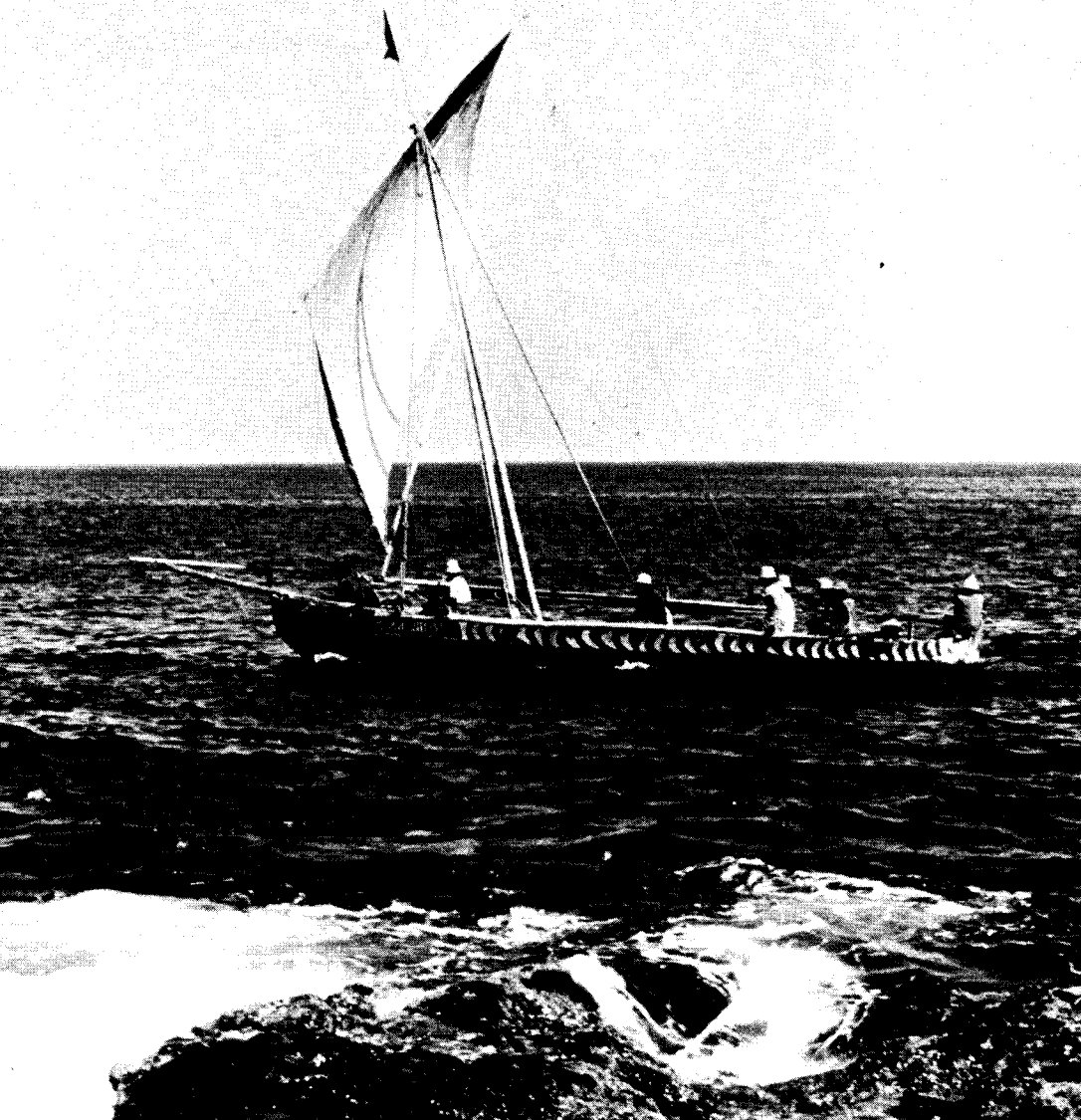


Robert Barnes

## **WHALING OFF LEMBATA:**

The effects of a development project  
on an Indonesian community



IWGIA DOCUMENT  
ISSN 0105 - 4503

IWGIA - International Work Group for Indigenous Affairs - is an independent, international organisation which deals with the oppression of indigenous peoples.

IWGIA published the IWGIA Documentation Series in English and Spanish. The IWGIA Newsletter in English and the IWGIA Boletín in Spanish, will be published approximately four times a year. The Documentation and Research Department welcomes suggestions and contributions to the Newsletters and Boletines. The IWGIA Boletín has been published from 1979 for distribution among indigenous organisations in South and Central America and in 1983 a Spanish Document Series has begun.

IWGIA Documents and Newsletters (in English) can be obtained through subscription or purchased separately. The subscription fee for 1984 is the following: Documents and Newsletters, for individuals US\$16.00 (Dkr. 120) and for institutions US\$30.00 (Dkr. 210). IWGIA Documents and Boletines (in Spanish) can be purchased similarly at US\$10.00 for individuals and US\$18.00 for institutions.

Please make your cheque payable to the International Secretariat of IWGIA.

Address: Fiolstræde 10  
DK-1171 Copenhagen K  
Denmark  
Telephone Copenhagen 1-124724

Board Members: Georg Henriksen (Chairman 1982- ), René Fuerst, Mark Münzel, Aud Talle, and Espen Wæhle.

Documentation & Research: Teresa Aparicio, Jørgen Brøchner Jørgensen, and Andrew Gray.

Production: Lone Dalgaard

Administration: Inger Dyrhagen and Klaus Hundebøll.

Cover Photo: Lamalera whaling and fishing boat. (Photo: author)

WHALING OFF LEMBATA:

The effects of a development project  
on an Indonesian community

Robert Barnes

Copenhagen May 1984

Author Information

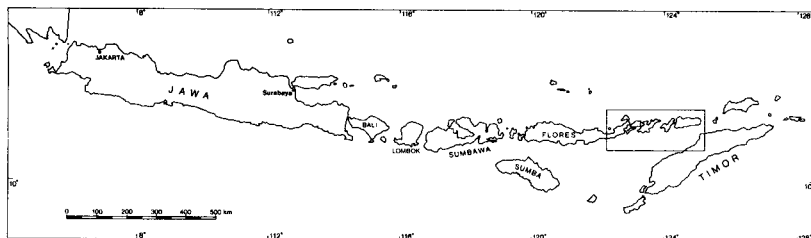
Robert H. Barnes, born 1944 in the U.S.A. University Lecturer in Social Anthropology, University of Oxford. Educated Reed College (B.A. 1966), University of Oxford (Diploma in Social Anthropology 1967; B.Litt. 1969; D.Phil. 1972). Field research in eastern Indonesia (Kédang and Lamalera, Lembata 1969-71, 1979, 1982). Many publications on alliance theory, collective representations, numbers and so on, including Kédang: A Study of an Eastern Indonesian People (1974).

## Photographs

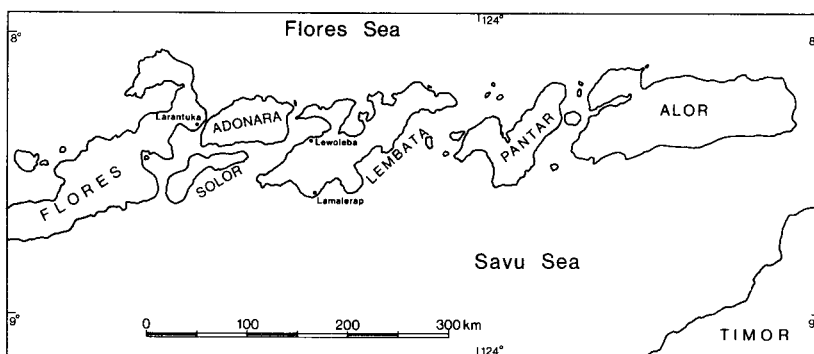
Lamalera whaling and fishing boat (author).....	cover
The lower village of Lamalera with boatsheds and beach (author).....	4
A sperm whale landed (author).....	6
Cutting up a sperm whale (author).....	10
The "FAO 82" used for whaling in the FAO project (author).	14
Boats in their sheds (author).....	17
Dried ray and bamboos containing fish entrails (author)...	21
Preparing a modern gill net for use (author).....	24
Harpooning a manta ray (author).....	27
An elder arranging the boat (author).....	30

