



TOGETHER
for a sustainable future

OCCASION

This publication has been made available to the public on the occasion of the 50th anniversary of the United Nations Industrial Development Organisation.



TOGETHER
for a sustainable future

DISCLAIMER

This document has been produced without formal United Nations editing. The designations employed and the presentation of the material in this document do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations Industrial Development Organization (UNIDO) concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries, or its economic system or degree of development. Designations such as “developed”, “industrialized” and “developing” are intended for statistical convenience and do not necessarily express a judgment about the stage reached by a particular country or area in the development process. Mention of firm names or commercial products does not constitute an endorsement by UNIDO.

FAIR USE POLICY

Any part of this publication may be quoted and referenced for educational and research purposes without additional permission from UNIDO. However, those who make use of quoting and referencing this publication are requested to follow the Fair Use Policy of giving due credit to UNIDO.

CONTACT

Please contact publications@unido.org for further information concerning UNIDO publications.

For more information about UNIDO, please visit us at www.unido.org

UNITED NATIONS INDUSTRIAL DEVELOPMENT ORGANIZATION

Distr.
LIMITED
UNIDO/IS.645
21 July 1986
ENGLISH

**INDUSTRIAL DEVELOPMENT REVIEW
SERIES**

**PACIFIC ISLAND STATES:
SELECTED COUNTRIES**

**Papua New Guinea, Fiji,
Solomon Islands, Western Samoa,
Vanuatu, Tonga, Kiribati,
The Federated States of
Micronesia and Micro States**

**Prepared by the
Regional and Country Studies Branch**

This document has been reproduced without formal editing.

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

Mention of company names and commercial products does not imply the endorsement of the United Nations Industrial Development Organization (UNIDO).

The views and comments contained in this study do not necessarily reflect those of the Governments of the Pacific Island States nor do they officially commit UNIDO to any particular course of action.

Preface

This series of industrial development reviews on developing countries is prepared within the framework of UNIDO's Regional and Country Studies Branch. The reviews provide a survey and brief analyses of the respective country's industrial sector, as an information service to relevant sections within UNIDO and other international agencies as well as aid agencies in developed countries concerned with technical assistance to industry. It is expected that the reviews will prove a handy, useful information source also for policy-makers in the developing countries as well as for industrial entrepreneurs, financiers and economic researchers.

The reviews draw primarily on information available at UNIDO headquarters from national and international statistical publications. Since up-to-date national statistical data usually are not complete, it is evident that the reviews will need to be updated and supplemented periodically. In the present case, comparisons between various countries of the Pacific are complicated by the fact that national statistics often differ in their methodology. To supplement efforts underway in UNIDO to improve the data base and to monitor industrial progress and changes on a regular basis, it is hoped that the appropriate national authorities and institutions in the respective countries and other readers will provide UNIDO with relevant comments, suggestions and information. Such response will greatly assist UNIDO in updating the reviews.

The present Review was prepared on the basis of information available at UNIDO headquarters in early 1986. The countries in this regional review have been selected primarily on the basis of their membership of the South Pacific Bureau for Economic Co-operation (SPEC). It excludes French overseas territories and a few United States external territories in the Pacific region. The Review is divided into 10 chapters. Chapter sequence is based on the size of population. Chapter 1 presents a regional overview of industrial development in the Pacific region, with a focus on industrial base and investment opportunities. Chapters 2-8 attempt to review the process of industrial development in selected island States and deal respectively with:

- recent economic trends and economic structure;
- structure, performance and recent trends in the manufacturing sector;

- industrial development strategies, policies, plans and institutions;
and
- resources for industrial development.

In several cases, the information available did not permit a chapter structure as outlined above, and the information is necessarily of a more general nature. The ensuing chapters 9 and 10 provide some information on the Federated States of Micronesia and micro States respectively. Their inclusion was considered useful for the purpose of comparison. The Review also contains relevant basic indicators and graphical presentation of manufacturing trends as well as appendices that serve as a guide to investors.

It should be noted that the reviews are not official statements of intention or policy by Governments nor do they represent a comprehensive and in-depth assessment of the industrial development process in the countries concerned.

CONTENTS

	<u>Page</u>
Basic indicators	ix
1. REGIONAL OVERVIEW OF INDUSTRIAL DEVELOPMENT: WITH SPECIAL REFERENCE TO SELECTED PACIFIC ISLAND STATES	1
1.1 The challenge of development	2
1.2 Socio-economic and demographic features	3
1.3 The economies and their resource base	6
1.4 The industrial base	14
1.5 Policies and measures for industrial development	17
1.6 Special problems of micro States	20
1.7 Industrial investment opportunities	21
Appendix 1.A: Selected Pacific island States' membership in regional organizations, 1985	29
Appendix 1.B: List of activities undertaken by the CHOGRM Working Group on industry, 1981-85	30
Appendix 1.C: List of identified projects for feasibility studies and action plans, 1981-85	31
2. PAPUA NEW GUINEA	33
2.1 The economy of Papua New Guinea	34
2.2 Structure and performance of the manufacturing sector	41
2.3 Industrial development strategies, policies, plans and institutions	50
2.4 Resources for industrial development	53
Appendix 2.A: National Investors Scheme	59
Appendix 2.B: Industrial investment project proposals, 1984	64
Appendix 2.C: The technical co-operation projects of UNIDO	66
Appendix 2.D: Leading industrial companies, 1984	70
3. FIJI	71
3.1 The economy of Fiji	72
3.2 Structure and performance of the manufacturing sector	79
3.3 Industrial development strategies, policies, plans and institutions	86
3.4 Resources for industrial development	90
Appendix 3.A: Investing in Fiji	95
Appendix 3.B: Industrial investment project proposals, 1984	100
Appendix 3.C: The technical co-operation projects of UNIDO	102
Appendix 3.D: Leading industrial companies, 1984	104

	<u>Page</u>
4. SOLOMON ISLANDS	105
4.1 The economy of the Solomon Islands	106
4.2 Overview of the manufacturing sector	112
4.3 Industrial development strategies, policies, plans and institutions	113
4.4 Resources for industrial development	114
Appendix 4.A: Investing in the Solomon Islands	117
Appendix 4.B: Industrial investment project proposals, 1984	120
Appendix 4.C: The technical co-operation projects of UNIDO	121
Appendix 4.D: Leading industrial companies, 1984	123
5. WESTERN SAMOA	125
5.1 The economy of Western Samoa	126
5.2 Overview of the manufacturing sector	131
5.3 Industrial development strategies, policies, plans and institutions	133
5.4 Resources for industrial development	136
Appendix 5.A: Investing in Western Samoa	139
Appendix 5.B: Industrial investment project proposals, 1984	142
Appendix 5.C: The technical co-operation projects of UNIDO	143
Appendix 5.D: Leading industrial companies, 1984	144
6. VANUATU	145
6.1 The economy of Vanuatu	146
6.2 Structure and performance of the manufacturing sector	151
6.3 Industrial development strategies, policies, plans and institutions	155
6.4 Resources for industrial development	160
Appendix 6.A: Investing in Vanuatu	163
Appendix 6.B: Industrial investment project proposals, 1984	166
Appendix 6.C: The technical co-operation projects of UNIDO	167
7. TONGA	171
7.1 The economy of Tonga	172
7.2 Structure and performance of the manufacturing sector	177
7.3 Industrial development strategies, policies, plans and institutions	179
7.4 Resources for industrial development	182
Appendix 7.A: Investing in Tonga	184
Appendix 7.B: Industrial investment project proposals, 1984	187
Appendix 7.C: The technical co-operation projects	188

	<u>Page</u>
8. KIRIBATI	191
8.1 The economy of Kiribati	192
8.2 Industrial development strategies, policies, plans and institutions	195
8.3 Resources for industrial development	197
Appendix 8.A: Investing in Kiribati	199
Appendix 8.B: Industrial investment project proposals, 1984	202
Appendix 8.C: The technical co-operation projects of UNIDO	203
9. THE FEDERATED STATES OF MICRONESIA	205
10. PACIFIC ISLAND MICRO STATES: COOK ISLANDS, NAURU, NIUE AND TUVALU	211
10.1 Economic structure and recent economic trends	212
10.2 Industrial growth prospects in micro States	218
Selected References	220

LIST OF TABLES

	<u>Page</u>
Table 1.1. Area and population characteristics of selected Pacific island States, 1981	4
Table 1.2. GDP/GNP per capita, aid, trade balance and balance of payments, selected island States, 1983 and 1984	7
Table 1.3. Sectoral contribution to real GDP in selected Pacific island States, 1977-84 (selected years)	10
Table 1.4. Distribution of non-agricultural employment in selected Pacific island States, 1976-80 (selected years)	13
Table 1.5. Industrial projects presented and discussed at Investors' Forum for the South Pacific Region, 26-30 November 1984	24
Table 1.6. Country-wise list of companies interested in industrial projects in selected Pacific island States, January 1985	25
Table 2.1. Expenditure on gross domestic product, 1980-84	37
Table 2.2. Manufacturing value added, 1975-84	44
Table 2.3. Number of factories, number of persons employed and salaries and wages paid, by industry group, 1983	45
Table 2.4. Quarterly employment indices in selected manufacturing sub-sectors, 1981-83	47
Table 2.5. Output ratio in selected sub-sectors of manufacturing, 1978-80	48
Table 3.1. Distribution of GDP by sector of origin, 1970-84	74
Table 3.2. Central government budget, 1982-86	75
Table 3.3. Physical output indices, value added and employment in manufacturing, 1977-84	79
Table 3.4. Estimated gross output, intermediate consumption and value added of local industries, 1979-81	81
Table 3.5. Manufacturing performance indicators, 1979-81	82
Table 3.6. Projected sectoral rate of growth in terms of gross value added at factor cost, 1985-90	88
Table 4.1. Production of primary commodities, 1978-83	108
Table 4.2. Employment in the manufacturing sector, 1980	112

LIST OF TABLES (continued)		<u>Page</u>
Table 5.1.	Manufacturing statistics, 1983	131
Table 5.2.	Indicators of industrial output, 1979-84	132
Table 5.3.	Sectoral breakdown of Fifth Plan development expenditure, 1985-87	135
Table 5.4.	Summary of industrial development expenditure during the Fifth Plan, 1985-87	158
Table 6.1.	Structure of manufacturing employment and composition of MVA by branch of manufacturing, 1984	152
Table 6.2.	Structural change in manufacturing, 1980 and 1983	153
Table 6.3.	Development finance, 1983-86	154
Table 6.4.	Capital expenditure requirements of the First Plan, 1982-86	157
Table 7.1.	Distribution of GDP by sector of origin, 1980/81 - 1984/85	174
Table 7.2.	Growth trends in manufacturing activities, 1975-81	177
Table 7.3.	Number of manufacturing establishments in operation, 1975-80	178
Table 7.4.	Contribution of manufacturing sector to GDP by major branches of manufacturing, 1979/80 and 1983/84	179
Table 9.1.	Distribution of business establishments and employment, 1983	207
Table 9.2.	Government-sponsored industrial development programmes, 1984	208
Table 9.3.	Planned development allocations for commerce and industry, 1985-89	209
Table 10.1.	Employed persons by sector and kind of economic activity, 1985	215
Table 10.2.	Value of exports, 1982-85	216

EXPLANATORY NOTES

Dates divided by a slash (1984/85) indicate a crop year or a financial year. Dates divided by a hyphen (1984-85) indicate the full period, including the beginning and end years.

