

management of fishing vessels: somalia



UNITED NATIONS DEVELOPMENT PROGRAMME



FOOD AND AGRICULTURE ORGANIZATION
OF THE UNITED NATIONS

Technical Report No. 34

SOMALIA

Report on Management of Fishing
Vessels

prepared by

Lawrence Christy
Legal Officer

Robin Rackowe
Management Consultant

Indian Ocean Programme

FOOD AND AGRICULTURE ORGANIZATION OF THE UNITED NATIONS

UNITED NATIONS DEVELOPMENT PROGRAMME

Rome, 1979

The designations employed and the presentation of material in this publication do not imply the expression of any opinion whatsoever on the part of the Food and Agriculture Organization of the United Nations concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries.

Bibliographic Entry:

Christy, L. and R. Rackowe. (1979)
Tech.Rep.Indian Ocean Programme, (34):22
Report on management of fishing vessels.

Fishery development. Fishery institutions.
Commercial fishing. Somalia.

The copyright in this book is vested in the Food and Agriculture Organization of the United Nations. The book may not be reproduced, in whole or in part, by any method or process, without written permission from the copyright holder. Applications for such permission, with a statement of the purpose and extent of the reproduction desired, should be addressed to the Director, Publications Division, Food and Agriculture Organization of the United Nations, Via delle Terme di Caracalla, 00100, Rome, Italy.

ABSTRACT

The Government of Somalia has acquired a fleet of commercial fishing vessels and has requested advice from the Indian Ocean Programme on their management. The present report reviews the vessels' operational possibilities as well as the actions necessary to realize them. The report recommends that management be contracted to a suitably qualified fishing company and that a state-owned corporation be established to own the vessels and eventually to manage them. The report contains financial and staffing tables and an outline of points for a corporate statute and a management contract.

TABLE OF CONTENTS

Page

1. INTRODUCTION	1
2. DEPLOYMENT	1
2.1 Resources	2
2.2 Ports	2
2.3 Holding Catch on Board	2
2.4 Delivery of Catch	2
2.5 Catch	2
2.6 Options for deployment	2
2.7 Budgets and charts	4
3. MANAGEMENT PRACTICES	16
4. ORGANIZATION	18
4.1 Establishing the Entity	18
4.2 Providing for Management	20
4.3 Management contract issues	21
5. SUMMARY OF RECOMMENDATIONS	22
TABLES	following page 4

Actions required for commercial operation of 23-metre vessels
Operating Budget - two 28-metre boats operating alone
Cash Flow - two 28-metre boats operating alone
The Cost of Staying in Port
Cost of Operation - nine 23-metre boats
Cash Flow - nine 23-metre boats
Management of 11 Fishing Boats - Organization Chart
Responsibility and Authority of Senior Management
Management of 11 Fishing Boats - Manning Scale
Administrative Budget - two 28-metre boats and nine 23-metre boats

1. INTRODUCTION

The Government of Somalia, as part of its overall fisheries development programme, has recently purchased two 28-metre Australian-built shrimp trawlers and nine 23-metre Yugoslav-built multi-purpose fishing vessels. The 28-metre vessels have begun fishing for deep-water lobster out of Mogadishu. The first four of the 23-metre vessels have been delivered to Berbera but not yet deployed. The remaining five should be delivered within six months.

The state-owned fishing company, Somafish, has contracted with Straits Fisheries of Singapore for certain services in connection with the 28-metre vessels, including the provision of a fleet operations director and other personnel and spare parts. The construction contract for the 23-metre boats provides two shore-based expatriate engineers for the first year of operations. There is also an agreement to provide Yugoslav skippers, engineers and master fishermen, as well as an operations director, for the 23-metre boats.

The Government has asked FAO, through the Indian Ocean Programme to advise it on the establishment of an organization to manage these eleven vessels. Accordingly, a mission comprising Lawrence Christy, Legal Officer, and Robin Rackowe, Management Consultant, visited Mogadishu* to provide the advice requested. The present report contains the findings and recommendations of the mission on the organization and management of the fleet. Additional comments on contracts have been provided separately.

2. DEPLOYMENT

Without an inspection of at least one of the nine 23-metre vessels and a detailed costing of different possibilities for modifying and using them, no real recommendations can be made for their operation. The Mission does, however, have some indirect information on the vessels which indicates the factors that need investigation and the general nature of the courses of action which the owner or operator of the vessels should consider.

On the limited information available, it appears that a certain amount of investment will have to be made before the vessels can be used in any economic endeavour. This means that experienced management will have to be put in place immediately to evaluate the situation and to begin to take action, so that operations can begin and income start to flow within a reasonable time.

The appropriate disposition of the vessels will depend on a combination of the resources available, the possibilities, with or without further investment, of catching, handling and disposing of the resources, and the availability of bases for the vessels in some proximity to the resources. These factors are dealt with at some length in other reports available to the Government; the following merely summarizes the most relevant conclusions.

The vessels are described as multi-purpose trawler-seiners, capable of fishing for lobster and demersal fish, small pelagic fish and tuna. How well they can perform on any of these resources is subject to the results of real experience, but certain activities already seem more promising than others.

Neither tuna nor small pelagic fish offer any possibility for processing as food fish until facilities at Las Kereh and Bolimog are overhauled. Tuna catching also presents difficulties; tuna purse-seining has not been tried before on the North Coast and the boats are not equipped for long-lining or live-bait operations. Sizeable catches of small

* Mr. Rackowe arrived in Mogadishu 27 October 1979 and departed 11 November.
Mr. Christy arrived with Mr. Rackowe but remained in connection with another assignment.

pelagic fish may be possible but will exceed the capacity of Bolimog's fishmeal plant which, in any case, is inoperable at present. Thus, any work on the tuna or small pelagic resources would have to be undertaken on a survey or experimental basis.

