/coastal res. conserve. zone | ✓ | ✓ | | ✓ | ✓ | | | ✓ | | ✓ |
| Seagrass | ✓ | | | | ✓ | | ✓ | | | |
| Com. learning process | | ✓ | ✓ | ✓ | | ✓ | | ✓ | | ✓ |
| Com. Revolving fund | | | ✓ | | | ✓ | | ✓ | ✓ | |
| Env. Education | | ✓ | ✓ | | | ✓ | | | | ✓ |
| Eco/com.based tourism | | | | ✓ | ✓ | | | | | |
| Capacity building (field staff, TAO, villagers) | ✓ | ✓ | ✓ | ✓ | | ✓ | ✓ | | ✓ | ✓ |
| Networking | | | | ✓ | | ✓ | ✓ | ✓ | | ✓ |

Note: These are major activities, but not always strengths.

Table: Summary of geographical coverage of coastal rehabilitation work

| Geographical Area Agency | Ranong | Phang Nga | Phuket | Krabi | Trang | Satun |
|--------------------------|--------|-----------|--------|-------|-------|-------|
| DMCR | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| TEI | ✓ | ✓ | | | | |
| Raks Thai/CARE | ✓ | ✓ | ✓ | ✓ | | |
| WFT | | ✓ | ✓ | | | |
| DNP(Laemson NP) | ✓ | | | | | |
| PDA | | ✓ | | ✓ | | |
| WWF | | ✓ | | | | |
| SAN | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| USAID | ✓ | | | | | |
| Yadfon | | | | | ✓ | |

Overall comment and Suggestions

Most projects did not have any real data on social impacts, even when they say they have worked with one group or another. For this reason it has been very difficult to really assess the extent to which various agencies have achieved equitable results that reach all groups in the communities or whether their activities have had negative impacts on some groups. While some projects actively seek women's participation, there is not much evidence (from project sources) about the effectiveness of this participation.

It is clear from various studies (some mentioned in the introduction to this report) that project activities can have negative impacts on some groups (including women), but the projects generally are not good at reporting on the negative impacts of their specific project activities.

A similar lack in credible impact data exists with ecosystem rehabilitation. Figures on areas planted or otherwise rehabilitated have not been independently verified and the quality of this work (sustainability, appropriateness of location etc) is not easily checked.

Most of the agencies reported that, in fishing communities, the role of women in environment and natural resources activities is equal to the men. The previous belief was that women seem to be dependent on male household heads and have no role in economic earning. It is actually women who control the financial management in the family and influence husbands at home. Generally, men take the lead role in meetings and make decisions, but women participate in activities once the decision has been made. However there is a high degree of aspiration among women to become involved in community business groups and occupational activities. This would be a way to increase gender equality and achieve women's expressed vision for empowerment in social and economic development.

Payment to villagers to plant mangroves has been attempted by some agencies which see this as a tool to help villagers in crisis assistance after disaster. Ideally, to create the clean up (community and forest) activities would help villager's physiological trauma and help them to feel secure for the future. But this activity mostly has been done quickly after the tsunami and it has been found that it has been done without technical knowledge of how to do ecological restoration or knowledge of community learning processes including awareness of stewardship development with villagers. This is shown because in some areas planting was successful and in some it was not. This practice has been criticised by some NGOs which say that giving money is in conflict with the participatory approach and not sustainable. It would be interesting to work on monitoring whether those villages where payment for rehabilitation work was done have increased awareness and capacity building.

The way projects focus their activities raises interesting questions, It is hard to say whether agencies should work in a small number of community and focus in depth on particular content in order to return good results for the work accomplishment. It is possible that it is best for agencies to focus on issues that are initiated by community. For example USAID works in only Ranong, TEI concentrates on Koh Kho Khao, Yadfon works in Trang. On the other hand if working in some topic areas such as community learning processes and networking, agencies could work in a wider area and play a good role on coordination not only among communities, but also among organisations who work with those community (for example SAN works and has strong capacity in networking in 6 province, WFT works in Phuket and Phang Nga. However some agencies have a strong sense of territorial work area and this reduces or limits cooperation among NGOs.