In tables:

Three dots (...) indicate that data are not available or are not separately reported; a dash (-) indicates that the amount is nil or negligible; a blank indicates that the item is not applicable; one dot (.) indicates that there is insufficient data from which to calculate the figure.

Totals may not add precisely because of rounding.

Basic indicators and graphical illustrations of manufacturing trends contained in this Review are based on data sourced from the UNIDO data base, international organizations and commercial sources.

The following abbreviations are used in this document:

ADB	Asian Development Bank
ADAB	Australian Development Assistance Bureau
Aus \$	Australian dollar
BDOs	Business Development Officers
CBI	Caribbean Basin Initiative
CFTC	Commonwealth Fund for Technical Co-operation
CHOGRM	Commonwealth Heads of Government Regional Meeting
EEZ	Exclusive Economic Zone
ESCAP	Economic and Social Commission for Asia and the Pacific
F\$	Fiji dollar
FDB	Development Bank of Fiji
GDP	gross domestic product
ha	hectare
IBRD	International Bank for Reconstruction and Development
IDU	Industrial Development Unit
ISIC	International Standard Industrial Classification
K	Kina
m	million
MVA	manufacturing value added
NIDA	National Investment Development Authority
NIS	National Investment Scheme
NPEP	National Public Expenditure Plan
NZ\$	New Zealand dollar
OPEC	Organization of Petroleum Exporting Countries
PIIDS	Pacific Islands Industrial Development Scheme
SI\$	Solomon Islands dollar
SITC	Standard International Trade Classification
SPARTECA	South Pacific Regional Trade and Economic Co-operation Agreement
SPEC	South Pacific Bureau for Economic Co-operation
SPC	South Pacific Commission
sq. km	square kilo metre
T\$	Tonga dollar
UNCLOS	United Nations Convention of the Law of the Sea
UNCTAD	United Nations Conference on Trade and Development
US\$	United States dollar
VA	value added
WS\$	Western Samoa dollar
WSTEC	Western Samoa Trust Estates Corporation

BASIC INDICATORS 1
Inter-country comparison of selected economic indicators

Indicator	Year	Unit	Papua New Guinea	Fiji	Solomon Islands	Western Samoa	Vanuatu	Tonga	Kiribati
Population	Mid-1984	'000 persons	3,400	686	260	159	127	99	64
Population density	Mid-1984	Persons per sq. km	7	38	9	54	11	142	92
GDP	1983	Millions of US\$	2,510	1,200	160	100	...	88	29
GMP per head	1983	US\$	780	1,790	640	635	357 ^{a/}	904	478 ^{b/}
Structure of production	Selected years	Per cent of GDP	(Year 1980)	(Year 1984)		(Year 1984)		(Year 1984/85)	(Year 1977)
Agriculture		Per cent	33.7	24.3	...	51.7	...	40.5	19.7
Mining and quarrying		Per cent	13.2	0.1	...	...	...	...	45.3
Manufacturing		Per cent	9.5	12.3	...	6.5	...	9.1	1.9
Construction		Per cent	3.6	6.0	...	6.7	...	3.9	8.4
Other		Per cent	40.0	57.6	...	35.0	...	46.6	2.7
Labour force	1983	million persons	1.7	0.2	0.098	0.053	0.050	0.034	0.022
Employment by sector	Early 1980s	Per cent							
Agriculture		Per cent	57	44	33	61	75	51	7
Mining		Per cent	1	1	...	...	...	...	5
Manufacturing		Per cent	3	7	25	4	...	2	3
Construction		Per cent	5	6	25	5	...	6	15
Trade		Per cent	5	10	11	0	...	4	14
Transport		Per cent	3	5	...	5	...	4	10
Finance		Per cent	12	2	...	...	...	...	...
Services		Per cent	4	17	31	18	...	22	43
Consumer price inflation	1980	Per cent	12.1	14.5	15.9	33.0	11.7	22.4	17.0
	1981	Per cent	8.0	11.2	14.6	20.5	27.5	14.9	...
	1982	Per cent	5.5	7.0	9.7	18.3	6.1	10.8	...
	1983	Per cent	7.9	6.7	7.4	16.4	1.7	9.3	...
	1984	Per cent	7.5	5.3	12.0	11.9	5.5	...	...
	1985	Per cent	4.0	3.5	...	...	...	...	...
Exchange rate		Local currency equivalents to US\$ 1	Kina	F\$	S\$	WS\$(tala)	Vatu	T\$	US\$ per Aus\$
	1980		0.67 ^{c/}	0.791	0.830	0.919	68.29	0.90	1.139
	1981		0.673	0.877	0.870	1.036	87.83	0.88	1.149
	1982		0.738	0.947	0.971	1.205	96.21	0.98	1.017
	1983		0.836	1.046	1.149	1.539	99.37	0.89	0.902
	1984		0.899	1.143	1.274	1.838	99.23	1.20	0.879
	1985		1.007	1.167	1.450	2.267	107.40	1.46	1.42 ^{d/}

a/ Ni-Vanuatu population only.

b/ 1982 data.

c/ June 1985.

BASIC INDICATORS 2
Inter-country comparison of resources

	Year	Unit	Papua New Guinea	Fiji	Solomon Islands	Western Samoa	Vanuatu	Tonga	Kiribati
Land area		sq. km	462,840	18,272	28,530	2,935	11,880	699	690
Sea area ^{a/}		'000 sq. km	3,120	1,290	1,340	120	680	700	3,550
Number of islands		Main plus small islands	4 + 600	2 + 300	6	5	78	2 + 169	33
Agricultural production	1984	'000 metric tons							
Total cereals			3	23	7				
Root crops			1,157	130	89	42	30	92	13
Total pulses			2	2	2				
Oil crops			217	32	53	26	40	8	11
Total meat			50	9	2	3	6	2	...
Milk			...	21	1	1	2		
Livestock	1984	'000 (number)							
Cattle			134	157	23	26	100	11	...
Sheep			2	...			8	17	...
Goats			16	56			71	101	10
Pigs			1,460	28	48	61			
Fishery production	1983	'000 metric tons							
Marine fish			33 (1975)	25	47	4	2	2	21
Shell fish			1	4	...	...	...		3
Forestry production	1983	'000 cubic metres							
Fuelwood and charcoal			5,533	14	210	70	24		
Industrial roundwood			1,377	210	102	61	14	3	...
Sawnwood and panels			143	104	19	21	4	1	...
Major commodities (production)	1984	'000 metric tons	Bananas (980), coffee, green (57), fruits (138), sweet potatoes (464), coco- nuts (782), vege- tables (159), green corn (108), palm oil (96)	Sugar cane (3,900), coco- nuts (234), cassava (96)	Coconuts (255), sweet potatoes (49), taro (20), yams (19), palm oil (18)	Coconuts (200), taro (37), bananas (22), cocoa, copra	Coconuts (306), roots (30), vegetables (7), cocoa beans (3), ground nuts (2)	Coconuts (56), sweet potatoes (17), cassava (11), vegetables (5)	Coconuts (90), copra (7), bananas (4)
Minerals	1984		Copper (164,300 t), gold (15,673 kg), silver (44.4 t)	Gold (1,509 kg), silver (473 kg)	Variety of deposits, dis- covery of bauxite warrants commercial exploitation	None	Manganese ore (10,100 t) in 1978	Sane sand and precious coral coral	Phosphate reserves exhausted in 1979, salt production

a/ Unofficial estimates based on 200-mile exclusive economic zones made by the South Pacific Commission.

BASIC INDICATORS 3
Inter-country comparison of foreign trade, aid and debt indicators

Indicator	Year	Unit	Papua New Guinea	Fiji	Solomon Islands	Western Samoa	Vanuatu	Tonga	Kiribati
Exports	1985	millions	US\$ 816	US\$ 193	US\$ 92 ^{a/}	US\$ 19.4 ^{a/}	US\$ 43.3 ^{b/}	T\$ 6.5 ^{c/}	Aus\$ 13.0
Principal export items	1984	millions of local currency	(Kina) Gold (185.2), copper (134.2), coffee (110.7), coconut products (81.7), cocoa (67.0), palm oil (75.7)	₤ Sugar (110.0), gold (20.5), coconut (18.5), fishery products (14.2)	₤ Copra (32.2), fishery products (28.8), logs (25.1), palm oil (17.1)	₤ Coconut oil (20.8), coco- nut cream (1.6), taro (4.2), cocoa (7.4)	₤ Copra (4,300), beef (2,600), cocoa (1,000)	₤ Coconut oil (6.4), vanilla (2.1), desic- cated coco- nut (0.6), manufactures (0.8)	₤ Fishery products (2.3), copra (7.0), knitted clothing, sporting equipment and handi- crafts (3.7)
Imports	1985	millions	US\$ 856	US\$ 400	US\$ 79 ^{a/}	US\$ 50.8 ^{a/}	US\$ 66.8 ^{b/}	T\$ 41.7	Aus\$ 13.0
Major components of merchandise imports	1984	Percentage share							
Food and related products			18	15	16	21 ^{d/}	21 ^{e/}	24 ^{d/}	23
Beverages and tobacco			1	1	4	3 ^{d/}	5 ^{e/}	6 ^{d/}	5
Mineral fuels			18	22	23	18 ^{d/}	10 ^{e/}	16 ^{d/}	9
Manufactures			32	38	30	35 ^{d/}	38 ^{e/}	33 ^{d/}	24
Machinery and transport			28	18	24	21 ^{d/}	22 ^{e/}	16 ^{d/}	37
Balance of payments (current account)	1984	millions	US\$ -367	US\$ -26.9	US\$ 5	US\$ 0.5	...	T\$ -1.7 ^{d/}	...
Net overseas aid ^{f/}	1983	millions of US\$	332.8	32.8	27.5	26.8	27.0	18.0	16.8
Total external debt	1984	millions	US\$ 1,000	US\$ 317.5	US\$ 20.4 ^{d/}	US\$ 60.5 ^{d/}	US\$ 4.9 ^{d/}	T\$ 23.7 ^{d/}	...
Debt service ratio (debt service/exports)	1983	Per cent	11.0	7.3	0.3	18.3	0.8 (as per cent of GMP)	...	...

^{a/} 1984. ^{b/} For 1984. Including re-exports.
^{c/} Imports cleared for home consumption only.

^{d/} For 1983. Including re-exports. ^{e/} 1983.
^{f/} From members of DAC, multilateral organizations, bilateral sources and OPEC.