Bottom trawling for fin-fish, shrimp and deep-water lobster is currently conducted on a commercial basis by five licensed Italian vessels and has just begun with two 28-metre trawlers recently brought from Singapore by Somalfish. Subject to the solution of certain problems, the trawl fisheries appear to be the most logical place for the 23-metre vessels to start commercial operations.

2.1 Resources: Resource information is scanty, but it does indicate that resource shortages should not be a constraint on trawling for fin-fish. Usable catches of 7 tons a day are reported by 2000-horsepower Italian trawlers. The extent of the trawlable deep-water lobster resource appears to be much more limited. Some estimates of the total allowable catch would be easily surpassed if all vessels (5 licensed Italian vessels, two 28-metre trawlers and nine 23-metre vessels) concentrated their efforts on this resource during the half year currently thought to constitute the lobster season. Resources of deep-water shrimp are much less well known than lobster. Assumptions about crustacea catches may not, therefore, be valid when applied to the entire fleet; great care should be taken to prevent damage to the resources through overfishing.

2.2 Ports: Only Kismayo, Mogadishu and Berbera currently approach minimum requirements for safe berthing and supply of necessary services (mechanical, electrical, welding and electronic repairs, together with fuel, water and provisions). Of these only Kismayo and Mogadishu are reasonably close to the trawl grounds the vessels would exploit, although Berbera could serve as a base for North-coast survey work. In time Bolimog and Las Korsh could become available, which would increase the range of fishing possibilities.

2.3 Holding catch on board: No port in Somalia has a sufficient supply of ice to cover the requirements of the boats. Three boats are equipped with icemakers with a capacity of two tons per day; this quantity of ice would be sufficient to hold small quantities of product, but is unlikely to be enough to cover requirements if the boats are targetting on fish. All boats are fitted with refrigeration designed to maintain a temperature in the hold of -2°C , with the object of causing the ice to melt more slowly. This system along (on the six boats which do not have icemakers) could only be marginally useful in preserving the catch of boats operating in a day fishery. Even then, it would probably not be of any use in preserving lobster, which may require immediate chilling.

2.4 Delivery of catch: Only Kismayo has a freezer which is operating reliably, but arrangements may be possible to deliver the catch to the two 28-metre trawlers (which are described as being capable of this) and/or one or more of the Italian vessels operating under licence. Initial contact with the agent for the Italian vessels on this subject was not promising. The municipal cold store in Mogadishu could, with some expenditure, probably be put into condition to receive, freeze and hold product adequately. It is suggested that the Ministry consider acquiring this cold store for use until such time as the major infrastructure is in place.

2.5 Catch: One obvious possibility is to put these vessels to catch the deep-water lobster, particularly in view of the fact that the small volume would make it easier to solve the problem of conservation. However, there is doubt whether the fishing gear provided will be adequate for this type of deep-water trawling. Steel wire rope is shown as 12 mm ($\frac{1}{2}$ inch) which is thought to be too light; for purposes of reference it should be noted that the 28-metre vessels are equipped with 18 mm ($\frac{3}{4}$ inch) steel wire rope. Furthermore, even with 12 mm wire, the winches can only hold 800 metres. At a ratio of 3 to 1 this would permit trawling in a maximum depth of about 270 metres, whereas the deep sea lobster are found at depths of 225 to 380 metres. There is also uncertainty whether there is sufficient spare fishing gear.

2.6 Options for deployment: From the discussion thus far it is evident that without solutions to catching and handling problems, the vessels will not be usable in commercial fishing. The most urgent action would be to supply adequate winches, if the original

equipment does not permit the vessels to work the deeper lobster grounds. The number of vessels to be so modified would be limited to those the resource could support and in which there were facilities for holding the catch on board; subject also to the provision of facilities for receiving the product from the boats. In the first instance, only the three vessels equipped with icemakers would qualify. Failure to modify the winches will likely reduce catches below any economical level and could also affect the performance of the Singapore vessels if they were called off deeper grounds to act as mother ships.

The next step, which it is hoped would be initiated immediately, and which would affect the decision on which vessels to re-equip with larger winches, is to install a capacity for catch-preservation aboard the six vessels without icemakers. This could be done through installation of icemaking capacity ashore or onboard or on a suitable mother ship, or through installation of on-board refrigeration. The alternatives must be investigated and costed carefully, but action must follow directly. Failure to do this will limit six of the vessels to a day fishery for fin fish or the necessity of transshipping lobster after every haul. It is unlikely either of these operations could return its operating costs.

Besides the major problems of winches and cooling, there are likely to be lesser obstacles to economic operation. The most obvious is the lack of sufficient spare parts, without which it will be impossible to maintain a viable operation. Furthermore, it appears that no replacement equipment has been provided; for an efficient operation it is essential to have spare units for quick replacement, such as radios, propellers, tailshafts, pumps and so on. It is likely that the fishing gear will require some modification and additions depending on the fisheries targetted on. Finally, no provision appears to have been made for short range ship-to-ship and ship-to-shore radio communications; an adequate system would be inexpensive and easy to install.

The following illustrate the range of choices that exist for employing the vessels, or for minimising the cost of not employing them.

2.6.1 Extended training under charter or joint venture: Both India and Oman would be interested in chartering multipurpose vessels of this general type for a period of several years, or of having them fish in their waters under some form of joint venture; there may be other countries also interested in this possibility. Vessels would retain Somali ownership and probably Somali flag. This would be an excellent form of training. The vessels would be brought back to Somalia when the infrastructure was in place. This would also Somalia to generate income during the period required for training and for the provision of the necessary infrastructure in Somalia.