One problem is that some projects (especially large projects) tend to present only their good results (supporting a good image) and don't always pay attention to lessons learned or possible ways to make things better in future activities.

Villagers have experienced being interviewed by many outside researchers. This can be confusing. They have learned and understand that different NGOs have different commissions and sometimes are not well organised and that there are conflicts among NGOs. Villagers also learn about the differences in the capacity and style of GOs and NGOs. The work of outside organisations creates confusion and distrust among villagers because of a lack of coordination.

Issues of coordination between various agencies and NGOs (and between different NGOs) are important.

None of the organisations studied reported working with the provincial government.⁷ Collaboration with the TAO was mentioned by TEI, but, as discussed above, they found this difficult and adjusted to work directly with communities. USAID has a strategy of working with the TAO. Generally the efforts of NGOs apparently seem not to have been well coordinated.

The *Thailand Environmental Monitor 2006* (World Bank 2006) stresses the need for coastal resource management generally to be coordinated by a “lead agency” and also recommends enacting the draft Marine and Coastal Resources Act. It also stresses the need for strong local participation. The formal steps may be necessary, but they are not enough because it is not easy to force cooperation and strong central enforcement is likely to work against participation. There is a need for an approach which enables real negotiations between stakeholders rather than focusing on strong coordination or enforcement.

It may be useful to think of a negotiated landscape approach (Fisher et al 2005) which tries to deal with a wider landscape with multiple uses and multiple stakeholders rather than working on a site basis (such as separate mangroves, reefs etc). The idea of a negotiated landscape is that the use of various parts of the landscape is not centrally planned, but negotiated. IUCN could have a role in convening such negotiations.

Recommendations

- ❑ It is recommended that IUCN considers future work with the three “major” or “priority” projects identified: DMCR, TEI and Raks Thai. In addition to these three projects IUCN should consider collaborating with other projects including WFT, WWF, SAN and PDA.
- ❑ Improved Monitoring and evaluation of all project activities is essential. This includes:
 - Emphasis should be placed on making sure that social impact studies are carried out for all future projects and that the results are used to review project activities. These evaluations should involve community participation and should be carried out by independent people if possible.
 - Proper baseline data (location, resource condition etc) should be obtained for all natural resource rehabilitation work.

⁷ The Chom Chon Thai Foundation is an attempt to work on mangrove rehabilitation in Phuket together with all stakeholders, including thirty community organisations, local government (Tambon Administrative Offices and the provincial office), NGOs, media, DMCR and IUCN. The project aimed to build a network to conserve and rehab the mangrove areas on Phuket island based on the belief that mangroves can provide protection from events like the tsunami and can provide food storage for villagers. Unfortunately no information has been located on the impacts of the planned project.

- All ecosystem rehabilitation projects should have a system for assessing the effectiveness of activities, preferably through some sort of independent verification.
- Monitoring of rehabilitation work should include survival rates.
- In order to achieve better coordination among NGOs who work in similar topic areas consultation meetings are essential. There is a need to identify clearly the roles of partners.
- Rather than focusing on achieving targets such as areas of mangrove plantation, emphasis could be placed on developing innovative ways of restoring mangroves and organising sustainable mangrove use etc.
- Emphasis should be placed on strengthening and widening networking among target work areas and organisations.
- IUCN could play a valuable role in advocating and facilitating a negotiated landscape approach in order to avoid both uncoordinated site-based rehabilitation and inappropriate centralised planning. This would help to address both ecosystem issues and social issues related to natural resource use.

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Annex A: Terms of reference

Scope of Work An Assessment of Post Tsunami Restoration and Conservation Initiatives in Thailand

As part of IUCN's regional initiative an assessment of post-tsunami restoration and conservation initiatives in Thailand is required.