BASIC INDICATORS 4
Inter-country comparison of manufacturing indicators

Indicator	Year	Unit	Papua New Guinea	Fiji	Solomon Islands	Western Samoa	Vanuatu	Tonga	Kiribati
GVA	Selected years	Millions of local currency	K 223 (1983)	F\$ 91 (1984)	...	...	Vatu 612 (1983)	T\$ 3.6 (1981)	...
Employment in manufacturing	Selected years	Number of persons	22,186 (1983)	41,040 (1984)	1,832 (1982)	1,060 (1985)	875 (1984)	1,700 (1983)	721 (1984)
Value of manufactured exports^{a/}	Selected years	Millions of US\$	14.3 (1979)	12.5 (1982)	.	0.2 (1981)	0.1 (1982)	0.5 (1982)	0.007 (1979)
Share of manufactured exports^{a/} in total exports	Selected years	Per cent	1.63	8.05	.	2.08	1.05	12.81	0.03
Of which									
Chemical products		Per cent	0.04	1.52	.	0.60	0.00	0.11	0.00
Machinery and equipment		Per cent	0.00	1.92	.	0.22	0.00	0.00	0.00
Other manufactures		Per cent	1.59	4.61	.	1.26	1.05	12.70	0.03
Value of manufactured imports^{a/}	Selected years	Millions of US\$	244.8 (1976)	219.6 (1982)	48.3 (1980)	39.6 (1981)	25.7 (1982)	19.9 (1982)	7.1 (1979)
Share of manufactured imports^{a/} in total imports	Selected years	Per cent	56.2	45.2	68.6	58.1	54.3	48.9	41.2
Of which									
Chemical products		Per cent	5.5	7.3	5.2	5.6	7.6	6.5	5.7
Machinery and equipment		Per cent	31.5	15.2	39.2	34.4	16.2	14.6	16.7
Other manufactures			19.2	22.7	24.2	18.1	30.5	27.8	18.8

a/ SITC 3-8 less (67 + 68).

1

**REGIONAL OVERVIEW OF INDUSTRIAL DEVELOPMENT:
WITH SPECIAL REFERENCE TO SELECTED PACIFIC ISLAND STATES**

1. REGIONAL OVERVIEW OF INDUSTRIAL DEVELOPMENT: WITH SPECIAL REFERENCE TO SELECTED PACIFIC ISLAND STATES

1.1 The challenge of development

In the last four decades there has been a variety of approaches within the Pacific island economies for promoting economic development. The diversity arises from the various countries' unique resource endowments. The number of States achieving independence has increased and each State has reasserted its distinctiveness in tackling a range of development problems and constraints in order to meet the aspirations of the island peoples.

Generally, industrial activity has often played only a minor role in the development of the island economies of the Pacific region. However, increasing interest in the expansion of industrial activities can be noted. According to most development plans, industrial development is to be integrated with that of the other sectors. Thus, the exploitation of natural resources is to strengthen forward and backward linkages. The utilization of their natural resources will require the development of organizational and productive skills in the concerned countries.

In the context of industrial development strategies of the South Pacific islands three issues generally arise: the need to diversify economic activities, the need to generate additional employment, and the desire to increase self-reliance and reduce the islands' dependence on external factors and influences.

Diversifying the economic structure of the island economies means departing from the earlier patterns of development in which the economy depended almost entirely on the primary sector and on exploitation of a small range of resources and economic opportunities. The generation of additional employment opportunities has been recognized increasingly as a means for achieving a wider distribution of the benefits of economic development through increased wage-earning opportunities and of greater participation by local people in the monetized sector. The desire for increased self-reliance and reduced economic dependence has followed largely from the attainment of political independence for many of the island States. The realization of the

adverse consequences of the colonial pattern of externally oriented development and the increasing import dependence of many island communities have motivated concerted attempts to assert the islanders' control over the pattern and processes of development and to give priority to domestic production to meet local requirements wherever possible.

1.2 Socio-economic and demographic features

The Pacific region encompasses more than 1,000 islands which make up some twenty political units, of which nine are fully independent, two are largely self-governing, seven are dependencies, and the remainder are trust territories which have recently attained greater autonomy.

Three subregional groups of islands are usually distinguished: first Micronesian islands of the Trust Territory of the Pacific Islands and Kiribati to the northwest; second Melanesian islands of Papua New Guinea, Solomon Islands, Vanuatu, New Caledonia and Fiji to the southwest; and third Polynesian Islands of Tuvalu, Tonga, Western Samoa, Tokelau, Niue, Cook Islands and French Polynesia to the southeast. Seven of the Pacific island States should be properly considered as micro States on account of their very small size and populations of less than 25,000. A further ten States have populations exceeding 100,000. The largest State in the region is Papua New Guinea with a population exceeding three million (some 60 per cent of the region's total); only two other States, Fiji and the Solomon Islands, have populations exceeding 200,000. Table 1.1 presents basic information on area and population characteristics of selected Pacific island States.

While the Pacific islands encompass a variety of environments and a wide range of natural resources, almost all share the characteristics of small size and isolation. This isolation is apparent at a number of levels. The islands, except Papua New Guinea, are remote from the major industrialized and developing economies of the Pacific Region so that their trade links are extended and costly to maintain; inevitably their channels of communication are both limited and focused on a very small number of contact points for historical reasons. The majority of the islands lie far from the major trans-Pacific routes; only Fiji enjoys the advantage of being a staging post, particularly for air transport. Most Pacific islands are either overflown or

Table 1.1. Area and population characteristics of selected Pacific island States, 1981

Name/size grouping	Land area (sq. km)	Sea area ('000 sq. km)	Number of islands	Population (mid-1981)	Population density (per sq. km)	Urban Population (per cent)	Infant mortality (per 1,000)	Life expectancy
Papua New Guinea	462,840	3,120	4 + 600	3,081,000	6.6	13	125	49
<u>10,000 - 30,000 sq. km</u>								
Solomon Islands	28,530	1,340	6+	236,000	8.4	9	46	54
New Caledonia	19,103	1,740	1+	143,000	7.5	61	25	64
Fiji	18,277	1,290	2 + 300	646,000	36	39	46	62
Vanuatu	11,080	680	78	121,000	10.1	...	...	...
<u>500 - 4,000 sq. km</u>								
French Polynesia	3,265	5,030	130	150,000	37.5	59	68	61
Western Samoa	2,935	120	5	157,000	53	21	36	62
Trust Territories	1,833	6,200	1,152	123,000	68	46	59	61
Kiribati	690	3,550	33	58,700	83	36	87	52
Tonga	699	700	2 + 169	95,000	146	26	60	58
Guam	541	...	1	110,000	203	91	22	76
<u>MICRO ISLAND STATES</u>								
Niue	259	390	1	3,700	14	21	33	62
Wallis and Futuna	255	300	2	11,000	43	...	...	...
Cook Islands	240	1,830	15	17,400	75	27	33	61
American Samoa	197	390	1 + 6	33,000	167	43	20	67
Morfolk Island	36	400	1	1,900	53	100	...	...
Tuvalu	26	900	9	8,000	307	30	42	59
Nauru	21	320	1	7,300	333	100	...	...
Tokelau	10	290	3	2,000	200	...	...	...

Sources: Asian Development Bank, Key Indicators of Developing Member Countries, 1984; Official National Statistics, various publications.

by-passed by the major transport systems. The islands are so widely distributed that they are separated from each other by vast distances, making regional co-operation difficult. Within many of the island countries, especially the archipalegic states, the majority of islands which constitute the periphery are themselves remote from the centre of their political grouping, so that most countries are themselves fragmented into distinct island communities with strong movements towards greater provincial autonomy. Such characteristics add greatly to the difficulties of Government and of administration, while high internal transport costs detract from the cohesiveness of the domestic market, and constrain access to export markets both regional and extra-regional.

Most of the independent and self-governing island States maintain strong commercial and cultural links with Australia and New Zealand. Papua New Guinea and much of Melanesia tend to co-operate with Australia; some smaller islands are part of the Australian monetary system. The Polynesian islands to the east seek assistance from New Zealand. Australia and New Zealand therefore play a major role in the development of the island countries. The Pacific Islands are important markets for produce of Australia and New Zealand. The countries have a significant stake in the trading and distribution sectors of the island States, as sources of tourist income and entrepreneurs and joint venture partners for island businesses and industries. Expatriates from Australia and New Zealand play major roles in decision-making in public and private sectors in the islands. Australia and New Zealand also receive large numbers of emigrating islanders, particularly from the micro States, who look for work in their major urban centres. Co-operation and commodity exchanges among countries in the region are relatively insignificant.

Conflicts of interest between the island countries and their dependent neighbours may arise, as for example has been the case with tuna fishing and fish processing where access to the USA market tends to be a key factor in many fisheries development programmes. The linkages to different major economies have tended to hinder or fragment attempts at regional co-operation at political and economic levels. Moreover, many islands' development initiatives are influenced by and supported through bilateral technical and financial support and aid transfers.

1.3 The economies and their resource base

With the exception of Papua New Guinea and Fiji, the majority of the islands possess a narrow range and limited quantities of natural land resources so that they lack strong base, in terms of diversity or quantity of available raw materials, for industrial development. In addition, readily available energy resources are very limited; the majority of the islands rely on imported hydrocarbons; there is, however, a renewable energy potential which remains underexploited in many cases.

The heavy dependence on primary commodity exports has made the Pacific island countries vulnerable to unpredictable fluctuations in overseas demand and world market prices; in addition cyclones have regularly destroyed large parts of major export crops like sugar cane and coconuts.

The relatively better performance of the Pacific island economies during 1984 was largely attributed to high export demand for primary commodities which stemmed from the recovery in developed market economy countries. In many island economies export earnings increased substantially with the rise in prices of several commodities. The prospects for the majority of the commodities appear to be gloomy in 1986. For Papua New Guinea and Fiji, the price of gold is crucial. With higher volume of output Papua New Guinea is expected to counterbalance the low level of copper prices. The price of sugar remains weak on the world market, the price of palm oil is tending to fall by 15 per cent in 1986. Falling prices of copra and derivatives are expected to affect many Pacific island economies, particularly Solomon Islands and Vanuatu. An improvement in the cocoa price in 1986 seems to augur well for a few island economies in the Pacific region. Seen over a long period, export earnings in the regions are virtually stagnant, and as most countries depend heavily on energy and food imports, trade deficits in the region have grown considerably. Foreign aid in many cases is essential to balance national accounts.

Although opportunities for manufacturing and processing which would make the island countries less dependent on primary commodity exports, are limited, the resource base of the islands does offer opportunities. Also, the range of technologies and scales of production which are appropriate to this particular environment is growing.

Table 1.2. GDP/GNP per capita, aid, trade balance and balance of payments, selected island States, 1983 and 1984

Island State	GDP/GNP (1983)		Net overseas aid ^{a/} (1983)		Trade balance	Current accounts balance (1984)
	Total (millions of US dollars)	Per capita (US dollars)	Total (millions of US dollars)	Per head (US dollars)	(millions of local currencies)	
Cook Islands	20	1,360	9.3	534	...	...
Fiji	1,200	1,790	32.8	49	F\$-173.7	F\$-27.6
Guam	478 ^{b/}	4,223 ^{b/}	73.5 ^{c/}	693 ^{c/}	...	...
Kiribati	29 ^{d/}	47 ^{d/}	16.8	265	A\$-7.0	A\$10.4
Niue	3 ^{e/}	1,080 ^{e/}	5.6	1,088	...	...
Papua New Guinea	2,510	780	332.8	104	K-4.5	K-290
Western Samoa	100	635	26.8	170	WS\$-47.0	WS\$0.9
Solomon Islands	160	640	27.5	109	SI\$33.0	SI\$6.8
Tonga	88	904	18.0	138	T\$-28.0 ^{g/}	T\$-1.7 ^{g/}
Trust Territory of Pacific islands	130 ^{f/}	1,030 ^{f/}	134.0	893	...	...
Tuvalu	3	431	4.2	500	...	...
Vanuatu	...	356 ^{h/}	27.0	218	...	...

Source: ESCAP, Economic and Social Survey of Asia and the Pacific 1985, Bangkok, 1986.

a/ From member countries of DAC, multilateral organizations, OPEC and bilateral sources.

b/ Declared taxable income for 1983.

c/ 1980 only.

d/ 1982 data.

e/ Fiscal year ending June 1983.

f/ GNP estimates for 1982.

g/ Ni-Vanuatu population only.