## Maps

Map of Indonesia (Jørgen Ulrich).....	iv
Map of Lembata (Jørgen Ulrich).....	iv



Map of Indonesia (Jørgen Ulrich)



Map of Lembata (Jørgen Ulrich)

For thirty-three months, from March, 1973 until November, 1975, the Food and Agriculture Organization of the United Nations administered a Freedom From Hunger Campaign Project in Lamalera, Lembata, Nusa Tenggara Timur, Indonesia. A relatively isolated village of around 1,200 persons on the south coast of the small and rugged volcanic island Lembata, Lamalera possesses a mixed economy much affected by modern national and international influences. It also happens to have the only traditional sperm whaling industry in Southeast Asia, a means of livelihood mentioned in Portuguese documents as early as 1629. The main purpose of the project was to modernize this whaling tradition. The project failed in this aim, but left other impressions on the village. The present study intends to describe the project and its aftermath. Many of the general factors leading to the failure of development aid projects discussed perceptively by Desmond McNeill (1981) are relevant to the Lamalera case. Some parallels may be found with the experience of the Indo-Norwegian pilot project among Kerala fishermen (Klausen, 1968). The focus of the following account will however remain fairly local, close so far as possible to the perceptions of the various participants.<sup>1</sup>

The people of Lamalera share the Lamaholot language and a common culture with the occupants of the islands of Lembata, Solor, Adonara and eastern Flores, comprising the East Flores Regency (Kabupaten Flores Timur). Their ancient social organization of patrilineal clans and asymmetric marriage alliance, though much modified in recent times, still has pronounced effects on the sociology of the fishery and the ownership and organization of boats. The leadership Lamalera provided one of the ten districts making up the former rajadom of Larantuka attracted the interest of Catholic missionaries in the 1880s and secured the village a position of political prominence on the island when the Dutch first occupied it in 1910. Consequently Lamalera had a head start in

education and in conversion to a world religion. Having little or no agriculture or land, and subsisting almost entirely from the sea, the village was more open initially to outside influences. These influences have led to profound transformations in culture and livelihood, although the village has eventually lost its political position. One effect is large loss over two generations of young people seeking alternative forms of employment elsewhere, with the result that the absolute population of the village has hardly grown since 1930, while the regency has nearly doubled its numbers.

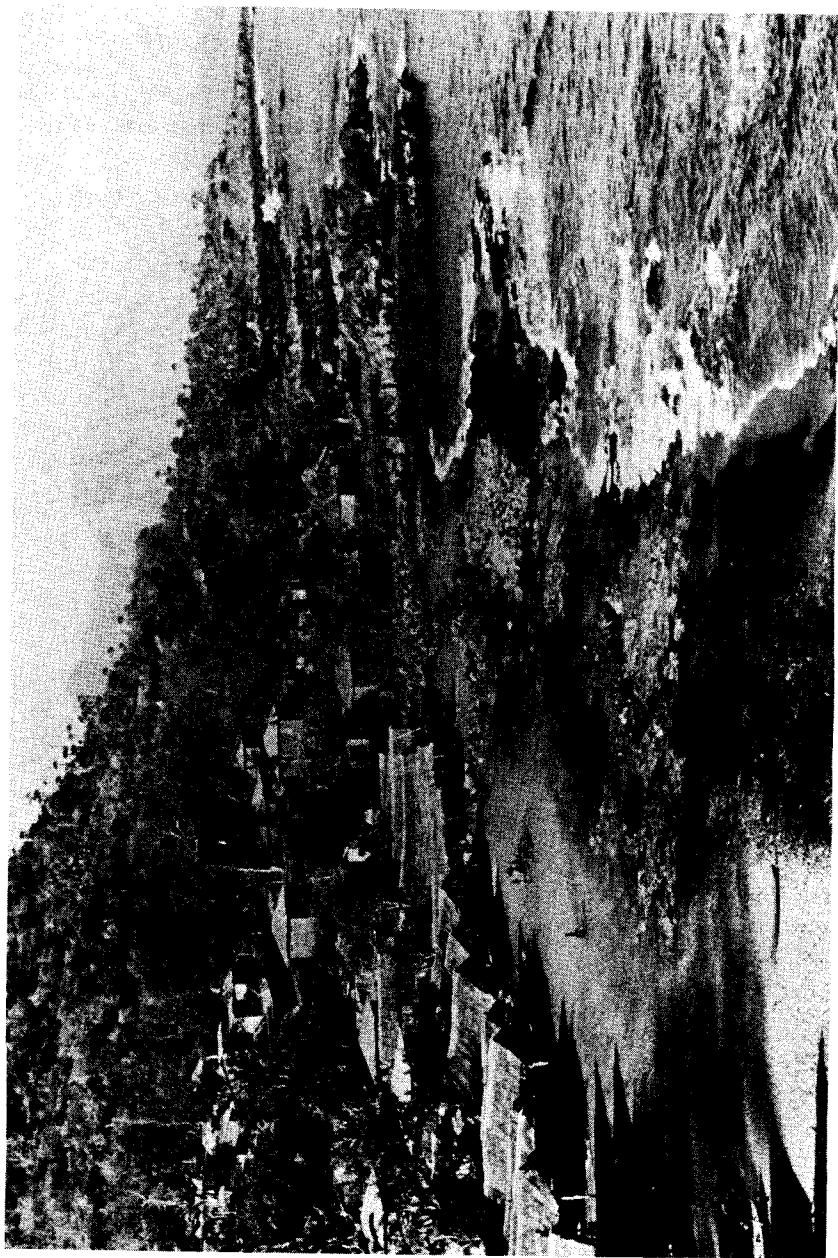
The first moves toward setting up the project were made by the Catholic Divine Word Society, whose missionaries have been active in the islands around Flores and Timor throughout this century. The mission decided to ask the FAO to organize the actual project, while financing was provided through the West German Catholic Bishops' development organization called MISEREOR. FAO sent a representative to look over the village and to discuss the project with the villagers. This man prepared a report in which he recommended a project to expand Lamalera's whaling - a move which by now seems to be regarded on all sides as a serious mistake. The Indonesian government and FAO signed a letter of agreement in August, 1971. FAO then ordered the construction of a motor boat, purchased other equipment, and hired a Norwegian masterfisherman. This expert arrived in Indonesia in March, 1973. He spent most of the first year bringing in equipment and setting up the project. It was not until March, 1974 that he managed to start his first training course, and it was only in May, 1974 that he could begin whaling. The fisherman terminated the project in Lamalera in November, 1975, when he moved his equipment to Larantuka, the capital of the East Flores regency in which Lamalera is situated. During the three year period of the project, the whale boat was in active use hunting whales for less than ten months.



In all, thirty-four boys received training in courses lasting a total of less than nine months.

The applicant in the original project request of 1969 is described as "the Local Government" (Bupati/Kepala Daerah Kabupaten Flores Timur). In fact, the moving force was the Catholic mission. The uncertain participation of the Indonesian government was an obstacle all through the project. The so-called project request, addressed to the FAO, seems in fact to have been written by the FAO representative, reflecting his discussions with the mission and the villagers. The FAO were being asked to take funds supplied independently by a Catholic agency and run the project for the mission. Both FAO and MISEREOR have overhead expenses which add to the real costs of such projects. A further point to note is the number of distinctive bureaucracies which divided actual or nominal responsibilities among themselves: the Catholic mission (SoVerDi), MISEREOR, FAO, the regional government, the state government, and the Directorate General of Fisheries at Jakarta. Eventually the police and the port authorities at Jakarta and Surabaya were drawn in. Most of the decisions which were taken during the time when the project was being designed were taken for reasons which were largely determined by the interests of the bureaucracies.

Even so, the principal faults of the project are already to be found in the original proposal. Lamalera is a Catholic village, and the mission naturally wished to help it. Although many villages along the coasts of the islands in the East Flores Regency do some small-scale fishing, there are only three villages in the area which do anything more ambitious. Lewotobi in East Flores hunts porpoise, sharks and rays. Lamakera, Solor and Lamalera, Lembata both hunt whales, though of different species. It is especially striking that there was never any mention in the project proposal of Lamakera, a Moslem village just across the straits from Lamalera. In fact there are both ancient and present day ties of



The lower village of Lamalera with boatsheds and beach. (Photo: author)

importance between the two villages. As it happens the Moslem Lamakera was once one of the very first Catholic villages in the region, having been converted in the sixteenth century. But they rebelled from their Dominican masters and became firm Moslems.