2.6.2 Lay-up: The boats could be laid up in Somalia until the infrastructure were ready. This would reduce cash requirements, but it should be noted that vessels laid up require certain maintenance if there is to be no deterioration, and payments to the Yugoslav builders would have to be made.

2.6.3 Work with Mother Ships: The 28-metre trawlers and/or the Italian trawlers could be used as mother ships to take the catch from the Yugoslav vessels each day. This would undoubtedly hamper their own fishing. Delivery in the open sea under certain conditions would be difficult or impossible, and require the vessels to seek the nearest sheltered harbour with further loss of time. The six 23-metre boats that have no icemaking capacity would probably not be usable in this operation, since neither the Italian nor Singapore vessels can supply them with ice.

Another possibility would be to charter a mother ship, which would not fish itself, but would provide the boats with ice and take their catch. The economics of this would have to be carefully studied. It would undoubtedly take several months before such a vessel could be found, chartered and put in place. It would have the advantage of solving the onboard preservation problem for the six vessels without their own ice.

2.6.4 Delivery to shore plant: At present only Kismayo can freeze and store product. This would limit the deployment of the boats to a small area around Kismayo and to fishing for deep sea lobster (if their gear so permits) and possibly shrimp. A similar deployment

around Mogadishu would be possible if the municipal cold store were usable. In either case, only the boats with ice could be used.

2.6.5 Development Projects and Training: These are non-commercial activities for which the suitability of these boats would require careful study. If it is decided to use one or more of the boats for test fishing for small pelagic fish and/or tuna, or for training purposes, then the operating entity should receive a charter fee, since there will be no income from the operations. If the boats are used for test fishing in the north and north-eastern areas, it is strongly recommended that they be operated in pairs, for reasons of safety.

2.7 Budgets and Charts: In an effort to provide Government with some bases on which to make operating decisions, the mission has prepared the following:

- (i) A chart showing the actions required to operate the 23-metre boats.
- (ii) Operating budget for 1 year (1980) for the two 28-metre boats, operating alone; also a Cash Flow and a calculation showing the Cost of Staying in Port.
- (iii) Cost of Operation for 1 year for the nine 23-metre boats; also a Cash Flow.
- (iv) Organization Chart and Manning Scale for the operation of all 11 boats; also an Operating Budget for the cost of Administration.

The Mission was unable to prepare a full Operating Budget for the 23-metre boats since income will depend on operating decisions which have yet to be taken.

It should be noted that such figures as have been prepared are in many instances the result of assumptions based on very limited information. Experience will show the extent to which these assumptions were valid; we expect there to be substantial variations in some cases.

Actions required for commercial operation of
23 metre vessels

Fishery

Delivery to	Demersal Fish	Deep Lobster	T u n a	Small pelagics	Shrimp
Kismayo		Replace winches Instal ice/re- frigeration *			Insufficient resource information
Mogadishu	Instal ice/re- frigeration Repair munici- pal cold store	Replace winches Instal ice/re- frigeration* Repair munici- pal cold store			"
Bolimog	Instal ice/re- frigeration Repair plant		Develop methods/ gear Instal ice/ refrig- eration Repair plant	Develop methods/ gear Instal ice/re- frigeration Repair plant For fishmeal: expand capa- city and improve harbour	"
Las Koreh	Repair plant		Develop methods/ gear Repair plant		"
28 metre vessels	(Limited receiving capacity)	Replace winches Instal ice/ refrigera- tion*			"
Italian vessels	Instal ice/ refrigera- tion	Replace winches Instal ice/ refrigera- tion*		Develop methods/ gear	"
Mother ship	No further investment	Replace winches	Develop methods/ gear	Develop methods/ gear	

*Ice/refrigeration for lobster required
in 6 boats; 3 already have small icemakers.

Operating Budget

Two 28-metre boats - operating alone

Assumptions:

Days at sea/year		250
Catch per day at sea - lobster tails (kgs)		500
	- fish (tons)	2.6
	- headless shrimp (kgs)	300
Catch per boat/year - lobster tails (tons)		62.5
	- fish (tons)	325
	- headless shrimp (tons)	37.5
Price F.O.B. Somali port	- lobster tails (US\$/ton)	7 000
	- fish (US\$/ton)	600
	- shrimp (US\$/ton)	4 400
Catch target	- lobster/shrimp (months)	6
	- fish (months)	6

<u>Income:</u>	<u>Per boat</u>	<u>Total</u>
Lobster	US\$ 437 500	
Fish	195 000	
Shrimp	<u>165 000</u>	
	797 500	

Expenses:

Crew - expatriate	119 000	
- Somali	<u>84 000</u>	203 000
Fuel and lubricating oil	284 800	
Packaging	46 800	
Food	87 600	
Fishing Gear	40 000	
Maintenance	60 000	
Insurance	31 000	
Others	20 000	
Depreciation: over 6 years with 25% residual value	<u>110 600</u>	
Total	883 800	
Operating Profit/(loss)	(86 300)	(172 600)
Administration - Somalifish ^{1/}		193 000
- Expatriate		50 000
- Straits Fisheries' services		30 300
Interest on working capital at 10% per year		<u>11 300</u>
Profit/(loss) without provision for taxes		(457 200)

^{1/} 50% of total expenses of Somalifish.

Cash Flow

1 year

Two 28-metre boats - operating alone

Starting balance	US\$	Not known
After tax profit/(loss) on operations		(457 200)
Depreciation charged		221 200
Capital investment		(10 000)
Debt repayment		-
Ending balance, without taking account of starting balance		(246 000)

Cost of Operation

1 year

Nine 23-metre boats

Assumptions:

Days at sea/year 250

Expenses:

		<u>Per boat</u>	<u>Total</u>
Crew - expatriate	US\$ 112 000		
- Somali	40 000	152 000	
Fuel and lubricating oil		138 500	
Ice		30 000	
Packaging ^{1/}		-	
Processing ^{1/}		-	
Food		47 500	
Fishing gear		30 000	
Maintenance		45 000	
Others		<u>15 000</u>	
		458 000	
Depreciation; over ten years with 25% residual value		37 500	
Insurance		17 500	
Interest on financed portion of purchase price of boat		<u>20 000</u>	
		533 000	4 797 000

^{1/} It is assumed that product is sold ex-vessel.