Economic development needs to take the generally very limited carrying capacity of the natural environment of the island countries into account. Nauru is an example of an economy now relying completely on a single resource (phosphate) which will be exhausted by the early 1990s. Nauru can presumably finance a complete shift in economic activities with the financial reserves accumulated through phosphate exports - this option is however not available to other island economies. On Kiribati, phosphate reserves are already exhausted, and copra and fish exports are now the main sources of foreign exchange. Reserve funds accumulated during the phosphate mining period will presumably be used for further development and diversification of the economy.

The smaller islands, particularly the atolls and raised atolls, have very limited areas of agricultural land. Their soils have limited potential, consisting mainly of sand, shells and coral fragments. Consequently these islands have only a specialized form of subsistence agriculture with a restricted range of crops (coconut, pandanus, taro, arrowroot, bananas and bread fruit) and no animal husbandry. Rainfall pattern and water storage difficulties make for an uncertain supply of fresh water. Micronesia is largely made up of such islands. On the higher islands of volcanic origin a wider range of crops can be grown including sweet potatoes, yams and some vegetables, but the soils are susceptible to leaching out of essential nutrients and erosion is likely on cultivated steeper slopes. More fertile soils are to be found in valleys and on coastal plains, and there the population is concentrated and pursues its traditional subsistence cultivation. Tonga and Western Samoa are two such islands with well-watered fertile soils. Yet these islands are presently not self-sufficient in food production.

The development of agricultural production has been constrained by the predominant traditional system of subsistence cultivating and land tenure. Progress has been made with the development of traditional cash crops, chiefly bananas, copra, cocoa, fruits and vegetables, some of which are exported, but there has been little change in customary cultivation practices and output fluctuates markedly.

The Cook Islands and Tonga have been able to export some fresh produce to take advantage of special market arrangements to New Zealand but there are few

regular surpluses suitable for preservation or processing. Fiji has succeeded in producing large quantities of cash crops, especially sugar, which for historical and cultural reasons has come to assume a dominating position in the economy and its export sector.

On the larger islands, the climate, varied topography, and fertile soils combine to give much greater agricultural potential. Even on these islands, however, much of the land area is not suitable for agriculture; these proportions are 75 per cent in Papua New Guinea, 70 per cent in Tonga, 50 per cent in Western Samoa and 38 per cent in Fiji. Nevertheless there exists considerable potential for increased output and self-reliance in food production in the long term. With the exception of Fiji, subsistence cultivation predominates. Some cash crops are widely grown, notably copra, bananas, cocoa, fruits and vegetables. In Papua New Guinea, Solomon Islands, Vanuatu and Western Samoa there has been some development of plantation crops including copra, bananas, cocoa and coffee. The production of commercial crops on small-holder or plantation systems gives rise to local refining or processing activities which are normally carried out on a small scale.

Despite the limitations of the agricultural sector in the Pacific islands, its contribution to GDP is relatively high, as can be seen in Table 1.3. Only in the case of two countries, Kiribati and Nauru, where the exploitation of mineral deposits predominates, is agriculture not the largest source of GDP. However, as stated above, phosphate resources in Kiribati are now almost exhausted. Papua New Guinea possesses substantial mineral resources of which copper and gold are already being mined on a large scale through 'enclave type' projects. These large-scale projects are heavily dependent on external resources, including technology, managerial and production skills, capital equipment and investment funds. They are entirely oriented towards major international markets and are relatively weakly integrated with the local economy. Their major economic impact has been through construction activity during the development phase but they have stimulated few related secondary activities. Elsewhere in the region mineral deposits have been located in the Solomon Islands, Vanuatu and Fiji, but commercial development has rarely been possible on any major scale.

Each of the larger islands in the region possesses some forest resources. These are greatest in Melanesia where the climax vegetation is

tropical hardwood forest; substantial commercial reserves exist in Papua New Guinea and the Solomon Islands. Vanuatu, Fiji, Tonga and Western Samoa all have more limited forest resources but these are now being managed more carefully with replanting programmes (in the case of Fiji with the introduction of quick-growing softwoods) in order to achieve a greater measure of self-reliance in wood and wood products. In Papua New Guinea and the Solomon Islands extensive logging of well-known species takes place. There is also considerable potential for exploiting lesser known species, provided export markets can be persuaded as to their value. While both countries still export logs, there is some movement towards the preparation of sawn timber and the manufacture of wood products; the former provides significant opportunities for smaller processing operations. This can contribute towards increasing the local generation of value added and employment. Such industrial activities are well suited to the islands economies, their low skill and technology requirements making for 'ease of entry' by local entrepreneurs. Elsewhere in the region the smaller islands have no timber resources other than coconut stems; however the development of appropriate production technologies has allowed the establishment of small-scale processing plants in some localities where there is sufficient demand for wood products.

Table 1.3. Sectoral contribution to real GDP in selected Pacific island States, 1977-84 (selected years)
(percentage)

Country	Agriculture	Mining and Quarrying	Manufacturing	Construction	Other
Papua New Guinea (1980)	33.7	13.2	9.5	3.6	40.0
Fiji (1984)	24.3	0.1	12.3	6.0	57.6
Western Samoa (1978)	51.7	...	2.8	6.7	38.8
Tonga (1983)	41.5	0.5	5.0	3.9	49.1
Kiribati (1977)	19.7	45.3	1.9	8.4	24.7

Source: Official National Statistics.

Prospects for the development of marine resources are also considerable, in particular following UNCLOS III (the United Nations Convention of the Law of the Sea). The principle of jurisdiction over coastal waters up to a limit of 200 miles (EEZ), which is now generally recognized by many countries,^{1/} provides island economies with a very significant extension of their natural resource base. Recently Kiribati signed an agreement allowing the Russians to fish in its waters. New negotiations towards permitting other countries to fish in the island States' waters are under way. The islands are asking for proper compensation for fishing rights. For all the smaller islands and many of the larger ones, the sea has long been used as supplementary source of food. The contribution of fish to exports or domestic value added however is in most cases very modest, and fishery resources of the region as a whole remain underexploited. Fishing is carried out within the lagoons and offshore on an 'artisan' basis, with well-developed customs governing rights and the sharing of the work involved as well as the catch. In the larger islands such as Papua New Guinea, Solomon Islands and Vanuatu attempts are being made to organize these coastal fisheries with the construction of facilities for storage, processing and better distribution. In some islands inshore fishery resources have been overexploited and a more balanced programme of development to exploit offshore pelagic species is required. Thus far there has been relatively little processing of fish in the islands; much is exported frozen and only tuna is processed for export in the Solomon Islands and American Samoa. The key to increased processing is market access, especially to Japan and the USA, but as unprocessed tuna enjoys preferential access over canned tuna, the majority is canned in the USA or Japan. The main difficulty with fisheries development programmes is the scale of investment and organization required to support even a modest processing facility and the need to ensure access to distant markets. In most cases joint ventures are necessary to provide the required external inputs and such projects tend to have few direct linkages with the local economy.

Throughout the Pacific there is an abundance of opportunities for novel industrial projects based on marine resources in the following areas:

- exploiting the potential for mariculture/aquaculture development;
- improving commercial seafood processing and distribution;

^{1/} The Law of the Sea Treaty, however, is not yet international law and will only become so when 60 countries ratify it. So far only 26 countries have signed the Treaty.

- promoting fishery gear/technology improvement and development;
- strengthening co-operatives for boat building/repair facilities;
- introducing industrial uses of marine plants for pharmaceutical and chemical production;
- promoting utilization of fish skin (particularly shark and eel) for leather industry development as a by-product of fish processing;
- promoting cottage industry production using local materials such as shell buttons, ornamental uses, etc.; and
- enhancing coral reef exploitation, management and environmental protection for construction industries.

International co-operation and national action for enhanced utilization of marine resources for industrial development may usefully be initiated in the above areas and followed up by multilateral and bilateral technical assistance and investment co-operation.

Other marine resources with long-term development potential include hydrocarbons, manganese nodules, phosphate and heavy mineral deposits in drowned shore lines. In most cases the exploitation of such resources is at the limits of current mining technologies and is normally beyond the financial and development capabilities of almost all the islands unless there is major participation by external interests. While these areas are ecologically fragile and the possibly high environmental costs of seabed exploitation should be kept in mind, it is worthwhile to examine the extent to which seabed industries can stimulate forward and backward linkages and demand in the island economies. Such activities tend to foster supporting tertiary activities in the islands. Moreover, there is need for improving development techniques for surveying and assessing marine resources in EEZs and for the development of alternative ocean-based energy sources.

Finally, mention must be made of the human potential (see Table 1.4). In some of the island countries, such as Papua New Guinea and the Solomon Islands, a significant proportion of the population remains largely outside the monetized sector, but with the drift towards the urban centres, especially in the small States, the share of wage labour has grown substantially. However migration in search of work is a characteristic of almost all island communities, with some smaller islands having their overall population growth restrained by long-distance migration to the industrialized countries of the Pacific Rim. Virtually all island countries are short of skilled manpower,

Table 1.4. Distribution of non-agricultural employment in selected Pacific island States, 1976-80 (selected years)
(percentage)

Country	Mining	Manufacturing and Utilities	Construction	Transport	Trade	Finance	Government Services	Other	Total ('000)
Papua New Guinea (1976)	4.3	10.9	7.1	7.9	22.3	...	45.3	...	167.4
Fiji (1980)	1.2	21.5	11.7	10.3	17.8	5.7	31.8	...	76.8
Solomon Islands (1979)	6.2	14.4	11.5	11.0	14.3	1.4	45.4	...	12.9
Western Samoa (1976)	...	7.9	12.2	13.8	16.2	2.2	47.7	...	14.9
Vanuatu (1976)	...	3.8	6.3	5.0	18.8	3.8	50.0	12.5	8.4

Source: Official National Statistics.

especially technical and managerial personnel with practical experience. Annual output from the regions' training institutions is relatively small and there have been significant losses through emigration, high dropout rates, and inadequate incentives to acquire key skills. At the same time the continued reliance on expatriates limits the extent to which islanders can fill policy and decision-making posts. Minimum wage legislation often leads to high wage levels, which maintains the distinctions between urban and rural working conditions and deters entrepreneurs from establishing secondary activities. Tertiary activities in services, transport or construction are much preferred by local investors largely because of greater certainty of demand. At the same time population growth rates and increasing unemployment in the main urban centres have created almost irresistible pressure for employment creation particularly in some of the smaller States. A number of island Governments have been looking to secondary economic activities to meet this pressing need. This has occurred at the same time as planners have been seeking a more balanced pattern of development with greater forward and backward linkages within the island economies, and as Governments have sought to restrain the islands' propensity to import as well as to diversify their export capabilities.