Study on Post-Tsunami Restoration and Conservation Initiatives/Projects

Carry out research in order to create a summary of all post-tsunami restoration and conservation initiatives/projects (e.g. in tabular form) in selected district/s in Thailand (to be determined) giving agency details and information briefs on each activity (e.g. type of activity, duration, scope, geographical area; progress to date; budget of initiative); [3-4 pages]

During this process, identify the 3 major agencies involved in restoration and conservation work post-tsunami;

Create a detailed summary of the restoration and conservation work of these 3 agencies that:

Lists all major relevant initiatives/projects carried out by each agency in Thailand and gives basic information on each initiative (e.g. type of activity, duration, scope, geographical area; progress to date; budget of initiative)

Lists the objectives and planned outputs of this work; [4-5 pages]

Provides a thoughtful and thorough analyses on the successes and failures of the restoration and conservation work carried out by these 3 agencies, looking at aspects such as:

- how it has achieved/not achieved what it set out to do
- what the gaps and problems were
- suggestions for improvement
- gender aspects of of environmental degradation arising out of tsunami rehabilitation (e.g. different impacts on the livelihoods of women and men).

[7-10 pages]

Methodology:

Information should be gathered through a combination of secondary data analysis, review of major project databases, literature reviews, and direct interviews with key agencies. The final report should be between 15-20 pages.

Work plan:

| Task | Date |
|---|-------------------|
| Study on Post-Tsunami Restoration and Conservation Initiatives/Projects Completion of first draft for review | 18 July 2007* |
| Incorporation of comments and completion of second draft for review | 10 August 2007 |
| Final document of the Study Report | 01 September 2007 |
| Progress Report | 10 August 2007 |

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Annex B: Itinerary of researcher and people interviewed

Itinerary:

| Date | Activities and location |
|----------|--|
| 13 June | Planning meeting at IUCN in BKK |
| 14 June | Observe mangrove monitoring workshop and interview TEI Ban Nok Na, Ko Kho Khao, Phang Nga to |
| 15 June | visit Raks Thai Office in Kuraburi, Phang Nga |
| 16 June | Observed Raks Thai emergency preparedness/disaster risk management workshop in Krabi |
| 17 June | Join CHARM partner meeting in Krabi (WFT, Raks Thai and World concern, Wetland International and IUCN) |
| 18 June | Visit Mangrove Resource Administration and Management Division 2 in Krabi |
| 18 June | Visit Ban Taling Chun mangrove community in Krabi |
| 20 June | Visit DMCR, Bangkok |
| 3 July | Visit SAN office in Trang |
| 5 July | Visit PDA office in Krabi |
| 6 July | Visit WWF, Had Tai Muang National Park, Phang Nga |
| 7 July | Visit Thailand Research Fund office and NATR, Kuraburi, Phang Nga |
| 8-9 July | Visit USAID office in Ranong |
| 12 July | Visit Yadfon association |

People interviewed:

- 1) Mr. Chaiyaphoom Sithiguang (DMCR)
- 2) Mr. Maitree Sanganan (DMCR)
Mangrove Resource Administration and Management Division 2 (Krabi)
- 3) Ms. Wilavan Noipha - Project Coordinator (TEI)
- 4) Mr. Pradit Bunprod - Field Coordinator (TEI)
- 5) Ms. Benjawan Chotthong – Project manager (TEI)
- 6) Ms. Anchalee Phonklieng- Field coordinator-Rakthai (CARE Thailand)
- 7) Mr. Charnyut Theppa- Senior project coordinator-Rakthai (CARE Thailand)
- 8) Mr. Pakphoom Withantirawat- secretary general (SAN)
- 9) Mr. Amnuay Chunu- Field Project Manager, Community-Based Integrated Rural Development Center – Krabi (PDA)
- 10) Mr. Pisit Chansanoh- President of Yadfon association
- 11) Mr. Songpol Tippayawong- Head of Marine & Coastal Resources Unit (WWF)
- 12) Mr. Chris Dunbar- Field site manager (USAID)



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