The project request notes the fact that the farms in the area are poor, food is in short supply, that there is a three month hunger period (December to March), and a year-round deficiency in proteins. The most important fishing village on the island, it is claimed, is Lamalera. The request notes in particular that "the fishermen here are progressive" and that they are the only ones on the island who do whale fishing. The request says that there is (in 1969) a fishing cooperative on the island of about 2,000 members; and this cooperative is to operate the project. The request then claims that, "This village will form the center for instructing other villages in more advanced methods. Not only the inhabitants, but thousands of people on the rest of the island, would profit from their better catch. This (improvement) would mean more fish on the market and through it a greatly improved diet".

It was expected that thousands of people elsewhere would benefit not just from the increased supply of fish to the market, but also from the spread of knowledge of modern fishing techniques which the villagers of Lamalera would freely transmit. The masterfisherman understood that it was his job to start things in Lamalera, and these people would in turn show and assist other villagers. This development did not happen.

There are some reasons why the initial optimism might have appeared justified. After Lamalera became the first village on the island to convert entirely to Catholicism by the 1920s, many of its members took advantage of the training offered by the mission to become carpenters or school teachers. It is still true that most of the island's



A sperm whale landed. (Photo: author)

carpenters and school teachers derive from this village. This situation has changed the village economy, so that it is by no means so exclusively dependent upon fishing. Many sons of the village have gone elsewhere in Indonesia to assume responsible salaried positions or to establish businesses. Some have become priests, and among the professions the village has produced a professor of linguistics at the national university, a General in the army, a journalist on a national newspaper, the head of a publishing firm and managing editor of a regional magazine, an expert on the Japanese language currently serving as an attaché at the embassy in Tokyo, and a medical doctor living in West Germany, not to mention younger men and women in junior levels of the same or similar careers.

Nevertheless, persons who may be quick to adopt modern attitudes and techniques in connection with modern occupations may, sometimes with good reason, resist changes which work against the traditional patterns of traditional occupations, a circumstance familiar in anthropological studies of development. The ancient patterns of the fishery are concerned with much more than simply the supplying of material wants, and they cannot easily be altered without leading to manifold disruptions throughout the culture. Such changes as may be introduced require careful thought and detailed knowledge. The masterfisherman ran into exactly this problem. Being an expert fisherman, and not a sociologist, anthropologist or development specialist, he was unprepared for it and for the most part incapable of coping with it.

The proposed purposes, the terms of which were generally maintained throughout the project, were:

- (1) To organize on a pilot basis a training center for instructing the fishermen in improved methods of fishing.

- (2) To increase production in order to alleviate protein deficiency in inland villages near Lamalera.
- (3) To carry on extension work in improved methods of fishing and marketing.

More specifically the project request suggested that the consultative services of a masterfisherman might be made available for twelve months, during which time he would start the training center and train thirty fishermen for six months. The project itself, however, was to last three years. The request also tacked on the suggestion that six persons be trained to dive for pearls, since, "The island has one of the richest pearl shell concentrations in Indonesia". The pearl shell, however, is located in the bay in front of Lewoleba on the opposite side of the island from Lamalera. This aspect of the project was never taken up. Today the pearl shell is exploited by a private Indonesian firm. The original request asked for \$53,000 of which \$26,500 alone was to pay the salary of the masterfisherman. MISEREOR was to provide \$51,300 of this, \$2,500 in kind coming from the Indonesian government. In the event, the budget for the three years of Phase I, the part which had to do with Lamalera, totalled \$182,000. Phase II, an additional three years during which the masterfisherman set up a training center at Larantuka, spent \$255,018, plus an additional \$15,000 which was donated by the Norwegian government. The FAO took fourteen per cent of the two sums as a project servicing charge. In phase II, the masterfisherman cost over \$55,000 a year. This figure covered salary, the expense of a yearly flight to Europe for home leave, as well as the expense of flying his family to Jakarta and back to Norway once a year, so that the masterfisherman could visit them in Jakarta. Government estimates place the per capita annual income for the state of Nusa Tenggara Timur in 1975 as approximately \$75. Per capita income in Lamalera would certainly have been less.

The decision taken at the beginning to make the modernization of the whaling a central feature of the program necessarily shaped the course of events, as the project was implemented. The masterfisherman naturally had the technical skills necessary for this aspect of the job, as he proved time and time again by intervening to correct the technical deficiencies of the equipment which he was given. But the fact that this equipment had already been ordered before he was hired had two serious consequences. First of all, he had no opportunity to see to it that the specifications were suitable when the equipment, particularly the boat, was ordered. Much more serious, it eventually became clear to him that whaling might not be the best aspect of the economy on which to concentrate. Unfortunately, the equipment was there. Its sheer cost and physical presence bound him to use it.

The first of many drawbacks which whaling caused was that it took more than a year to get the boat and harpoon gun to Lamalera and in operation. During this time the masterfisherman was forced to make several long, time-wasting trips to Java, as well as an expensive journey to Japan.

Within a month of his first arrival in Lamalera, March 1973, the fisherman had to return to Jakarta and from there to fly to Tokyo. The Yamaha Motor Company, Ltd., Japan, which was constructing the whaling vessel, had cabled that trials were scheduled for April 17. In the event they were put off for four more days. The boat, donated by MISEREOR, cost \$20,000. The masterfisherman found the hull, deck, wheelhouse and reinforcement fit the specifications of the contract. The engine was weaker than the contract called for. There were in addition some minor deficiencies, but arrangements were made to have these put right. The fisherman wrote that, "In spite of the fact that this boat was narrow when compared to the length, it was very stable and looked to me to be a good boat". The only question was,



Cutting up a sperm whale. (Photo: author)



"will this boat be strong enough for the gun?"

The main reason, he said, that he had gone to Japan was to assure that the reinforcement of the platform for the whale gun was adequate. He did indeed find that it was weak, and he requested that it be strengthened. The builder, nevertheless, claimed that by their calculations it was strong enough. The fisherman insisted however that at least an iron plate be fixed under the pedestal of the gun, for this entirely fibreglass boat. Since the drawings of the gun had no measurements, the holes could not be drilled for the mountings, and this task had to be left to be completed in Indonesia.

The fisherman then left for Indonesia, and Yamaha promised to deliver the boat to Surabaya, May 10th, 1973. When he arrived in Jakarta from Japan, he spent a week trying to get the port authorities to release the gun and ammunition, which had arrived at the end of April. He was unsuccessful, but arranged to have another FAO project manager, who was stationed in Jakarta, continue to negotiate for its release. In his report of May, 1973, he wrote: "As soon as the boat arrives, whale catching will start and last until the end of July, when the whale season is finished". Whaling does not end in July, as he later found out for himself; but he seems to have felt at this period that the delays in getting started would be merely a matter of weeks.

Yamaha put off delivery of the boat until the beginning of July; so the masterfisherman waited until the end of June to leave Lamalera and return to Jakarta to pick up its shipping papers. When he reached Jakarta, he found a cable from Yamaha telling him that delivery would be further delayed until the end of July. The police and the army were still refusing to release the harpoon gun. The police complained that the FAO had imported it without licence. The fisherman remained in Jakarta until August 5th, when he left for Surabaya to pick up the boat. The boat finally reached Surabaya

August 8th, 1973. The mission-run, packet boat "Ratu Rosari" had been commissioned to tow the "FAO 82", as it was now named, from Surabaya to Larantuka, Flores, and it was ready for this purpose; but the harbourmaster refused to give permission. After two days of delay, the harbourmaster was brought around; and the "Ratu Rosari", with the "FAO 82" in tow, left Surabaya August 14th, 1973. The two vessels arrived in Larantuka without difficulty six days later. Finally, on August 25th, the "FAO 82" reached Lamalera, just five months after the project began, a delay amounting to one-seventh of the total project time. The fisherman used the months of September, October and November in making a house ready and in training his crew. In early December he left on home-leave.