1.4 The industrial base

While few of the Pacific islands have a well diversified resource base for industrial development, most of the larger islands have seen the growth of an industrial sector in response to the availability of resources, and domestic markets. Furthermore most Governments are now actively seeking to accelerate the pace of industrial growth so as to achieve a more balanced and integrated pattern of development in the island economies. Thus far however, throughout the islands the size of manufacturing activity has been very small in both absolute and relative terms. Table 1.3 provides some perspective on the contribution of manufacturing to GDP; only in Papua New Guinea and Fiji is this of some significance. In employment terms manufacturing accounts for only a small proportion of the work force, within the monetized sector. Total employment in manufacturing within the Pacific region was estimated at 37,000 in the late 1970s. The overwhelming majority of employment is in small- or medium-scale enterprises but generally speaking there is little 'informal'

activity in the island economies. It appears that in the early 1980s around 1,000 persons were employed in manufacturing non-resource-based products for export. The lack of informal enterprises is the result of a predominance of the subsistence sector and the absence of the extremes of poverty in the islands; it is also accounted for by the lack of production skills outside the formal sector and the low level of participation of indigenous people in entrepreneurial activity. The formal sector dominates commerce and trading, although in some islands specialized trading activities are the preserve of co-operatives, as in the Solomon Islands, and service activities have proved much more attractive for local investment than manufacturing.

In the five larger island countries, in the early 1980s, the largest single manufacturing branch was food, beverages and tobacco, accounting for 39 per cent of manufacturing employment; wood and wood products was the second largest accounting for 24 per cent, and fabricated metals was third with 18 per cent. Other sub-sectors such as textiles, paper and chemicals were very small. It was estimated that 78 per cent of output was oriented towards the domestic markets (in the main substituting for imports), 10 per cent of output was the processing of indigenous natural resources, and only 3 per cent of output involved the processing of imported raw materials for re-export. The dominance of domestically oriented production is perhaps not as surprising as it first appears: the perishability of some food products, local tastes and preferences, customized production, high transportation costs and difficulties of supply are all factors which work in favour of local, small-scale production. Counter-forces include diseconomies of scale, limited technical skills and 'service' industries, high cost of imported inputs/components, the open nature of most island economies, and awareness of branded imported goods. Fiji is the island economy where import-substitution industries are most widely developed. They include a wide range of construction materials, wood and metal working, consumer goods, and food processing industries, including some based on imported raw materials. These activities have developed under the combined enterprise of the Indian immigrant community and a long standing policy of 'infant' industry protection by the Government; these factors however are beginning to play a less important role.

The processing of local raw materials, particularly renewable resources, has increased significantly in the island economies in the last decade. These

activities have been a response to the increased exploitation of natural resources by the primary sector, offering additional employment opportunities and significant increases in value added prior to export. In terms of technology these activities are not very demanding and often have smaller scale production options. In most cases the procurement of supplies and the marketing of output require careful organization, because of competition in international markets, which also exert considerable pressure on production costs. Processing of coconut oil, sugar, desiccated coconut and coconut cream, tropical fruits and fish are in the main oriented to distant international markets. Timber processing in contrast is often oriented to domestic markets in the smaller islands but Papua New Guinea and the Solomon Islands have quite large export-oriented forest industries. In many of the islands the processing of indigenous raw materials is reserved for the islanders themselves but foreign interests are almost always involved in investment, production and marketing arrangements.

The low level of processing of imported raw materials for export markets is largely a measure of the lack of competitiveness of island producers in fiercely competitive markets. There is some production for export to neighbouring islands; Fiji and Western Samoa have been able to exploit their geographic situation for a limited range of consumer goods and construction materials but inter-island trade is hampered by transport constraints. Some special incentives and preferential schemes have fostered production, of garments for example, in some of the Polynesian islands destined for Australia and New Zealand but often these involve expatriate interests with ties in those markets. Thus, the New Zealand Pacific Islands Industrial Development Scheme (PIIDS) and the Australian Development Assistance Bureau (ADAB) Scheme in essence encourage foreign investment by entrepreneurs from these countries rather than the generation of entrepreneurship and investment in the Pacific island States themselves.

The scale of the industrial production in the island economies has remained limited. It has also been confined to employing and servicing a small section of the population. With the exception of a number of plants processing local raw materials, the majority of enterprises have located in the larger urban centres giving them access to the available infrastructure, especially electricity, and to the local transportation and distribution

system for the import of their requirements and the distribution of output. The sensitivity of smaller enterprises to the availability of urban services is acute; in many of the islands financial and trade services, such as they are, are limited to one or two centres. The market orientation of many of the smaller enterprises also reinforces this tendency. In addition local participation in entrepreneurial activity is inhibited by lack of business training and experience and the difficulty in raising equity capital. Local savings tend to be limited and as yet few measures have been taken to mobilize these for investment in industry. In several countries however provident funds or trusts have been established to provide some indirect local participation in industrial ventures on behalf of the indigenous population.

1.5 Policies and measures for industrial development

Almost all the island countries of the Pacific region have attempted to establish a planning framework for the design and implementation of their development policies. These vary considerably in design but most are centered on very similar objectives. Typically these are:

- to strengthen and diversify the economic base of the nation so as to increase living standards;
- to promote more equitable distribution of the benefits of development;
- to ensure that opportunity for productive and rewarding social or economic activity is widely available;
- to increase economic independence and self-reliance; and
- to encourage resource identification and exploitation.

In recent strategies, decentralization and development of the more rural, outer islands have also been emphasized. The role of the manufacturing sector is seen primarily in terms of the creation of employment opportunities, processing of raw materials to increase value added and contribution to export revenues. Generally manufacturing production targets outlined in the plans are modest and this sector follows agriculture, fisheries, minerals and forestry in terms of allocation of development resources. In most cases, the execution of development projects is strongly dependent on foreign aid.

Amongst the island countries Papua New Guinea, Solomon Islands and Vanuatu have a wider range of natural resources and have placed little emphasis so far on industrial development. The small-scale manufacturing sector has received priority however with a view to increasing local participation; some activities are therefore reserved for nationals, especially the processing of indigenous raw materials, and foreign investment is not encouraged. Papua New Guinea has a policy of not subsidizing foreign investment in the economy which it prefers to restrict to large enclave projects on a joint venture basis. Some supportive measures have been taken to help develop local enterprise including the supply of financial assistance but the main implementing agencies are at the provincial level in both Papua New Guinea and the Solomon Islands. Fiji in contrast has instituted a whole series of industrial promotion measures aimed at fostering the growth of import-substitution industries for which ample protective measures have also been introduced. Fiji has as a result the largest and most diversified manufacturing sector with some special characteristics, including a pattern of horizontal diversification and considerable surplus capacity. Fiji has also gone furthest in providing industrial infrastructure, including industrial premises and estates. More recently there have been moves to reduce protective barriers to imports to make domestic industry more efficient and competitive. Greater priority has been given to processing industries based on locally available raw materials, as well as to industries producing inputs required by the primary and other sectors. The chief instrument of control licensing within the industrial sector is production and investment.

Of the smaller islands, Tonga and Western Samoa have recently taken steps to encourage industrial development to help generate employment opportunities and to contribute to the growth and diversification of exports. In both cases industrial estates have been constructed, for smaller-scale enterprises in Tonga while Western Samoa has provided for medium-scale activities. Both strategies seek to exploit the potential for agro-based industries, including the processing of fruits and vegetables and of coconut products. Both countries have with some success encouraged foreign investors, particularly on a joint venture basis.

At the wider level, island Governments have pursued open trading policies with relatively little use of tariffs or quotas which would inhibit

competition from imports. Only Fiji has developed a more protectionist stance over a long term and considerable distortions in terms of efficiency and pattern of investment have resulted. Exchange rate policies have been little used to support industrial development. Some smaller islands do not have this option, being part of the Australian or New Zealand currency areas. Elsewhere measures have rarely been adopted to achieve appropriate exchange rate adjustments. Adjustments for island countries however are not easy because of the need to contain inflationary pressure. Some tax incentives are given to encourage industrial enterprises but the impact of these is marginal.

Opportunities for technical assistance in support of industrial development in the Pacific Region are constrained by the above-mentioned regional characteristics as well as by the limited manpower and resources of Governments and their development agencies. In order to achieve industrial development aims, approaches to the delivery of technical assistance in the Pacific region could go beyond the provision of individual long-term experts and the execution of in-depth studies. More practical methods of training officials and entrepreneurs need to be developed, including their exposure to methods of work in other countries or regions perhaps over longer periods through secondments as well as through study tours. More appropriate training materials also need to be developed and adjusted to local needs and circumstances and the awareness of the role of and potential for manufacturing should be strengthened. Experts specializing in policy, technical and managerial aspects at sectoral or product levels should be available in teams, if necessary, to Governments and development agencies, drawing on regional and developing country expertise wherever possible.

Prospects for the manufacturing sector in the region depend to a large extent on the progress which can be made in the areas of regional co-operation and exploitation of marine resources. Although the markets and the manufacturing sectors of the individual countries are small, co-operation could provide a threshold beyond which a wider range of economic activities would be profitable, and to prevent duplication. The constraint placed on industrial development by the limited availability of land resources in most of the countries can be overcome through a more extensive, rational exploitation of marine resources. Given the wide range of issues relating to marine resources and their costs of exploitation, regional co-operation in this field could prove useful.

1.6 Special problems of micro States

Within the South Pacific region there are seven micro States, defined as having a population of less than 25,000 and a surface land area of less than 500 sq. km. In these countries Governments and development agencies face rather more difficult conditions for industrial development than elsewhere in the region as a consequence of the following characteristics:

- small populations;
- limited natural land resources;
- absence of economies of scale;
- isolation from world markets, yet with open economies dependent on the world trade system;
- limited opportunities for employment or development;
- primary production of one or two agricultural commodities which are subject to severe price fluctuations;
- little industrial activity or development;
- high population densities; and
- low levels of training and other basic human services.

Micro States therefore tend to become dependent on the major regional powers for financial resources and technical expertise to carry out their development programmes. Further recurrent expenditures are often supported by bilateral assistance and policy making and implementation are inevitably heavily circumscribed. In terms of industrial development the very limited domestic market opportunities can support only very small-scale, low technology activities using local raw materials since such economies possess few comparative advantages vis-à-vis the larger external or regional markets with which they are linked. There is very little in the way of private sector initiative or enterprise with access to sufficient resources to balance the public sectors. Inevitably the public sector tends to dominate not only in essential services but also in some cases trading and distribution, and consequently the public sector assumes roles and responsibilities which it is not always well equipped to fulfill. Industrial enterprise in the micro States faces an overwhelmingly hostile environment unless special

circumstances create special market opportunities and special assistance is available to facilitate the supply of inputs.

1.7 Industrial investment opportunities

Industrial investment opportunities vary among the Pacific island economies, ranging from Papua New Guinea - where manufacturing accounts for about 10 per cent of GDP and the country's mineral and natural resource endowments offer greater scope for industrial expansion - to countries such as Cook Islands and Nauru - where manufacturing activities are extremely limited. Pacific island countries are trying to expand their manufacturing sectors especially by encouraging small manufacturing industries with the help of foreign capital.

A joint ESCAP/ADB/SPEC industrial survey of the South Pacific attempted to outline industrial profiles for each island State. In the industrial profile for Papua New Guinea alcohol from sago palm, integrated wood processing and cocoa liquor are the industries suggested. The survey suggests that priority could be accorded to polypropylene bags and refinery automotive lubricating oil in Fiji. The demand for polypropylene bags is expected to be around 4.5 million per year. The production is intended for coping with the requirements of industries producing fertilizers, flour, sugar and feed. Industrial profile for Solomon Islands explores the feasibility of building boats and manufacturing educational toys and paint. For Western Samoa, mushroom production is suggested as a potential candidate. Juice essential oil from limes, agricultural handtools and nails are the products recommended for Vanuatu. The production of tapa kit appears to be a promising manufacturing activity in Tonga due to a well developed museum shop sales media. The industrial survey suggested the production of twist tobacco factory and the cabin style biscuits in Kiribati.