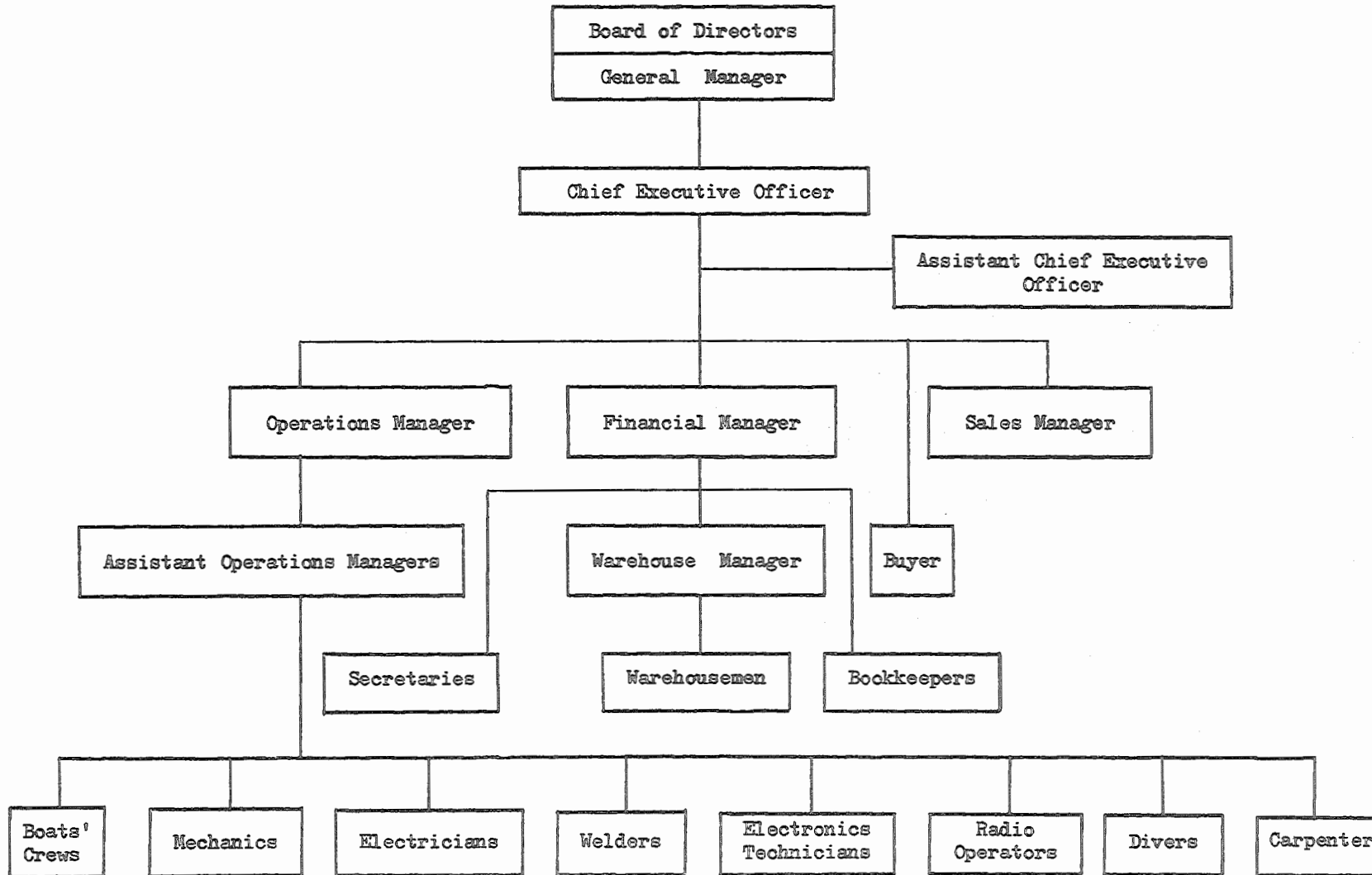
Cash Flow 1 year
Nine 23-metre boats

Starting balance	US\$ Not known
Initial delay in income in relation to expenses ^{1/}	-
Initial inventory of spare parts and gear, for 1 year	(472 500)
Replacement units	(100 000)
Capital investment ^{1/}	-
After-tax profit/(loss) on operations ^{1/}	-
Depreciation charged	337 500
Debt repayment	(514 300)
Ending balance ^{1/}	-

^{1/} Will vary depending on what operating decisions are taken

MANAGEMENT OF 11 FISHING BOATS

ORGANIZATION CHART



Responsibility and Authority of Senior Management

General Manager:

The General Manager of the Company will be a member of the Board of Directors. He will be responsible for the management of the company, with the authority to delegate his powers. In the beginning it is recommended that fishing operations be managed under a management contract and that the chief executive officer be nominated by the management company. The General Manager could in this case be part-time or, in a company with other activities, would manage such of the latter as were not under management contract and see to general company matters.

Chief Executive Officer:

The Chief Executive Officer will exercise the management functions delegated by the General Manager pursuant to a management contract with an experienced fishing company. The delegated functions will include the authority within Somali law to recruit and discharge local and expatriate staff, establish conditions of employment, purchase goods and services essential for operations and sell the product, and acquire capital assets up to a limit of So.Sh. 200 000. The Chief Executive Officer will be in full charge of the day to day operations of the company (or if it has other activities, of its fishing division), acting within the policies established by the Board of Directors. He will report to the Board through the General Manager.