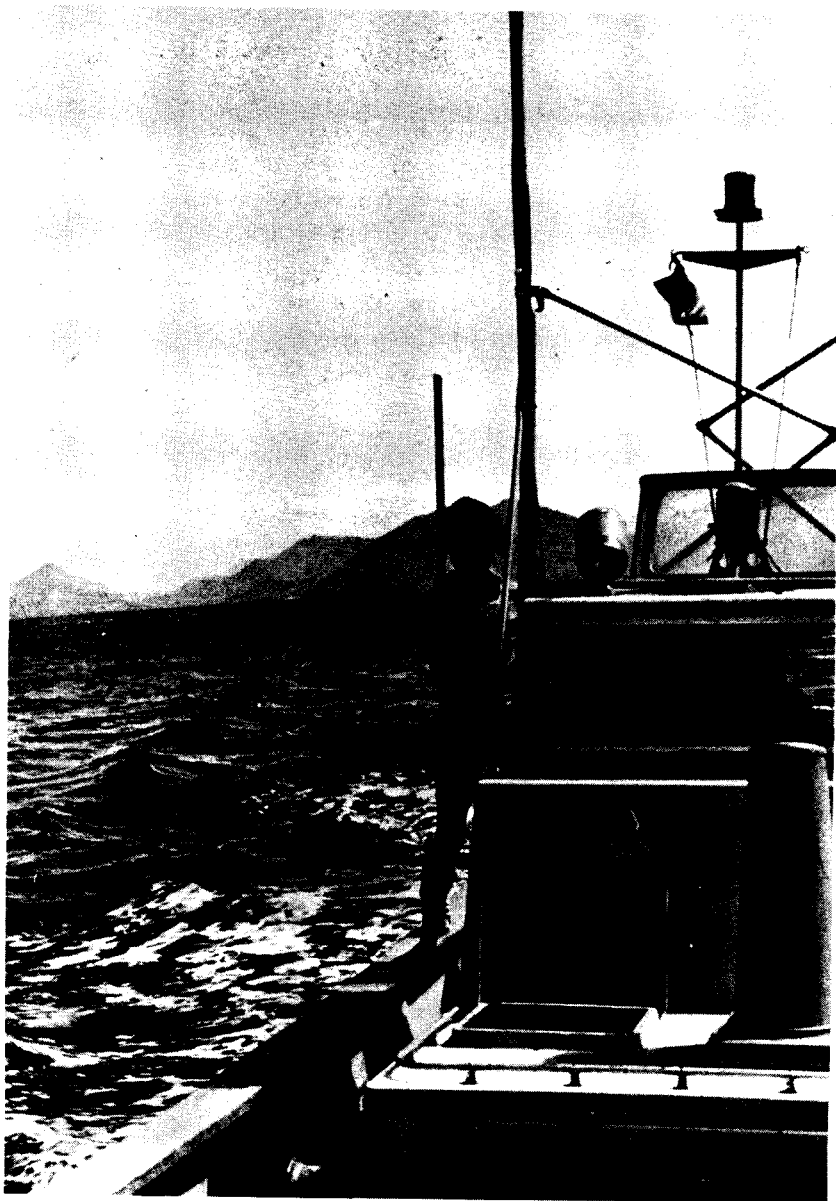
The fisherman was surprised to discover that the Lamalera harbour was very bad and quite unsuited for the "FAO 82". "There is only a sandy and stony beach". The boat had to be anchored 100 m. from the beach, where it could be assured 15 m. deep water. At full moon, the current is very strong. During the rainy season the wind causes heavy waves on the beach, so that the masterfisherman and his crew had to remain on board at night or move to another harbour. While he was on home leave, the fisherman transferred the boat and crew to Larantuka, which has a sheltered harbour, from which the crew continued fishing.

In the meantime, at the end of November, 1973, the Jakarta port authorities released the harpoon gun and ammunition, which was transferred to Surabaya. When the fisherman returned to Indonesia, he learned that this equipment had been set free and was being shipped to Larantuka, Flores. He arrived in Larantuka in the first week of February, where he found a cable from the police in Surabaya, telling him to return to Surabaya and speak to them about the ammunition for the gun, which they had taken into custody. The gun itself had actually reached Larantuka. The fisherman duly

returned to Surabaya, where he spent two weeks in negotiations.

The ammunition in question was a year's supply in a disassembled state, consisting of 10 kg. of raw powder, plus 100 detonators, cartridge cases and wadding. The Surabaya police held that the permission given by the Jakarta police was invalid. Worse, they discovered that the warehouse had no permission to store ammunition; so the police confiscated it. The Catholic mission spent two months trying to get it back. When the Surabaya police released the ammunition, the harbourmaster refused to allow it to be loaded on the mission vessel "Ratu Rosari", which carries passengers as well as freight. Indonesian regulations do not allow passenger ships to carry ammunition which is ready for use. The ammunition, however, was not yet assembled and therefore did not fall under this regulation. The Captain of the "Ratu Rosari" said that his vessel could transport it safely, and that it had the facilities for its safe care. Nevertheless, this time the harbourmaster would not budge; so the fisherman turned the problem over to the Directorate of Fisheries and returned to Lamalera. The difficulty was resolved when the FAO redirected one of their own boats, the "M/V Lemuru", to transport the ammunition from Surabaya to Lamalera, arriving there 26th March, 1974 - one full year after it had reached Jakarta and one year after the project began. In the meantime, on March 15th, 1974, the fisherman began his first training course for local boys.

The fisherman wrote: "To fit the whale gun on the boat took more time than expected, because of the lack of material and tools in the workshop in Larantuka. The expert had to go himself to Surabaya to buy iron, etc. to finish the mounting of the gun". At the same time he was mounting the gun, he made two new 400 liter fuel tanks for the "FAO 82". The original tanks were small, and oil drums left exposed in the village rusted and leaked.



"The FAO 82" used for whaling in the FAO project.  
(Photo: author)

On May 11th, 1974, the boat was, for the first time, ready to start whaling. The crew went out every day from May 13th until June 8th. The first whale was spotted on 28th May, when one was taken. Two more were taken before, on June 8th, the gun emplacement began to fail. The gun then had to be dismantled and new reinforcements built into the boat. These repairs stopped whaling and put the boat out of operation for five weeks. Meanwhile, the new fuel tanks had required three months to build. When they were taken aboard, they were usable for one week before the welds began leaking. It appeared that they would have to be sent back to Surabaya to be properly repaired.

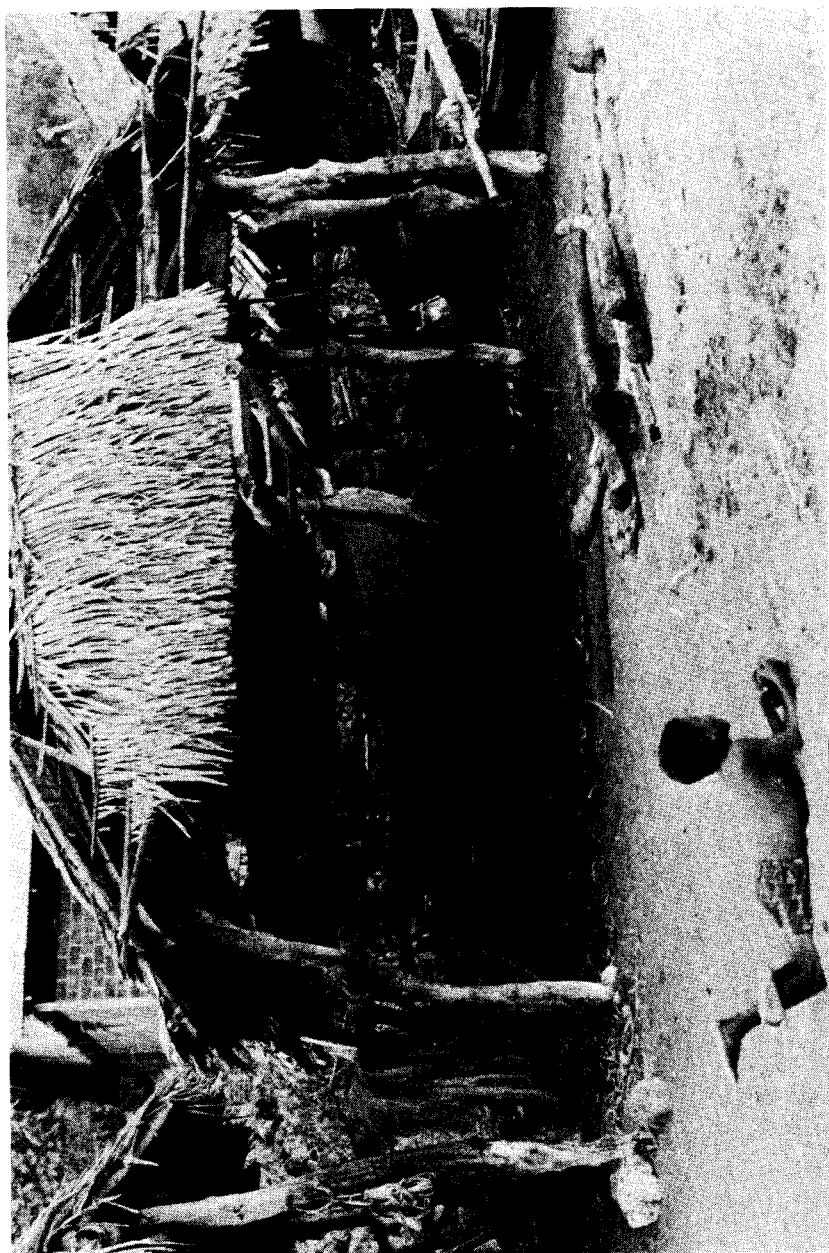
All told, the "FAO 82" caught thirty-one whales, eleven in 1974 and twenty in 1975. During the same period the native boats (fifteen in action during this span with a total crew of about two hundred ten) took forty-seven whales, twenty-six in 1974 and twenty-one in 1975. One way to look at these results is to say that the FAO project made a substantial contribution to the amount of whale meat landed by the villagers and did so with a much smaller labour expenditure, but with of course a greatly increased capital expenditure. The fisherman estimated that his method involved a direct cost of Rp 6,225 (ca. \$15) per whale. This figure does not include the overhead of the development project. If the project's budget plus the \$20,000 for the "FAO 82" (a sum of \$202,000) is divided by thirty-one whales, the result is \$6,516 per whale. A single whale during that period might have returned \$280 had it been possible to convert it to cash.