The island economies have a natural advantage in import substitution in many product areas due to: perishability of food products; the high transport cost of competing goods, such as soft drinks, concrete blocks and corrugated iron; production adapted to local tastes, as in the case of some foods and apparel; the importance of adaptability to client requirements, as in much

metal fabrication and sawmilling. All these factors act to the advantage of local producers.

The processing of local materials for export is one of the more obvious manufacturing opportunities. On the basis of data available for selected larger island States, the largest single sector is food, beverages and tobacco. The next most important is wood and wood products, followed by fabricated metal products. The other sectors such as textiles, paper products and chemicals are as yet very small.

Promising product areas

An inquiry into the possible product areas seems worthy of further investigation. Production of coconut oil is already being undertaken in a number of island States. There is considerable scope for further processing by fractionation into fatty acids and glycerol, and by refining into soap and vegetable oils (palm, palm kernel). Trends in market demand point towards increased processing of oil rather than crude oils. The major advantages of further processing accrues from possible further downstream manufacturing activities with both domestic and export market implications. The high value of processed products could more effectively counteract the disadvantages of high freight rates and fluctuations in commodity prices. The products include soap and detergents, margarine (stearin), cooking oil, ghee (vanaspati), glycerine and its derivatives (including various industrial chemicals and explosives), industrial lubricants, fatty acid resins and yeasts (a basic input for food manufacture), ice cream, confectionery, interproofing agents and waxes (candles, crayons, etc.).

Other industrial opportunities are also based on diversified primary production which include chocolates from cocoa liquor, activated carbon from small charcoal processors and various chemical and allied products from starches and alcohol produced from a variety of root and other crops.

The most common resource in the island States is fish. It is also the one most in need of concerted action. The level of indigenous exploitation of the fish resources in Pacific island countries is generally very low. Only in two countries has local offshore exploitation been processed by the two

canneries at Pago Pago. What is urgently required for the region is a co-ordinated policy on all aspects of offshore fishing and processing.

An Investors' Forum for the South Pacific Region was organized by UNIDO in Suva, Fiji, in November 1984, with the prime objective of discussing industrial investment opportunities in the Pacific island States. A total of 109 projects in 8 Pacific island countries was presented at the Forum, of which food and beverages industries represented 28.4 per cent (31 projects), textiles, leather and footwear accounted for 15.6 per cent (17 projects), industrial chemicals and other chemical products constituted 9.2 per cent (10 projects), and metal products and non-electrical machinery accounted for 17.5 per cent (19 projects). The remaining projects were divided amongst various industrial sectors. Table 1.5 presents the list of industrial projects presented to and discussed during the Forum. In early 1985, 28 companies from 13 countries, which were not present at the Forum, have expressed their interest in 108 projects in the Pacific island States, as shown in Table 1.6.

Countries which are geographically more strategically situated in the Pacific, with relatively easy access to the markets of Australia, Japan, New Zealand and the United States, as well as those which enjoy favourable trade agreements through the South Pacific Regional Trade and Economic Co-operation Agreement (SPARTECA)^{1/} are potentially capable of attracting investment into export-oriented industries. Australia and New Zealand have created preferential access conditions to their markets for products from the island member countries of South Pacific Bureau for Economic Co-operation (SPEC). They have also received stimulus from the operation of the New Zealand Pacific Island Industrial Development Scheme (PIIDS).

Towards international and regional co-operation in industrial development:

Both New Zealand and Australia have initiated a number of novel development assistance measures to facilitate the process of industrial

^{1/} Under the revised provisions of SPARTECA exports of finished products to Australia and New Zealand must contain a minimum of 25 per cent of inputs of Australian or New Zealand origin. For details, see SPEC, Trade and Industry Scene, January 1986.

Table 1.5. Industrial projects presented and discussed at Investors' Forum for the South Pacific Region, 26-30 November 1984

ISIC	Number of projects presented									Number of project discussions								
	PNG	FIJ	SAM	SOL	TON	VAN	KIR	TUV	Total	PNG	FIJ	SAM	SOL	TON	VAN	KIR	TUV	Total
13 Prawn/eel	-	2	-	-	-	-	-	-	2	-	8	-	-	-	-	-	-	8
29 Mining	1	1	-	-	-	-	-	-	2	2	7	-	-	-	-	-	-	9
31 Food/beverages	10	5	4	4	3	4	1	-	31	8	14	7	6	3	11	3	-	52
32 Textiles/wearing apparel/ footwear/leather	6	4	2	3	1	-	-	1	17	6	9	1	5	0	-	-	3	24
33 Wood	2	1	1	-	1	1	-	-	6	3	2	3	-	2	2	-	-	12
34 Paper	2	1	-	-	-	-	1	-	4	3	2	-	-	-	-	1	-	6
35 Industrial chemicals/petr. ref./rubber/plastics	2	3	2	-	3	-	-	-	10	3	4	7	-	6	-	-	-	20
36 Pottery/glass/other mineral products	2	2	-	-	-	-	-	-	4	0	8	-	-	-	-	-	-	8
37 Iron/steel/non-ferrous metals	2	2	-	-	-	-	-	-	4	1	1	-	-	-	-	-	-	2
38 Metal production, electrical machinery/transport equip.	9	3	-	1	5	-	1	-	19	16	7	-	2	8	-	0	-	33
39 Other manufacturing industries	1	2	-	1	-	-	-	-	4	0	7	-	0	-	-	-	-	7
50 Hotels/low-cost housing	-	4	-	-	1	-	-	-	5	-	7	-	-	1	-	-	-	8
63 Island resort	-	1	-	-	-	-	-	-	1	-	4	-	-	-	-	-	-	4
	37	31		9	14	5	3	1	109	42	80	18	13	20	13	4	3	193

Source: UNIDO.

FIJ - Fiji
PNG - Papua New Guinea

SAM - Western Samoa
SOL - Solomon Islands

TON - Tonga
VAN - Vanuatu

KIR - Kiribati
TUV - Tuvalu

Table 1.6. Country-wise list of companies interested in industrial projects in selected Pacific island States, January 1985

Country	Number of companies	Number of projects interested in								Total
		FIJ	PNG	SAM	SOL	TON	VAN	KIR	TUV	
Australia	9	4	6	6	3	2	3	1	-	25
Sweden	1	3	7	1	2	-	1	-	-	14
Japan	1	1	-	-	-	-	1	-	-	2
F.R.Germany	1	1	5	2	3	1	1	1	1	15
India	4	4	2	1	1	1	1	-	-	10
Singapore	1	-	1	-	-	-	-	-	-	1
Yugoslavia	1	4	1	-	1	-	-	-	-	6
Italy	5	5	5	-	1	-	-	-	-	11
Malaysia	1	1	3	2	1	-	1	1	-	9
Belgium	1	1	-	-	-	-	-	-	-	1
Romania	1	2	7	-	-	2	-	1	-	12
United Kingdom	1	-	1	-	-	-	-	-	-	1
New Zealand	1	-	1	-	-	-	-	-	-	1
Total	28	26	39	12	12	4	8	4	1	108

Source: UNIDO.

FIJ = Fiji SAM = Western Samoa TON = Tonga KIR = Kiribati
 PNG = Papua New Guinea SOL = Solomon Islands VAN = Vanuatu TUV = Tuvalu

promotion. New Zealand encourages the promotion of joint ventures with New Zealand partners. Under PIIDS the driving force of most projects is an expatriate. Usually, New Zealand equity is high. The PIIDS acts as an important source of financial assistance for small industry development.

The Australian Development Assistance Bureau (ADAB) Scheme is based on a perception that shortages of local equity is a major deterrent to new business and appears to be designed to provide public sector equity for Australian investment in the islands, with the overriding consideration for promoting Australian equity involvement.

The economics of regional co-operation on input production appears to be significant when compared with the costs of freight within the region relative

to costs of freight from major suppliers. Major imported inputs are fertilizers and animal feed, glass and various metal containers and other packaging materials, steel, cement and timber in some countries. Various chemicals, sugar and salt are also imported. Machinery and implements ranging from hand tools to more sophisticated equipment are other imported inputs. Within the region lies a major source of fertilizers in the form of phosphates from Nauru. Deposits remaining on Banaba in Kiribati could warrant commercial extraction and represent a source of low cost fertilizers for the region. Better use of local cement resources could reduce the overall regional import bill. Papua New Guinea and Fiji could produce more packaging products and meet the demand for these products in other islands. There is significant scope for import substitution (on regional basis) in many products. Selective trade liberalization, industrial complementation schemes and "package deal agreements" would be vital for achieving import substitution on a regional basis.

An initiative towards obtaining aid and trade incentives from Japan and the USA, similar to the Caribbean Basin Initiative (CBI) which provides duty free access to the US market for most goods produced and assembled in the Caribbean, would be beneficial to the Pacific island economies. Trade agreements at preferential terms could help overcome the main obstacles to industrial development.

Role of regional organizations

Economic Commission for Asia and the Pacific (ESCAP) acts as a forum for the island economies in the Pacific region, as a source of information, as a research facility, and increasingly in the 1970s as a provider of technical assistance for particular projects, with special emphasis on the formulation of regional and national policies. ESCAP has its regional office in Vanuatu.

Asian Development Bank (ADB) co-operates with international and regional organizations active in the region and provides assistance and loans to member countries. It also acts as a channel for regional assistance.

The Commonwealth Heads of Government Regional Meeting (CHOGRM) II, held in New Delhi in October 1980, set up the CHOGRM Working Group on industry. The

Group has been attempting to promote industrial development in the island States. The Group with the assistance of IDU (CFTC) assisted member countries, particularly the small island countries of the Region, on information of industrial/investment guidelines, entrepreneurial development and provided technical facilities through various workshop/seminars, preparation of notes, documents, etc. Technological information facilities were also provided through bilateral and regional exchanges for priority industrial sectors. Exposure visits/training were arranged in member countries for the benefit of the entrepreneurs from island countries which helped them in the implementation of industrial projects and improvement of their technologies.^{1/}

The South Pacific Commission (SPC) was established by an agreement in Canberra, Australia, by Governments of Australia, France, the Netherlands, New Zealand, the United Kingdom, and the USA in February 1947, effective from July 1948. It provides training and assistance in social, economic and cultural fields to the countries of the region.

The South Pacific Forum is a gathering of Heads of Governments of the independent and self-governing States of the South Pacific region. It provides an opportunity for informal discussions to be held on a wide range of common issues and problems and meets annually or when issues require urgent action.

The South Pacific Bureau for Economic Co-operation (SPEC) was established by an agreement signed on 17 April 1973 at the third meeting of the South Pacific Forum in Apia, Western Samoa. It is an inter-governmental regional organization located in Suva, Fiji. The purpose of the Bureau is to facilitate continuing co-operation and consultation between members on trade,

1/ A list of activities undertaken by the CHOGRM Working Group on industry during 1981-85 is presented in Appendix 1.B. For a country-wise list of identified projects for which feasibility studies conducted and action plans prepared during 1981-85 under the auspices of Industrial Development Unit (IDU) of the Commonwealth Fund for Technical Co-operation (CFTC), see Appendix 1.C.

economic development, transport, tourism and other related matters. There are several associated and affiliated organizations, such as Pacific Forum Line, South Pacific Forum Fisheries Agency, The South Pacific Trade Commission and other organizations.

