

# Darwin Initiative: Half Year Report

(due 31 October 2007)

<b>Project Ref. No.</b>	162/16/002
<b>Project Title</b>	Building capacity for sustainable fisheries management in the Wallacea region
<b>Country(ies)</b>	Indonesia
<b>UK Organisation</b>	Operation Wallacea Trust
<b>Collaborator(s)</b>	Forkani
<b>Project Leader</b>	Dr Tim Coles
<b>Report date</b>	1 May - 31 October 2007
<b>Report No. (HYR 1/2/3/4)</b>	HYR/1
<b>Project website</b>	Currently under construction

## **1. Outline progress over the last 6 months (April – September) against the agreed baseline timetable for the project (if your project has started less than 6 months ago, please report on the period since start up).**

### **Start up and ensuring on site co-operation**

The project started in May 2007 with the appointment of Dr Duncan May as the Fisheries Scientist for the project. Dr May went to Indonesia in June 2007 and held meetings with COREMAP to ensure the strategies being employed by this World Bank funded project for sustainable reef fisheries in eastern Indonesia were focused on providing support for the Darwin Initiative project for Kaledupa Island in the Wakatobi Marine National Park. This was agreed and all the COREMAP funding that had been focussed on Kaledupa island is now aligned to support the Darwin project and the head of COREMAP, Dr Jamal Jumpa is using the Darwin project as an example of best practice which could be replicated elsewhere in eastern Indonesia if successful.

Meetings were also held in June with the head of the Wakatobi Government (Bupati) to ensure the Fisheries department for the Wakatobi was also fully behind the Darwin project. The support from the Wakatobi government was very strong and instructions were issued to all government staff and police to fully co-operate with the project. Meetings were also held with the National Park staff, an independent body from the Wakatobi Government, to explain the Darwin project focussed on Kaledupa Island. Again there was strong support and co-operation with the WWF/TNC project that is aimed at strengthening the National Park enforcement activity.

Forkani was contracted to provide the Kaledupa staffing and management of the project. Indonesian fisheries scientists were recruited from members of Forkani who worked on the 2005 pilot project. Beloro, Edi and Antoni are the fisheries scientists and La Ato works as the Database Manager. An Indonesian project coordinator (Adrian Dalope) was also hired to ensure communication with the UK, payment of Kaledupa staff and deal with local government issues.

An Operation Wallacea Trust office was rented for a year in Ambeua, the administrative centre of Kaledupa. The office was supplied with basic office furniture, equipment, laptop, printer and mobile phone booster for sending e-mails. The office is supplied with mains electricity at night and a generator has been installed for day use when needed. A 12v battery bank system was set up to run laptops for short periods of time.

### **Awareness**

Over a 2-week period the Forkani team visited the 9 key fishing villages on Kaledupa to explain about the census surveys, to encourage the formation of fishers groups and to develop support for the Fisheries Forum. The aims of the project, problems with open access and importance of fisheries management were discussed with communities.

### **Fisheries monitoring and database development**

Forkani were trained in the selection criteria and recruited 26 Fisheries Monitors based on their ability for the task and respected status among fishers. The 4 Forkani staff were trained for 3 days to give fisheries monitoring presentations and run the 1 day training course on Hoga, supervised by the fisheries scientist. The training course consisted of morning lectures and practical monitoring simulations and debriefing in the afternoon. A course handbook in Indonesian was prepared and distributed describing recording procedures and theory and monitoring equipment was distributed to the fisheries monitors for their use in the field. In addition to the 26 Fisheries monitors the course trained Wakatobi government officials, COREMAP staff, Fisheries department and Park Rangers.

Fisheries monitoring was started in mid July covering 9 villages where all catches landed over a 24 hour period were recorded once a week. These villages represent 70% of fishing effort for the whole island. Monitoring was checked over an initial 6-week period during which Fisheries Monitors performed perfectly and staff showed good attention to detail, dedication and understanding of the importance of the quality of data collection for analysis. Quality is continuously checked by the database manager where inputting clearly shows anomalies. The fisheries monitoring has continued supervised by Forkani without interruption to date so that weekly reports on catches, catch per unit effort (cpue) for the various techniques and species and size selectivity can be produced to help monitor the fisheries. A database has been developed which contains a census of all fishers on Kaledupa and catch data for the 9 monitored villages. Nathan Engler, a database specialist from the University of Waterloo in Canada visited the site in July to help with improving the database and is currently developing output reports to allow rapid analysis of the data by personnel untrained in database use and analysis. The milestones of database input completion (August 2007), completion of training of fisheries monitors (November 2007) and launch of weekly monitoring (December 2007) have been completed ahead of target.

### **Reef monitoring**

Dr Dave Smith from the University of Essex and a team of marine biologists completed an annual survey of the reef fish and coral communities from 108 fixed transects each 50m in length around Kaledupa Island. The milestone of completing this survey by September 2007 has been achieved.

### **Fisheries Byelaws and Regulations**

The Wakatobi Government with input from the National Park are developing proposals for fisheries byelaws and a detailed submission on proposed regulations was submitted by the Darwin project team for consideration by the Wakatobi parliament. Achieving the milestone of implementation of fisheries regulations which is not due to be completed until May 2009 has already been started and is on target for completion within the agreed timescale.

### **Development of businesses to provide income for licence buy outs**

Piotr Kalinowski, a fish farmer from the UK visited the Wakatobi site to gather the data for developing business plans for culturing and growing on *Tridacna* clams and *Parhippolyte uveae*, a rare red shrimp species and growing on reef fish pre-settlement larvae collected using light traps and crest traps, for marketing to the European aquarists market. Piotr Kalinowski is also a patent holder for plant processing techniques and he also gathered the data needed for processing the *Kappaphycus alvarezii* seaweed to supply European Union markets with an approved food additive E407a. In addition Dr Caroline Karp from Brown University in the US visited the Wakatobi in July and August to gather data on the opportunity for utilising areas of Kaledupa to gain income under the carbon credits scheme. Dr Julian Clifton from the University of Western Australia also visited in August to compile data to produce a business plan on the income opportunities for ecotourism development for the island. A number of fishers are also part time farmers so the opportunity to sell their agricultural products at Fair Trade equivalent prices under the Wildlife Conservation products scheme run by the Operation Wallacea Trust has also been investigated during an on site visit by Dr Tim Coles. A census of fishers in all villages in Kaledupa (not just the 9 surveyed for the fisheries monitoring) was completed to collect income data on fisheries, agriculture and seaweed farming so that the value of the businesses to be offered for the buy outs could be pitched at the right level. Five business plans (aquaculture for the aquarists market, seaweed processing, carbon trading, ecotourism and Wildlife Conservation Products scheme) for these opportunities are due to be presented at the Operation Wallacea Trust meeting on 14 November 2007. The milestone to complete the business plans for the buy-outs by Oct 2007 is about 1 month behind schedule.

### **Publicity**

The project was publicised in Indonesia through the WWF funded Media 3 (M3) programme based in Kendari who fund the production of local TV, radio and newspaper press releases on environmental issues. 16 media personnel came to Kaledupa for the fisheries monitor training in July and showed them the issues facing local fisheries by taking media groups out to villages. As a result 3 local newspaper articles were produced, 2 local radio interviews were completed which were repeated in 27 local radio stations and one 1-hour live local TV interview and project description was transmitted. TV footage has