Another way to look at the number of whales in the catch is to observe that the total taken by all boats, including the "FAO 82", in 1974 was thirty-seven, while in 1975 it was forty-one. These figures compare with an average annual catch by native boats of thirty-four during the nine years for which records are available between 1959 and 1970. During the

decade of the nineteen seventies, however, the average annual capture declined to twenty-five.

At the end of the three year project, in November 1975, the masterfisherman wrote that since June 30th, 1975 only four whales had been taken, because the ammunition had become exhausted. "More whales could have been caught if ammunition had been available". The first year's supply of powder had become available for use in the second year. It was employed throughout the remainder of the 1974 season and through the 1975 season until it ran out. The second year's supply, 40 kg, was ordered and paid for, but it too ran into difficulties with the port authorities at Periuk, Jakarta. When it arrived in Jakarta, it was transferred to the government's explosives warehouse at the port. Customs told the masterfisherman that the permission to bring it in had expired, so that he would have to apply again. The powder sat in the warehouse for two months, when the port officials wrote to say that it had incurred a \$5,000 storage fee.

The FAO took the position that under the original terms of the project, the Indonesian Directorate of Fisheries was intended to take over whatever the project had established, along with the concomitant responsibilities. The FAO did not provide any funds to the Indonesian counterpart, as this was not its responsibility. The Indonesian government in Jakarta was not interested in making any funds available. The masterfisherman wrote to the Jakarta FAO Project Officer to look into it. This man confided that he does not regard shooting whales with guns as an ideal FAO goal, and at that time the war on Timor had broken out giving rise to further complications. The officer made a preliminary trip to Periuk, and then he told the Indonesian Directorate of Fisheries that since they were now supposed to have taken over according to the FAO-Indonesian agreement, it was up to them to get the explosives out of storage at the port. The Indonesians replied that they had been given no counterpart budget



Boats in their sheds. (Photo: author)

to do any such thing; so they would not. The ammunition stayed in the warehouse incurring hundreds of dollars in storage fees per week. After a further two months, the officials asked for \$7,500. By then the fees alone were three or four times more than the ammunition was worth. FAO finally told the port officials to haul the ammunition out to sea and dump it there - end of mechanized killing of whales in Lamalera.

The original FAO project request claims that there was in 1969 a fishing cooperative of about 2,000 members, and that they were the persons who would be the operators of the project. The masterfisherman expected this group to be ready to work with him, but when he arrived he found this cooperative moribund. He then attempted to reorganize it, holding several meetings for this purpose in the first year. The new cooperative was not officially formed however until January, 1975, with a membership of one hundred eighty fishermen, later increased to two hundred thirty-nine. By 1979, it too had lapsed into inactivity. The original cooperative, which had been formed in 1965, had already ceased activities by 1967. In any case, this cooperative seems never to have produced revenue or indeed to have operated at all for public rather than private benefit. There was therefore no reason to lead the FAO to expect it to function in the new FAO project.

The masterfisherman took the profits earned by the project (some \$1,640) and deposited them in a bank account in Larantuka in the name of the "Fishing Co-operative Lamalera", at a substantial rate of annual interest. He also helped the cooperative to start its own shop in the village, which he stocked with goods purchased from the interest on the account. Although in the past, Chinese merchants had from time to time run shops in Lamalera, when the masterfisherman reconstituted the cooperative, the only shop in the village was a small affair run by the Catholic priest. The cooperative's



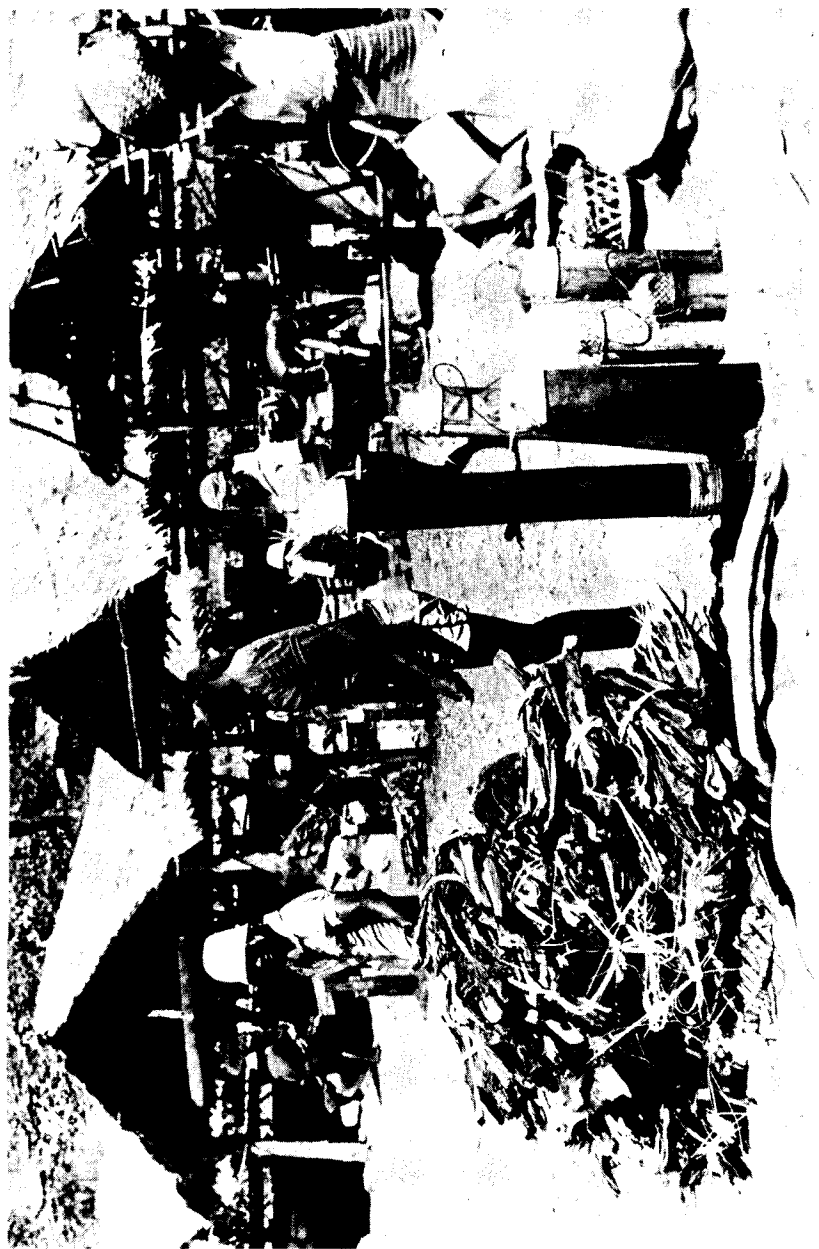
shop was at first quite a success and provided goods, such as fishing gear, which were otherwise unavailable. In the letter of agreement for Phase II, the FAO envisaged that the cooperative would, "undoubtedly help local fishermen acquire more easily fuel, fishing equipment, vessel spare parts, etc. for their fishing operation, as well as market their catches".