UNIDO assistance at the regional level:

One of the common problems in the developing countries of the Pacific is the translation of broad objectives into specific project proposals within the framework of technical assistance and the preparation of specific proposals based on a thorough assessment of resources and market opportunities. Enterprise development is another crucial area requiring external assistance.

The small-scale industrial development project initiated by UNIDO at the regional level aims at assisting in the actual setting-up of new enterprises through feasibility studies, joint endeavours, inter-country co-operation in training and practical management.

In addition to the regional project on small-scale industry, the following projects (in the pipe-line) are expected to provide advice and technical inputs to industrial enterprises:

- (1) Organization of a regional workshop in evaluation and project preparation, in 1986
- (2) Organization of a regional workshop for enterprises in the wood-processing industry, with emphasis on joinery industries, in 1986
- (3) Organization of a regional workshop on management and enterprise efficiency, in 1987.

Both Australia and New Zealand are supporting the efforts of UNIDO to identify viable projects in the developing countries of the Pacific. These countries could usefully co-operate with UNIDO in various fields of industry.

Appendix 1.A: Selected Pacific island States' membership in regional organizations, 1985

Regional Organizations Country	ADB	CHOGRM	ESCAP	SPC	SPEC
Papua New Guinea	*	*	*	*	*
Fiji	*	*	*	*	*
Solomon Islands	*	*	*	*	*
Western Samoa	*	*	*	*	*
Vanuatu	*	*	*	*	*
Tonga	*	*	*	*	*
Kiribati	*	*	*	*	*
The Federated States of Micronesia				*	*
Cook Islands	*		*	*	*
Nauru		*	*	*	*
Niue			*	*	*
Tuvalu		*	*	*	*

Source: The Europa Year Book, 1985.

Note: The star symbol (*) indicates country's membership in the respective organization.

Appendix 1.B: List of activities undertaken by the CHOGRM Working Group on industry, 1981-85

1. Preparation of Country Profiles with particular reference to industrial development in 10 small island countries in the Pacific and Asia.
2. A paper on Industrial Development and possible opportunities in the small island countries of South Pacific.
3. Identification of possible/viable projects in the small island countries for which IDU (CFTC) carried out detailed feasibility studies and prepared action plans.
4. Preparation of brochure on "Investment Guidelines of manufacturing industries in CHOGRM Region".
5. A workshop on "Coconut based Industries" - organised in Port Moresby.
6. A residential workshop on "Small Enterprise Development" - organised in Sydney.
7. A seminar on Development of "Coconut Timber Use" - organised in Honiara.
8. A workshop on "Food Packaging" - organised at Hawkesbury Agriculture College, Richmond (Australia).
9. Workshop on Policies and Investment Mechanism for Promotion of Industries in CHOGRM Region
10. Assistance Towards Cost of Machinery and Equipment of Sheet Metal Fabrication - Kiribati.
11. Exposure Visits of Working Group Members on Industry Organisation.
12. Seminar on Co-ordination of Industrialization Programmes in CHOGRM Region.
13. Investor's Form in collaboration with UNIDO and ESCAP.
14. Preparation of Regional Industry Profiles.
15. Upgrading Regional Information Centre on Trade and Industry - Fiji.
16. Workshop on Leather and Leather Products Industry in CHOGRM Region.
17. Technical Assistance on Quality Control Shelf Life Testing and Packaging Industry.
18. Development of Coconut Timber Industry Stage II.
19. Exposure Visits of Entrepreneurs.

Appendix 1.C: LIST OF IDENTIFIED PROJECTS FOR FEASIBILITY STUDIES AND ACTION PLANS, 1/ 1981-85

PAPUA NEW GUINEA

1. Solar salt
2. Coir industry
3. Cane furniture
4. Domestic plastic ware
5. Aluminium utensils
6. Automobile filters
7. Auto parts
8. Domestic refrigerators
9. Dry cell batteries
10. Cocks and taps
11. Processing timber from old rubber trees
12. Sericulture
13. Industrial estate with common facility centre
14. Paper moulded egg trays
15. Mosquito coils
16. Motor vehicle registration plates
17. Tanned leathers
18. Tanned crocodile skins
19. Leather footwear
20. Electric fans
21. GLS lamps
22. Builders hardware
23. Agricultural hand tools
24. Forged hand tools

FIJI

1. Wick stoves
2. Stainless steel utensils
3. Pressure cooker
4. Enamel ware
5. Sugar cane cutting knives
6. Paper board
7. Egg trays
8. Domestic electrical fittings
9. Acrylic buttons
10. Trochus shell buttons
11. Leather goods
12. Woven lables
13. Terry towels & bedsheets
14. Tie dye & batik shirts & dresses
15. Ginger processing
16. Glass bottles
17. Lime production
18. Cattle feed
19. Interlocking paving block
20. Dry cell batteries
21. Pharmaceutical products
22. PVC floor tiles
23. Spectacle frames
24. Cassava & dalo chips
25. Cocoa liquor
26. Papain from pawpaw
27. Brignettes from sawdust
28. Seaweed

Appendix 1.C (continued)

SOLOMON ISLANDS

1. Copra oil extraction
2. Laundry soap
3. Paints
4. Soft drinks
5. Sheet metal fabrication
6. Button from trochus shells
7. Saw mill
8. Raw hides preservation
9. Leather footwear
10. Leather tanning and finishing
11. Village industrial estate

TONGA

1. Manufacture of vinegar from coconut water
2. Cultivation of brown-weed for industrial manufacture
3. Food technology lab
4. Timber treatment plant
5. Manufacture of wooden furniture
6. Bakery products
7. Automobile repair workshop
8. Printing press
9. Freezer unit for storage of fish and meat
10. Polyethylene film and bags
11. Lime juice extraction

WESTERN SAMOA

1. Raw hide preservation
2. Leather tannery

VANUATU

1. Medium size saw mill
2. Sheet metal fabrication
3. Barbed wire, and nails
4. Coconut oil
5. Laundry soap
6. Paper bags
7. Exercise books
8. Rubber beach sandals
9. Tannery for semi-finished leather
10. Raw hides and skins collection, curing and preservation centre

TUVALU

1. Coconut oil
2. Laundry soap
3. Coir products
4. Joinery
5. Printery

Source: CHOGRM, Five Years of CHOGRM Working Group on Industry: A Factual Review, March 1986.

1/ Carried out by the Industrial Development Unit (IDU) under the auspices of Commonwealth Fund for Technical Co-operation (CFTC).

2

PAPUA NEW GUINEA

2. PAPUA NEW GUINEA

2.1 THE ECONOMY OF PAPUA NEW GUINEA

2.1.1 Recent economic trends

After a period of considerable, if somewhat uneven, growth in the 1970s Papua New Guinea experienced some economic difficulties during 1980 as world prices fell for major export commodities and higher prices for oil and other imports added to difficulties with the balance of payments. In 1981 Papua New Guinea saw some recovery with bigger outputs from the Bougainville mine and investments in the OK Tedi project as well as a moderation of inflation under cautious monetary and fiscal policies. At the same time however falling prices for exports reduced the value of export receipts considerably during 1981. In 1982/83 the position stabilized with domestic exports overall remaining unchanged and production and investment slowing down; fiscal austerity did not allow public expenditure to compensate for the slow-down in private investment. Thus it was only with the turn around of export prices in early 1983 that the tempo of economic activity began to change.

By the end of 1983 economic growth in Papua New Guinea had resumed at 1 per cent, largely propelled by higher levels of export related activities. Earnings from gold and copper exports, resulting from price rises, increased by 17 per cent in 1983. Increased coffee and cocoa earnings contributed to a 20 per cent rise in overall export earnings. Outside the enclave mining projects where investment surged at the OK Tedi project, there were few other economic stimuli until Government introduced a package of business incentives including abolition of some import duties on industrial inputs and a reduction in others, and some fiscal adjustments.

During 1984 GDP growth was estimated to be 3.5 per cent which is substantially higher than the rate achieved over the period 1980-83. Exports grew by 11 per cent in 1984. Imports have grown much slower. A trade surplus is likely to have emerged during 1984.

Real GDP is estimated to have risen by 6.7 per cent in 1985. Copper prices are expected to remain high during 1986 with world demand growing at

the rate of 6 per cent and world stocks declining. Gold prices may also improve following the fall in the value of the US dollar. Papua New Guinea's ability to benefit from these developments will depend crucially upon the rate at which production can increase at the OK Tedi gold and copper mines. Higher coffee and mineral prices together with a decline in expenditures on petroleum imports, resulting from a sharp fall in oil prices, could improve the country's external terms of trade by about 14 per cent and narrow the current account deficit to US\$ 213 million, or 8.3 per cent of GDP in 1986. However, GDP is projected to grow at 2.3 per cent in 1986.

2.1.2 Economic structure

Papua New Guinea is one of the largest countries in the Pacific Region. It is a land of great geographic diversity with mountainous regions, volcanoes and low lying coastal swamps. The population numbers just over three million with a high growth rate of 3 per cent. In recent years there has been rapid drift of population to the major towns but a high proportion of the population live in the Highlands.

Papua New Guinea's economy is predominantly rural and agricultural, although in the last 15 years a large enclave mining sector has developed and of late there has been significant expansion in the urban industrial sector. Papua New Guinea is rich in natural resources with a high overall productive potential. There are substantial mineral deposits (copper and gold), probably significant petroleum reserves, good agricultural potential with fertile soils, abundant rainfall and high temperatures, large expanses of tropical forest and substantial fishery resources. Papua New Guinea's pattern of development clearly demonstrates a reliance on a number of large, natural resource-based projects exhibiting few linkages with its traditional economy. In recent years economic performance has consequentially been strongly influenced by external factors, not least the prevailing prices of primary commodities.

Primary production (excluding mining) contributes one-third of total output in Papua New Guinea, sustains 80 per cent of the population and contributes 50 per cent of export earnings. Yet in recent years the performance of the agricultural sector has not kept pace with the modern

economy or even with the growth of the population. Output of major crops has stagnated with the market component (60 per cent of total) growing at 3.5 per cent and the subsistence component (40 per cent) growing much more slowly. Substantial drift of subsistence farmers to urban areas in search of wage earning opportunities and some movement towards cash crops amongst smallholders have reduced output of food crops. There has also been some decline of estate production of cocoa and copra through inadequate replanting programmes, uncertainties over land tenure, uneconomic size of production units, and shortages of managerial skills. These delays in agricultural development have slowed the absorption of labour in rural areas and there is an urgent need to remove constraints on agricultural development which include lack of security of land tenure, shortages of skilled and technical manpower, inadequate support services for smallholders (including credit and advisory services).

The policy of export diversification - relying on a number of large natural-resource-based projects to generate government revenues - has achieved significant progress, successfully reducing dependence on Australian aid - now providing under 30 per cent of total expenditure as against 50 per cent in 1970. The programme of economic stabilization during the last decade has also been largely successful even at times of high international inflation and major fluctuations in Papua New Guinea's terms of trade. The impact of fluctuating world prices for export commodities and other uncertainties for producers and for the budget has been minimized with the help of price stabilization funds. Monetary and exchange rate policies have held domestic inflation below international levels contributing to the stability and international creditworthiness of the economy.

For the future the Government is increasingly looking to agricultural growth to provide more balanced development and provide increased benefits for distribution. Smallholder production offers the greatest potential for growth. Additional inputs of knowledge, skills and finance are however needed if declining incomes and living standards for the majority of the population are to be prevented. Domestic revenues are already constrained by the small size of the industrial and commercial sectors and by the declining number of expatriates. Government may seek some expansion of broader based domestic revenues as in the medium to long term direct revenue flows from the enclave projects will not suffice for the needs of the majority.