Management of 11 Fishing Boats

Manning Scale

<u>Title</u>	<u>Number</u>	<u>Nationality</u>	<u>Total cost per year (per person)</u>	<u>Responsibility</u>
<u>A. General</u>				
Chief Executive Officer	1	Expatriate	US\$ 60 000	Overall responsibility for management
Assistant Chief Executive Officer	1	Somali	8 000	To assist the Chief Executive Officer and replace him in his absence
Operations Manager	1	Expatriate	50 000	Fleet operations and boat maintenance
Assistant Operations Manager	1	Expatriate	35 000	To assist the Operations Manager and replace him in his absence
	1	Somali	6 000	
Master mechanic(diesel)	1	Expatriate	30 000	Boat maintenance
" " (hydraulic)	1	Expatriate	30 000	
" " (refrigeration)	1	Expatriate	30 000	
Mechanics	4	Somali	5 000	
Master Electrician	1	Expatriate	30 000	Boat maintenance
Electrician	2	Somali	5 000	
Welders	2	Somali	5 000	Boat maintenance
Master Electronics Technicians	2	Expatriate	30 000	Boat and shore station maintenance
Electronics Technicians	2	Somali	5 000	
Radio Operators	2	Somali	4 000	Radio communication shore to boats
Carpenter	1	Somali	5 000	Boat maintenance
Master Diver	1	Expatriate	30 000	Boat maintenance
Diver	1	Somali	4 000	
Warehouse Manager	1	Expatriate	30 000	Supervision of warehouse and stock centre
Warehouseman	2	Somali	4 000	Reception and dispatch of stores
Secretaries	2	Somali	4 000	Typing and office support
Financial Manager	1	Expatriate	40 000	Financial, accounting and control of budget

<u>Title</u>	<u>Number</u>	<u>Nationality</u>	<u>Total cost</u>	<u>Responsibility</u>
Bookkeepers	3	Somali	4 000	Accounts, payroll, inventory control, payments
Buyer	1	Somali	5 000	Local purchasing
Sales Manager	1	Expatriate	<u>40 000</u>	Overseas marketing and purchasing
			579 000	
B. <u>Boats' Crews</u>				
Skippers	13	Expatriate	45 000	Boat operations
Engineers	15	Expatriate	37 000	Boat maintenance
Mates	11	Expatriate	30 000	Supervision of fishing operations
Fishermen	132	Somali	<u>4 000</u>	Fishermen
			<u>1 998 000</u>	
TOTAL			2 577 000	

Administrative budget 1 year
Two 28-metre boats and nine 23-metre boats

Administration:

Personnel - expatriate - ashore	\$ 465 000	
- backup crews	224 000	
- Somali	114 000	803 000
Communications		18 000
Travel, including vehicles		130 000
Aeroplane ^{1/}		-
Rent and office expenses		20 000
Commissions on services - personnel \$1 935 000 at 15%	= 290 300	
- packaging \$93 600 at 3%	= 2 800	
- replacement units \$100 000 at 5%	= 5 000	
- spares and gear \$612 500 at 5%	= 30 600	
- spares and gear (initial order) \$472 500 at 5%	= <u>23 600</u>	352 300
Others		<u>50 000</u>
		1 373 000

^{1/} Will depend on what operating decisions are made; if boats are to fish off North and/or North East costs then aeroplane will be required.

3. MANAGEMENT PRACTICES

The effective management of boat operations requires the following general characteristics and structure:

- a clear definition of policy from the entity to which management is responsible
- management must be autonomous and independent of interference from the policy giving entity in its daily functions
- management must be funded to act independently without requirement to seek approval for operating expenditures; management should be granted freedom to make capital expenditures up to a limit set by the policy-making entity.

An effective management is characterized by its rapidity in action for taking decisions and solving problems; any structural arrangement which inhibits such rapidity will adversely affect operations.

One fundamental measure of the effectiveness of boat management is days at sea. It is axiomatic that a boat which is not at sea cannot catch fish, so that one of management's prime objectives is to ensure that boats are at sea for the maximum number of days possible. Days at sea should be carefully budgetted each year, making due allowance for turn around time between trips for unloading catch and preparing for the next trip, together with the allocation of time for maintenance, overhaul and drydocking. Management must maintain daily control of days at sea in relation to budget. Maintaining the number of boat days at sea called for by the budget will be achieved only by constant vigilance on the part of management to ensure that immediate action is always taken to reduce time spent in port to the minimum compatible with sound operating practices.

A second fundamental measure of the effectiveness of boat management is catch per day at sea. An annual budget should be prepared, on the basis of historical data, by species; management must constantly compare actual catches against the budget. Management will require intelligence of the catch of other fleets; the skippers must be advised of any information which may help them to find the most productive fishing grounds. Seasonal variations in species and relative catch per day at sea must be monitored and recorded. Improvement in catch rates will be achieved by the application of gear technology, e.g. improved and/or new fishing methods.

An important measure of results lies in prices for product. Again, prices must be carefully budgetted for the year, with projections made on the basis of historical information and the best available market predictions, for both local and export sales. Market intelligence is required; communications by mail, telex and telephone will be necessary. Trends in prices must be carefully monitored, so that management may be in a position to maximise income by timely sales and operating dispositions.

In order to obtain the optimum number of days at sea, and maintain the boats in good working condition, adequate maintenance staff and facilities must be provided. A detailed maintenance programme for all equipment and machinery should be drawn up and strictly controlled. The necessary workshops, tools and vehicles must be provided, whether within the organization or through independent contractors. Boats must be drydocked at regular intervals; arrangements must be made to provide drydocking facilities which are available not only for routine work, but also for emergencies, e.g. loss of propeller.