It was planned that the profits of the shop would be added to the bank deposit. When the masterfisherman left the village at the end of 1975, the cooperative was one year old, but had behind it a span of only three to six months of effective operation. Two years later, when he checked on the cooperative's progress, he discovered that it had managed to add only a further \$112 to its account. Another intention was that the cooperative would assist in the introduction of gill nets by providing loans to its members to purchase them. In a report on a follow-up visit made in 1976, an FAO officer commented, "The cooperative has not provided any of its members with fishing gear since the project shifted from Lamalera to Larantuka, even though there would appear to be a demand within the village". When the masterfisherman was in the village, he gave guidance in running the cooperative and assistance in purchasing equipment. When he left, the cooperative found they no longer had access to the market in Surabaya which supplied the goods they required. In June 1979, the cooperative wound up its kiosk. The school teacher who had assumed responsibility for supervising the accounts, found that the burden intruded too much into the time required for his teaching duties. Other members of the cooperative were unwilling to replace him. The cooperative had in fact on a trial basis provided loans for the purchase of three nets, but after three years the owners were substantially in default. They were successful in catching fish, but found difficulty in converting the fish to cash necessary for repaying the loans. The funds otherwise remained, unused, in the bank account, where the members thought they were safest. By 1982 several

individuals had opened small, government assisted shops in their homes, which did provide some thread and other gear, but nothing on the scale intended by the masterfisherman. In 1982, the cooperative showed no further signs of life, although its funds remained in the bank.

In August 1974, the masterfisherman looked forward to disposing of the accumulated stock of whale meat gained by use of the motor boat and gun. However, fish and whale meat are not commonly bought and sold for cash in Lamalera. The bulk is disposed of through barter. Although currency is available and is in common use, the principal subsistence exchanges by-pass money. Staples, such as maize, rice and yams, must be obtained from mountain villagers. These villagers are commonly unwilling to dispose of much of their slender surpluses except for meat and fish. Food for food is the formula where scarcity is commonplace and hunger an annual experience. Since meat is the only assured means of acquiring basic starch foods, the fishermen of Lamalera normally forgo opportunities of selling meat for cash.

The masterfisherman terminated whaling in September 1974 during the first season because the meat held by the project remained unsold and in storage in Lamalera. Eventually he did sell all of the whale meat by transporting it elsewhere. The masterfisherman also tried to introduce improved ways of handling the produce. He showed them how to cure fish with salt, a technique which is not entirely new to the island. He did not, however, discuss with the villagers the problem of acquiring sufficient salt, nor the means of increasing and improving salt production. It was his experience that the villagers could get a better price for the properly cured fish. Nevertheless, no lasting change was achieved in this regard. The villagers find salt too expensive for large scale use in curing. It is not available in sufficient quantities. Furthermore, it may be questioned whether the technique is certain always to obtain a



Dried ray and bamboos containing fish entrails. (Photo: author)

sufficiently improved price, either in cash or in goods. The islanders do not consume as much salt as do Europeans, a factor which they always note as a peculiarity of Europeans. The letter of agreement for Phase II says in a retrospective comment: "In order to make the best use of the catch for local consumption, as well as to supply (fish) as far as possible to other remote areas of the island, processing and distribution techniques must be improved". However, in his follow-up report, an FAO officer perceptively observes, "The community appears to be largely unresponsive to efforts to improve the processing of fish meat. (Valid economic reasons may exist but were difficult to identify).. The importance of using salt for drying meat is well understood and more would be used if available (at a price). Salt is made in the village and is used for processing meat and is marketed inland. However, production is limited". The mountain villagers may very well prefer salted sea products, but the masterfisherman failed to ascertain whether they are prepared as a regular matter to pay a higher price for it. A related consideration is that the villagers of Lamalera commonly fall back on boiling sea water for salt and calcining coral to produce lime, which they then barter in the mountains, as emergency measures when the sea fails to provide them with a sufficient catch.

The masterfisherman showed the villagers a more efficient way of collecting oil from blubber, using a V-shaped trap with a trough running to a barrel. This apparatus catches everything, and it is superior to the bamboo runners used by the villagers. There is now no effective market for whale oil except locally for use in lamps. Paradoxically, even in Lamalera kerosine has to a large extent replaced whale oil for purposes of lighting. By 1982, many houses used gas pressure lanterns, and the Indonesian government had announced plans to bring electricity to the village in 1983. The mission had its own generator and provided regular

electricity to a few houses near it. There is no premium on saving oil, therefore none on improving methods of collecting it. The people in the village have not taken up the improved trap. The masterfisherman himself could not find a market for his oil.

The masterfisherman built a small boat in the village to show them how they could make stronger boats and save wood by using improved techniques. He took his boat with him to Larantuka, and his demonstration has made little impact, except that the local mission workshop used his patterns in 1982 to build a skiff for the missionary. One of the local master boatbuilders was in charge and thereby proved his versatility in using modern techniques and traditional ones alternatively, a pattern which has been familiar in the village for at least half a century.

In one area the project had a clear success: in introducing gill nets into the village. The missionaries had already brought one or two into the village; and they were in any case already spreading in this part of Indonesia. The project gave seven to the village, and the masterfisherman showed them a more efficient way of using them.

The consensus in the village is that gill nets are the one significant change brought about by the project. By 1979 there were eighteen nets in active use. They produced a substantial contribution to food, principally in frequent catches of tuna and a small variety of manta ray, locally called moku. In May 1982, the FAO donated a further thirty-four nets. These were divided between the two administrative village governments of Lamalera A and B, which distributed them among their constituent neighbourhood associations. In the meantime, the number of nets in private hands had greatly increased, purchased not through the cooperative, but largely by use of funds remitted by relatives with wages or salaried incomes living elsewhere in Indonesia. Some of the new FAO nets were still unused by the end of 1982.



Preparing a modern gill net for use. (Photo: author)

Others had been sold to individuals. Most however had seen service. Some of the neighbourhood associations were efficient in organizing the use of the nets and in reserving a portion of the catch to purchase thread needed for repairs. However, only a small, though increasing, number of men and women knew how to sew nets correctly. Through misfortune and lack of skill, those who used them often returned them with substantial damage from the coral-strewn bottoms of the bays in which they set the nets out. Some neighbourhood associations were incapable of even the simplest level of organization needed to employ and maintain their nets. All were hampered by the uncertain opportunities of selling fish for cash. The main cash purchasers, other than the mission, are school teachers. The gift of the nets was mediated by influential persons deriving from the village, who made it plain to the villagers that they were expected to prove that they could keep the nets up and set aside enough cash to replace them when the time came, if they wished further assistance in the future. By the end of 1982 even the most conscientious villagers expressed doubts about their ability to do so, for both economic and sociological reasons.