The boats' crews will, initially, consist of both expatriate and Somali personnel. It is strongly recommended that they be paid on the basis of results; transfer to this type of payment from the present fixed salaries should be made as soon as sufficient experience has been gained to enable appropriate payment rates, which can be based on tonnage caught or can be, a percentage of the value of the catch, to be worked out. Replacement crews must be constantly available to cover illness, accidents and leave, so that boat days at sea shall not be lost for lack of crews.

Both shore-based and seagoing expatriate staff should at all time bear in mind their complementary objective of training Somalis. Gradual replacement of expatriates by Somalis, with consequent reduction in costs, should start in the second year of operations. Competitive salaries and incentives will have to be offered to retain trained Somali personnel.

The boats need fuel, lubricants, ice, water and food. All must be of good quality and available immediately. It is recommended that the operation be provided with tanks in which it can hold its own inventory of fuel which will thus be available for instant delivery to boats whenever required.

Spare parts and fishing gear must be available immediately and of good quality. Since a high proportion will be provided from overseas sources adequate stocks must be held in inventory in Somalia. Arrangements must be made to enable immediate purchases, both local and overseas, to cover emergency requirements. An adequate stock of replacement units, e.g. radios, echosounders, propellers, tailshafts, pumps and so on, must be provided. This enables a damaged unit to be immediately replaced; it can then be repaired ashore, without loss of boat days at sea.

An adequate system of warehousing and inventory control of all supplies, materials, spare parts, fishing gear and replacement units must be set up. Maximum and minimum stock levels must be established to enable timely purchasing. Great care must be taken to maintain stock in good condition and protect it from the effects of heat and humidity.

Good communications, both ship to ship and ship to shore, are essential. Contact should be made with the boats from the shore station several times each day. Coordination of maintenance may require the use of radios in workshops and vehicles.

Licences and permits should be obtained to permit effective and rapid operation. For example, an annual permit should be given by port authorities to allow boats to enter and leave port at any time and as many times as may be required, without having to request permission on each occasion. Arrangements must be made to provide adequate space in port alongside a jetty to permit boats to take fuel and stores and attend to maintenance.

The administration must be autonomous. Management will hire and dispense with personnel, both expatriate and Somali, and set terms and conditions of employment. Management will purchase the goods and services required for operations, and will sell the products. Management will make capital expenditures in accordance with the policies laid down by the entity to which it is responsible.

There must be provision of funds, such that management can pay for the goods and services purchased, whether locally or overseas, in a timely manner.

Management must ensure that a proper accounting is maintained. A monthly set of financial statements should be prepared and should include:

- Income statement
- Capital expenditures
- Balance sheet
- Cash statement
- Comparisons with budget

Annual financial statements must be audited by independent auditors, who are appointed by the policy-making entity. Cost information must be provided to enable management to make operating decisions.

An essential tool in effective management is the annual operating budget, which should be prepared on the basis of historical data, adjusted to allow for anticipated changes in income and expenses as a result of expected market, catch and cost variations. The budget should be prepared for approval by the policy-making entity, on a total annual basis. Once approved it should be spread on a monthly, cumulative basis. A monthly comparison of actual results to budget must be prepared and included in the monthly financial statements, together with an explanation of positive/negative variations of actual results in relation to budget. For management purposes, it is useful to calculate the effect of price and catch variations over/under the budget, also, break even points under different assumptions of catch and prices.

An annual capital expenditure budget must be prepared for approval by the policy-making entity. When approved it too should be spread on a monthly, cumulative basis. A monthly comparison of actual expenditures to budget should be included in the monthly financial statements, together with an explanation of positive/negative variations of actual expenditure in relation to budget.

An annual cash flow must be prepared and is chiefly derived from the annual operating and capital expenditure budgets. It will show monthly fluctuations in estimated requirements for funds, and thus is an essential tool in financial planning.

4. ORGANIZATION

4.1 Establishing the entity: Efficient operation of vessels is most likely to be achieved by an organization whose structure permits the maximum of rapid, independent action. It is very unlikely to be achieved by a ministry or other administrative body with ministerial restrictions and workstyles. To the extent that legal form can influence organizational behaviour, a corporate form is indicated, in which the corporate entity has both independence to act and responsibility for economic performance.

A company set up under the Civil Code with all shares owned by nominees of the Ministry is one possibility, an autonomous agency is the other. The theoretically clear distinction between autonomous agencies established by special law and state-owned companies established under Civil Code has been obscured by the tendency of law and practice to apply the same provisions to both categories. For example, the staff regulations for autonomous agencies contain the following provision: "These regulations shall apply to the permanent staff of all Autonomous Agencies with juridical personality except to personnel of Companies with joint participation of which the State is a shareholder". (Staff Regulations of Autonomous Agencies, Art. 48, Decree of the President of the Supreme Revolutionary Council No.74, 22 April 1972, amended by Law No. 17 of 21 April 1974 and Law No. 3 of 10 January 1975). This could mean that companies wholly owned by the state are subject to the regulations, and in the event, the regulations have even been extended to Somalfish, a "company with joint participation". Too much weight should not, therefore, be placed on fine distinctions in this area, but some differences remain significant (cf. Law on Finance of Public Enterprises and Agencies, No. 58 of 23 October 1972, which contains a similar ambiguity).

The autonomous agency is the usual form that state-owned corporations take, but all in all it seems the poorer choice to serve the objectives of independence and responsibility. In the first place, it is subject - expressly, not by inference - to the Staff Regulations of Autonomous Agencies, which provide for the grading of all posts and appointment to them by competitive examination, much as in the civil service. It must be said that the Law on Employment by State Organs and Private Entities (No. 66 of 29 October 1972) also provides for initial recruitment by examination, but it leaves greater flexibility in grading and assigning staff. Another law to which autonomous agencies are definitely - and companies perhaps - subject is the Law on Finance of Public Enterprises and Agencies, No. 58 of 31 July 1972, Article 19 of which provides for appointment of each agency's chief accountant by the Minister. This tends to undercut the authority of the chief executive. Finally, Law No. 56 of 14 September 1970 amends the Law Governing Autonomous Agencies and Audit of Industrial and Commercial Undertakings and Credit Institutions with State Participation (No. 16 of 1 April 1970) to abolish the boards of directors of autonomous agencies. This leaves the general manager as chief executive officer with no policy-making body besides the responsible Minister. This is very likely to confuse the executive and policy roles, with either the general manager taking on inappropriate policy functions or the Minister interfering in operations, and probably both of these.

The relative advantages of a company are slight but the interposition of a board of directors between the Minister and the chief executive is considered a sufficient difference to justify recommendation of the company form. The general practice of constituting state economic entities as autonomous agencies and the policy this expresses are appreciated. But the mission does not consider the autonomous agency without a board of directors to be a suitable form for a fishing enterprise. It should be noted that in establishing a company, shares will have to be held by two or more persons - perhaps consideration should be given to involving the Somali Development Bank as at least a nominal shareholder.

4.1.1 The role of Somalfish: Somalfish is registered as a company, and in fact it is the owner of the two 28-metre vessels and a potential operator of the 23-metre fleet. It is not, however, a legally appropriate entity for these responsibilities.

Somalfish was established in October 1974 by agreement between the then Ministry of Fisheries and Marine Transport on one hand and "Sovrybflot" representing the Ministry of Fisheries of the USSR, on the other. (The agreement was preceded by a Somali-Soviet Protocol on the same matter). Its shares were owned 51 percent by the Somali side and 49 percent by the Soviet. Somalis were a four-to-three majority on the Board of Directors, but five votes were required for the adoption of any resolution which in practice meant the minority partner had to agree to any action.

Somalfish operated a fleet of usually ten vessels at a time, five of which were to be owned by the Soviet partner and five by the Somali, acquired from the Soviet side on terms to be regulated by separate agreement. In fact, individual vessels were shifted in and out of the fleet frequently, so it is not certain how the Somali vessels were identified. In any case, when Soviet personnel left Somalia in 1977, they took all the vessels with them. In what might be seen as a settlement, Somalfish retained a cash balance apparently exceeding two million dollars. The agreement to form Somalfish specified a duration of five years, automatically renewable unless either party gave three months written notice of intention not to renew. There is no provision in the agreement or company's statute for tacit withdrawal. Nonetheless, the withdrawal of Soviet personnel and all vessels operated to destroy the basis of the agreement and to render impossible the main object of the company.

The consequence of this history should be the dissolution of Somalfish under Article 2442 of the Civil Code which provides that a joint stock company be dissolved for reasons including the impossibility of functioning and the continued inactivity of its assembly. A liquidator can be appointed by the court on motion of the remaining partner. It may well be possible through diplomatic channels to reach an agreement with Sovrybflot that the remaining assets be paid to the Somali side in consideration of the Soviet retention of the vessels. Failure to dissolve Somalfish, on the other hand, exposes Somalfish's management to personal liability for all operations undertaken following the event that should have led to dissolution, which is probably the Soviet departure in 1977. It also makes it impossible for Somalfish to take formal decisions, even to amend its existing statute, which is based squarely on the Somali-Soviet agreement and protocol.

Besides its operations with the 28-metre vessels, Somalfish conducts a small business of purchase and resale of dried fish. This it apparently does at a profit, although this seems largely due to the fact that cooperatives selling to Somalfish must bear the cost of transport to Mogadishu. Somalfish's other current activity is to collect the royalties paid by foreign vessels on their catches. The proceeds seem to be treated as Somalfish income. Somalfish also receives the foreign vessels' catch reports, which could be of great significance for fisheries management.

In the opinion of the mission, collection of royalties and compilation of the catch data which are gathered in connection with royalty payments are functions that belong to the Ministry of Fisheries and not to a commercial entity. The income involved derives from the exploitation of collective resources rather than from the operations of Somalfish; it can well be utilized in the fisheries sector, but not as the separate property of Somalfish. The latter treatment is especially dangerous if Somalfish should operate the Somali owned vessels: problems in those operations would be obscured by the favourable cash flow from royalties. This would diminish the chances of timely corrective action, if required.

It also seems unwise to pour essentially unearned income into a company that in a formal sense still has foreign partners. It is apparently unlikely that Sovrybflot would claim any share in liquidation, but the greater are Somalfish's assets, the more complicated liquidation becomes.

4.1.2. Company statute: The statute of the company would, of course, follow the general practice under the Civil Code. It is of the greatest importance, however, that it make a clear distinction between responsibilities for establishing policy and responsibilities for day-to-day management. The following points for inclusion in the company's statute reflect the recommended delimitation of policy and management functions:

Preliminary:

Name. Principal office.
Power to open other offices anywhere in Somalia and abroad.
Duration.

Objects and Powers:

Objects: The principal objects of the company shall be the production, purchase, sale, processing and storage of fish and other marine resources and the provision of goods and services in support of such activities whether conducted by itself or others.

Powers: The Company shall have the power to perform all acts and do all things which are necessary or convenient for the accomplishment of its objects, including to acquire, hold and dispose of movable and immovable property, to lend and borrow and to enter into contracts.

Capital and Shares:

Share capital. Founders. Issue and transfer of shares.

Board of Directors:

Appointment. General Manager. Meetings.