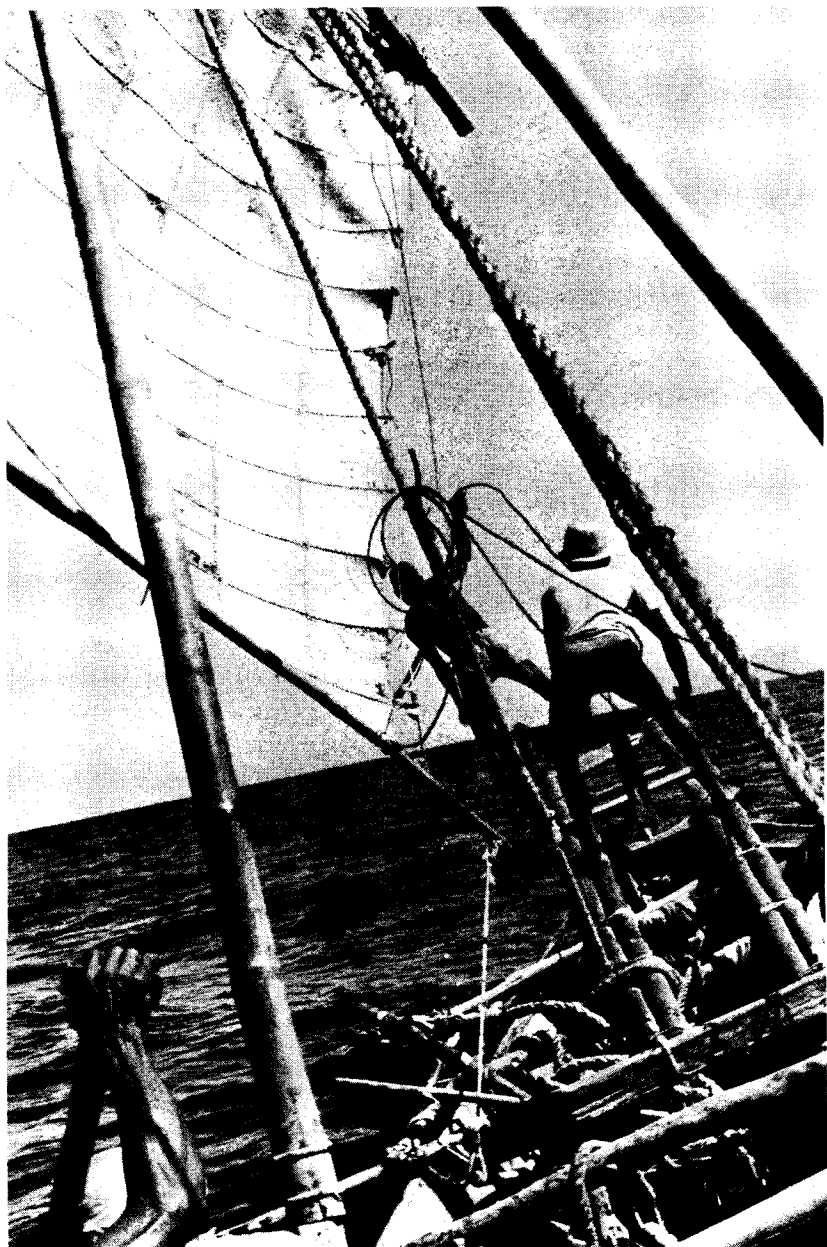
The masterfisherman trained thirty-four young men, including six crew members of the "FAO 82" and its captain. Two persons were sent by the project for schooling at Tegal, Java and Singaraja, Bali. When they returned they were made engineers on the boat, but one soon took a job in Kupang, Timor. Of twenty-five who completed one or other of the two formal courses of training in fishing methods and rules of the road (one course lasted three months, the other six), only ten were engaged in some aspect of fishing in Lamalera during 1982, although two of these were away from the village much of the time working on construction sites. Three held jobs as clerks in government offices, though not in the fisheries service. Two were working on construction projects at Waiwerang, Adonara, and two were currently working as migrant labourers in the lumbering industry at

Tawau, Kalimantan. Two were attending university at Jakarta. One was a tailor at Maumere, Flores; another served as the captain of a privately owned motor boat carrying passengers to and from the village, and the occupation of another is unknown. Two were taking further training at the fisheries school established at Larantuka in Phase II. No doubt, each of the former students benefitted in lasting ways from the training they received, but few of them are now actively employing their new skills in Lamalera. Ironically those who are best at using the nets and maintaining them, and in these respects provide a certain leadership for those who are now learning, never had anything to do with the FAO project and possessed their skills before it started.

As the masterfisherman wrote in one of his reports, "The modern method of whaling is not without problems." Additional equipment and ammunition must be imported each year. These items, he said, are "rather expensive" and "not so easy to get into the country". Diesel fuel is sometimes not available in Larantuka, and special arrangements must be made to bring it in. Repairing and maintaining the boat, its engine and other equipment causes great difficulty since nothing can be done in Lamalera itself. The nearest place where work of this kind can be done is in Larantuka, four and a half hours away by boat where the Catholic mission runs a workshop. They lack tools and cannot supply material for repairs. Material and parts must be bought in Surabaya. For major repairs, the vessel must in any case be taken six hundred miles back to Surabaya.

Furthermore maintenance and repair as well as purchase of fuel, lubricating oil and new equipment demand a cash income. These were among the considerations which led the masterfisherman to pay attention to the marketing of fish. Yet in his last report from the village, November 1975, he could still lament the problems of marketing. "The main reason," he said, "is that there is no money among the people".





Harpooning a manta ray. (Photo: author)

This is an overstatement, but for the amounts required, essentially correct.

Throughout the three years, the masterfisherman was constantly confronted with the fact that he was running the wrong project for the wrong place. Instead of providing a catalyst of training and instruction for a process of change already underway, as he must have expected he was intended to do, he found that he would have to produce the transformation singlehandedly, if the skills he was offering were to be of any use at all. Not only did the masterfisherman need to train men to run a motor boat and shoot whales with a harpoon cannon, show them how to salt meat, collect oil, build boats, use nets, set up a cooperative, run a store and so on, but he also needed, if success were to be attained, to introduce a money marketing system for the region, induce people to rely on bank financed investments, increase the volume of production and sale to support the expense of purchasing and running sophisticated equipment, make them comfortable with frequent long trips to Java to secure supplies and repairs and to negotiate the annual importation of explosives. The ambitions quite outpaced the possibilities. It is no wonder that the FAO Officer from Jakarta, in his follow-up report, could write: "It can be said with hindsight that the nature of the equipment supplied under the project largely determined the nature of the project activities", and in drawing the balance could conclude: "The whaling operation has been a questionable activity from its very beginning".

The FAO project and its failures are still topics of discussion in Lamalera. The people feel that the technology was unsuited to their situation, and they express puzzlement about the aims of the program. The benefits of the whaling they regard as having been only temporary. Above all, they are bitter about the "FAO 82". Many claim that they had

thought that the first FAO representative had told them the boat was going to be given to the village. Instead, on the advice of the masterfisherman, the donor transferred it to the training school which was set up at Larantuka in "Phase II". In 1979, the boat was stationed at Larantuka in the care of the Fisheries Service, but since the training school was then moribund, it was used for no specific purpose. By 1982, the training school had been revived, but the boat seems to have been little used. The villagers of Lamalera feel that its status is uncertain, which means that they think their claim to it has been neither denied nor conceded. They have no interest in the cannon, but would like the motor boat for use in rescue and pulling whales to shore.

In 1979 the number of traditional whaling vessels in use had increased to nineteen, but in 1982 (an extremely poor season) this number again declined to fourteen. National economic changes which are now having an effect on the region are drawing young men from the village, making it difficult to form crews and placing the traditional fishery under threat. Nevertheless, the fishery retains vigor, and the villagers regard whaling and the boats as of great importance for the identity of the village and its constituent families. Even some retired school teachers take up places in the crew of their clan boats. Shortly after the project in the village was terminated two of the boats were rebuilt and have been reasonably successful since. No more boats were built until, surprisingly, the end of the poor 1982 season, when three were under construction simultaneously. There was much discussion whether the ancient designs should be modified to accept outboard motors, but this step had not yet been taken.

After 1975, the second project called "Phase II" was undertaken at Larantuka, Flores. The letter of agreement for "Phase II" reflects on the reasons for shifting the location of the site and also comments that: "in order to ensure



An elder arranging the boat. (Photo: author)

lasting impact, the mentality of the islanders will have to be reoriented from subsistence to production". If the masterfisherman eventually found it impossible to sustain the effort to keep the "FAO 82" hunting whales in Lamalera, it is an easy conclusion that the villagers themselves would never be able to do so. They lack the mobility and financial backing to overcome each of the obstacles listed above. Furthermore no attempt to reorient the island's economy from subsistence to production can be undertaken by introducing a gun and a boat into one village. Even if this end were desirable, it would require capital investment and major planning steps on at least the state level. No such measures were in prospect in 1975. For the time it seems reasonable to expect no more than small steps taken at a measured pace. Local level development projects will have to adjust their ambitions to fit local possibilities.

<sup>1</sup> The principal substance of this article derives from the FAO documents listed below, as well as from interviews with the masterfisherman, FAO officers, relevant persons in the mission, and of course the villagers. Thanks are due to the FAO and the Indonesian government for permission to cite and quote from documents deriving from the FAO project. Research in Lamalera was conducted under the auspices of the Lembaga Ilmu Pengetahuan Indonesia and supported in 1970 by the National Science Foundation of the United States, in 1979 by the World Wildlife Fund, and in 1982 by the Social Science Research Council of Great Britain. The 1982 visit was sponsored by Fakultas Sastra of the Universitas Indonesia, Jakarta. I express my gratitude to all persons and agencies who have assisted this research. Photographs on pages 4, 6, 14, 17, and 27 published by permission of the World Wildlife Fund.

#### REFERENCES

##### Unpublished documents

1. Project Request: Training Centre on Improved Fishing - Island of Lombok, 1969.
2. The Freedom from Hunger Campaign: Training Island of

Lomblen, 1969.

2. The Freedom from Hunger Campaign: Training Island of Lomblen. Reports 1-9 and Final Report of the Fishing Technologist, March 31, April 4, May 22, and December 1, 1973; March 30, August 30 and November 30, 1974; June 30 and November 30, 1975; February, 1976.
3. The Freedom from Hunger Campaign, Plan of Operation: Training Centre on Improved Fishing (Phase II), Larantuka, TF/INS. 14 (FH) Phase II, 30 March, 1976.
4. Report on Mission to Project TF/INS. 14 (FH), Training Centre for Improved Fishing, Larantuka, Flores, 30th August to 9th September, 1976.
5. Report on a Visit to TF/INS: 14 (FH), Training Centre for Improved Fishing, Larantuka, (Phase II), 15 September, 1976.

#### Publications

- |                      |   |
|----------------------|---|
| Barnes, R.H.         | 1974. Lamalerap: a Whaling Village in Eastern Indonesia. <u>Indonesia</u> No. 17 (April): 137-159.  |
| Barnes, R.H.<br>.    | 1980. Cetaceans and Cetacean Hunting: Lamalera, Indonesia. (Report on World Wildlife Fund Project 1428. Typescript, 82 pp. Available from the World Wildlife Fund). |
| Klausen, Arne Martin | 1968. Kerala <u>Fishermen and the Indo-Norwegian Pilot Project</u> . Oslo: Universitetsforlaget.  |
| McNeil, Desmond      | 1981. <u>The Contradictions of Foreign Aid</u> . London: Croom Helm.  |

**IWGIA LOCAL GROUPS:**

Copenhagen: Fiolstræde, 10  
DK 1171 Copenhagen K  
Denmark

Århus: c/o International Forum  
Fredensgade 34,  
8000 Århus C  
Denmark

Oslo: pb 20, Blindern 0313  
Oslo 3  
Norway





Reports printed in the Documentation Series are:

- No. 1 Declaration of Barbados
- No. 2 Karl E. Knutsson: Report from Eritrea (out of print)
- No. 3 A. Barrie Pittock: Aboriginal Land Rights (out of print)
- No. 4 Rupert R. Moser: The Situation of the Adivasis of Chotanagpur and Santal Parganas, Bihar, India (out of print)
- No. 5 John H. Bodley: Tribal Survival in the Amazon: The Campa Case
- No. 6 René Fuerst: Bibliography of the Indigenous Problem and Policy of the Brazilian Amazon Region
- No. 7 Bernard Arcand: The Urgent Situation of the Cuiva Indians of Columbia
- No. 8 Stefano Varese: The Forest Indians in the Present Political Situation of Peru
- No. 9 Walter Coppens: The Anatomy of a Land Invasion Scheme in Yekuana Territory, Venezuela (out of print)
- No. 10 Henning Siverts: Tribal Survival in the Alto Marañon: The Aguaruna Case (out of print)
- No. 11 Mark Münzel: The Aché Indians: Genocide in Paraguay
- No. 12 Nelly Arvelo Jiménez: The Dynamics of the Ye'cuana («Maquiritare») Political System: Stability and Crisis (out of print)
- No. 13 Carmen Junqueira: The Brazilian Indigenous Problem and Policy: The Example of the Xingu National Park
- No. 14 Douglas E. Sanders: Native People in Areas of Internal National Expansion: Indians and Inuit in Canada.
- No. 15 Alicia Barabas and Miguel Bartolomé: Hydraulic Development and Ethnocide: The Mazatec and Chinantec People of Oaxaca, Mexico
- No. 16 Richard Chase Smith: The Amuesha People of Central Peru: Their Struggle to Survive
- No. 17 Mark Münzel: The Aché: Genocide Continues in Paraguay
- No. 18 Jürgen Riester: Indians of Eastern Bolivia: Aspects of Their Present Situation
- No. 19 Jean Chiappino: The Brazilian Indigenous Problem and Policy: The Example of the Aripuana Indigenous Park
- No. 20 Bernardo Berdichewsky: The Araucanian Indian in Chile
- No. 21 Nemesio J. Rodriguez: Oppression in Argentina: The Mataco Case
- No. 22 Jacques Lizot: The Yanomami in the Face of Ethnocide
- No. 23 Norman E. Whitten, Jr.: Ecuadorian Ethnocide and Indigenous Ethnogenesis: Amazonian Resurgence Amidst Andean Colonialism
- No. 24 Torben Monberg: The Reactions of People of Bellona Island Towards a Mining Project
- No. 25 Felix Razon and Richard Hensman: The Oppression of the Indigenous Peoples of the Philippines
- No. 26 Peter A. Cumming: Canada: Native Land Rights and Northern Development
- No. 27 Peter Kloos: The Akuriyo of Surinam: A Case of Emergence from Isolation
- No. 28 Ernesto Salazar: An Indian Federation in Lowland Ecuador
- No. 29 Douglas E. Sanders: The Formation of the World Council of Indigenous Peoples

- No. 30 Julio Tumiri Apaza (ed.): *The Indian Liberation and Social Rights Movement in Kollasuyu* (Bolivia)
- No. 31 Norman Lewis: *Eastern Bolivia: The White Promised Land*
- No. 32 Ernest G. Migliazza: *The Integration of the Indigenous People of the Territory of Roraima, Brazil*
- No. 33 Guatemala 1978: *The Massacre at Panzós*
- No. 34 Norman E. Whitten, Jr.: *Amazonian Ecuador: An Ethnic Interface in Ecological, Social and Ideological Perspectives*
- No. 35 Richard Chase Smith: *The Multinational Squeeze on the Amuesha People of Central Peru*
- No. 36 Gerald D. Berreman: *Himachal: Science, People and »Progress«*
- No. 37 *The Yanoama in Brazil 1979*
- No. 38 *Chile 1979: The Mapuche Tragedy*
- No. 39 A. Barrie Pittock: *Australian Aborigines: The Common Struggle for Humanity*
- No. 40 Torben Retbøll (ed.): *East Timor, Indonesia and the Western Democracies*
- No. 41 Susana B. C. Devalle: *Multi-ethnicity in India: The Adivasi Peasants of Chota Nagpur and Santal Parganas*
- No. 42 Brigitte Simón, Barbara Schuchard, Barbara Riester and Jürgen Riester: *I Sold Myself; I Was Bought – A Socioeconomic Analysis Based on Interviews with Sugar-cane Harvesters in Santa Cruz de la Sierra, Bolivia.*
- No. 43 Sören Hvalkof and Peter Aaby (eds.): *Is God an American? an anthropological perspective on the missionary work of the Summer Institute of Linguistics, joint publication with Survival International, London.*
- No. 44 Paul L. Aspelin and Silvio Coelho dos Santos: *Indian Areas Threatened by Hydroelectric Projects in Brazil.*
- No. 45 Robert Paine: *Dam a River, Damn a People? Saami (Laap) Livelihood and the Alta/Kautokeino Hydro-Electric Project and the Norwegian Parliament.*
- No. 46 Nicolás Iñigo Carrera: *»Violence« as an Economic Force: The process of proletarianisation among the indigenous people of the Argentinian Chaco, 1884-1930.*
- No. 47 Klaudine Ohland and Robin Schneider eds. *National Revolution and Indigenous Identity.*

#### Documentos en Castellano

- No. 1 Ricardo Falla: *Masacre de la Finca San Francisco Huehuetenango, Guatemala (17 de Julio de 1982)*

The reproduction and distribution of information contained in the IWGIA NEWSLETTERS and the IWGIA DOCUMENTS is welcome as long as the source is cited. However, reproduction of whole DOCUMENTS should not occur without the consent of IWGIA, according to our copyrights.

© Copyright 1984  
by International Work Group for Indigenous Affairs  
All rights reserved