Functions: The Board of Directors shall be the highest policy-making authority. It shall establish general policies for the company and approve the budget and accounts and all capital expenditures in excess of So.Sh. 200 000.

General Manager:

Appointment.

Functions and Powers: The General Manager shall be the highest executive authority. He shall be responsible for day-to-day management within the policies established by the Board of Directors and shall report to the Board. He shall have the authority to determine the staffing position, to engage, discipline and dismiss all employees and to determine their remuneration and conditions of service; to make purchases and sales on behalf of the company; to sign in the name of the company subject to the Board's power to approve capital expenditures in excess of So.Sh.200 000, generally to perform all acts necessary or incidental to the proper conduct of the affairs of the company and the implementation of its policies as established by the Board of Directors.

Other points:

General Assembly. Accounts and audit. Final provisions.

4.2 Providing for management: Fishing is a 24-hour-a-day industry requiring a high degree of specialized knowledge and the smooth organisation of many functions. Initially, only an experienced operator can offer these. Somalfish possesses certain skills and if properly reorganized could contract for others, but its management experience has not prepared it to weld the different skills into a single operation. Furthermore, the past two years of relative inactivity have resulted in a workstyle that is far too leisurely to run a fishing operation. Even if Somalfish's legal status were regularized, it would not be a good candidate for manager. A new pattern is required, into which both Somali and expatriate staff can fit, and which will train Somalis both in specific skills and in the proper management of a modern industrial fishing enterprise.

There are at least two arrangements under which experienced management could be brought in to manage the vessels: a charter and a management contract. A charter contract could provide for Somalia to provide the vessels and working capital, and for the catch to go first to pay operating expenses, then in certain proportions to Somalia and the operator respectively. It is even possible that the operator, in return for a larger share of the catch, might be induced to provide some of the working capital, thus circumventing delays in approval of the necessary foreign currency expenditures. A charter along these lines has the potential advantages of basing management compensation on results from the very beginning and of overcoming the working capital bottleneck, which could otherwise be fatal to economic operation.

A management contract can - and should - also be based on performance, although establishing the basis is generally more difficult. It is not likely that a management contractor would advance significant amounts of working capital. On the other hand, a management contract is more familiar in this situation and may be preferred by both parties on that ground. The twin objectives of providing experienced, independent management and training of Somalis to take over the operation would be valid in both cases.

The terms of either a management contract or charter would have to be negotiated with prospective associates. The form and substance of agreement cannot be prescribed in advance but there are certain issues that are likely to require consideration regardless of how they are resolved. They are put in terms of a management contract in the following section, but they would be equally relevant to a charter agreement.

4.3 Management contract issues

4.3.1 Responsibility for management. The contract should specify whether the contractor has overall management responsibility, including personnel and financial management, and whether the contractor is legally liable for mismanagement.

4.3.2 Goods, services and manpower to be supplied. The number and kind of expatriate personnel and the nature of other goods and services to be provided should be stated.

4.3.3 Basis of compensation: The costs and fees to be paid and the basis for incentive payments should be clearly defined.

4.3.4 Lines of authority: The relationships among the management company, management staff and the Somali operator and its Board and other organs need to be spelled out.

4.3.5 Purchasing: Management responsibility for purchasing, sources of supply, including related-company dealings, price basis and commissions should be defined.

4.3.6 Marketing: This is likely to be a central and complex issue. There is a clear conflict of interest between the manager of a company and the buyer of its product; yet many organizations would only be interested in managing if they had access to the product. If there is a marketing agreement, it requires procedures for determining price, treating outside offers and development of the market for the period following the conclusion of contract management.

4.3.7 Technology-transfer, training and phasing out of expatriates: The nature of technology to be transferred, training and phase-out goals and whether to set a timetable for their achievement should be specified.

4.3.8 Assistance with local administration: The contract should specify any obligation of the Somali operator to obtain administrative action regarding taxation, immigration, customs clearance, etc.

4.3.9 Dispute settlement: A simple procedure for speedy, direct settlement of disputes will be useful.

4.3.10 Final clauses: The final clauses should specify the duration of the contract, provision for extension, termination and assignment, and procedures for arbitration and choice of law.

5. SUMMARY OF RECOMMENDATIONS

5.1 Deployment: Although all the variables involved in choosing an operating programme are not yet known, from the information available, the only possible commercial use of the vessels in Somalia is to operate them with mother ships. The three 23-metre vessels equipped with icemakers could with bigger winches, fish for deep-water lobster to be off-loaded to the two 28-metre vessels. The remaining six 23-metre vessels should be operated in conjunction with a chartered mother ship equipped to provide them with ice and receive their catch. They would target on finfish, for which the present winches appear adequate.

5.2 Immediate actions: A step that should be taken without delay is to identify potential parties to a management contract or similar arrangement and conclude an agreement. It will take several months at least to identify a management company and negotiate a suitable contract. In the meantime the following actions should be initiated immediately in order to make it possible for the boats to be operated by the time a management contract is concluded:

1. Inspect vessels and inventory equipment, spares and gear, including makes, models, and specifications; ensure that catalogues and manuals for all equipment are available.
2. Set up drydocking arrangements in, e.g. Djibouti, Mombasa.
3. Prepare detailed maintenance programme, which should include:
 - (a) provision of workshops
 - (b) tool supply
 - (c) maintenance programme for each piece of equipment
 - (d) inventory spares, gear and replacement units provided and order additional requirements.
4. Warehouse:
 - (a) set up physical facilities (building, shelving, climate control, etc), including gear store
 - (b) set up inventory system.
5. Communications:
 - (a) ensure availability of appropriate crystals for ship-to-shore and ship-to-ship (including 28-metre vessels)
 - (b) short-range radio communications ship/ship/shore/vehicles
6. Transportation: order vehicles
7. Office: provision of telex, telephone.