Table 2.1 indicates that domestic expenditure on GDP increased by 4.4 per cent in 1984. Government final consumption expenditure increased by 7.8 per cent and private final consumption expenditure grew strongly, increasing by 11.4 per cent in 1984. The market component of private final consumption expenditure had an exceptionally strong growth rate of 14.4 per cent in the same year. Gross fixed capital formation fell by 23.1 per cent from K635.9 million in 1983 to K488.6 million in 1984, following the completion of the major construction phase of the OK Tedi mine project.

Table 2.1. Expenditure on gross domestic product, 1980-84
(at current purchasers' values in million kina)

	1980	1981 ^{a/}	1982 ^{a/}	1983 ^{a/}	1984 ^{b/}
1.1 Government final consumption expenditure	411.2	454.4	468.1	471.3	508.0
1.1.1 Value of free & partially-paid labour (imputed)	5.3	4.5	4.0	...	...
1.1.2 Other government final consumption expenditure	405.9	449.9	464.1	471.3	508.0
1.2 Private final consumption expenditure	1,051.3	1,104.2	1,111.9	1,245.9	1,387.4
1.2.1 Market component	791.9	821.2	820.8	926.0	1,059.0
1.2.2 Non-market component	259.4	282.9	291.1	319.8	328.4
1.3 Increase in stocks	36.4	7.4	-14.2	-6.2	65.0
1.4 Gross fixed capital formation	394.2	450.7	576.7	635.9	488.9
1.4.1 Market component	391.3	447.5	573.3	632.3	485.1
1.4.2 Non-market component	2.9	3.2	3.4	3.6	3.8
<u>Gross domestic expenditure</u>	1,893.1	2,016.7	2,148.5	2,346.8	2,449.3
Market component	1,630.8	1,730.5	1,847.9	2,023.4	2,117.1
Non-market component	262.3	286.2	300.5	323.4	332.2
1.5 Exports of goods and services	737.6	642.9	644.3	771.2	908.0
1.6 <u>less</u> Imports of goods and services	910.8	987.6	1,058.2	1,135.4	1,202.0
1.7 Statistical discrepancy	-11.8	9.2	14.5	-13.0	17.5
<u>Gross domestic product</u>	1,708.1	1,681.2	1,749.1	1,969.7	2,172.7
Market component	1,445.8	1,395.0	1,448.5	1,646.3	1,840.6
Non-market component	262.3	286.2	300.5	323.4	332.2

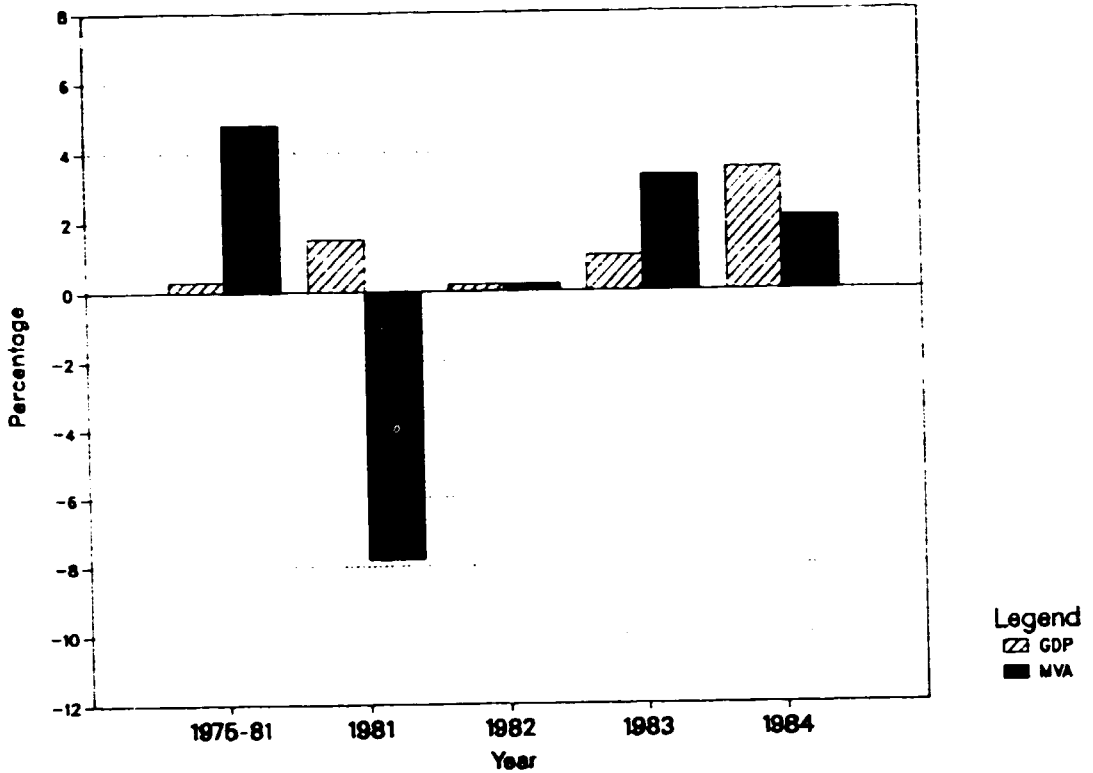
Source: National Statistical Office, National Accounts Statistics, Bulletin No. 23, 1986.

a/ Revised since previously published.

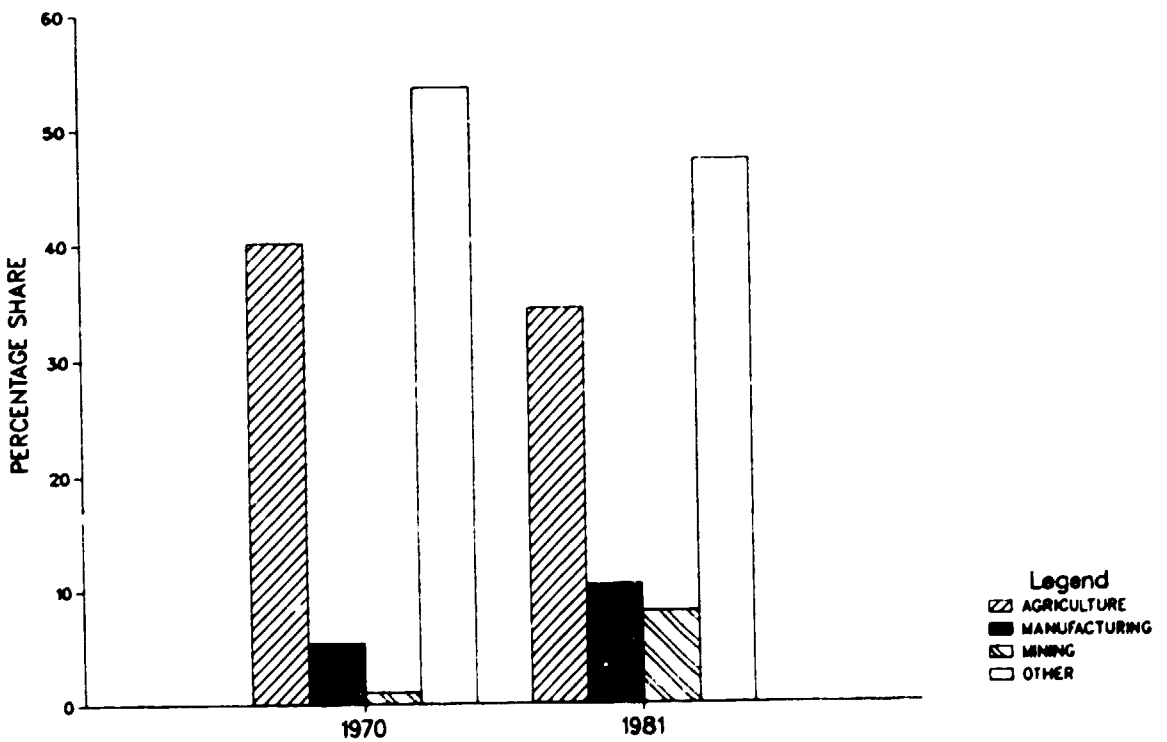
b/ Preliminary - subject to revision.

MANUFACTURING TRENDS

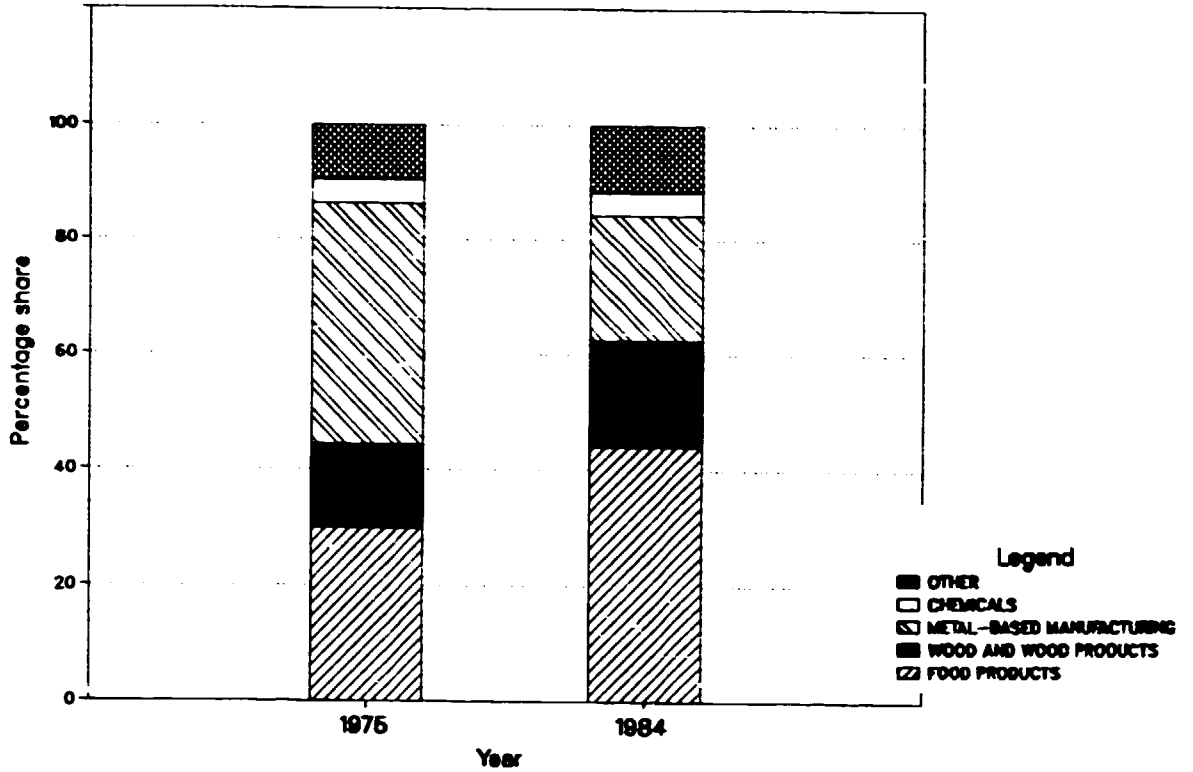
GROWTH RATES OF REAL GDP AND MVA, 1975-1984



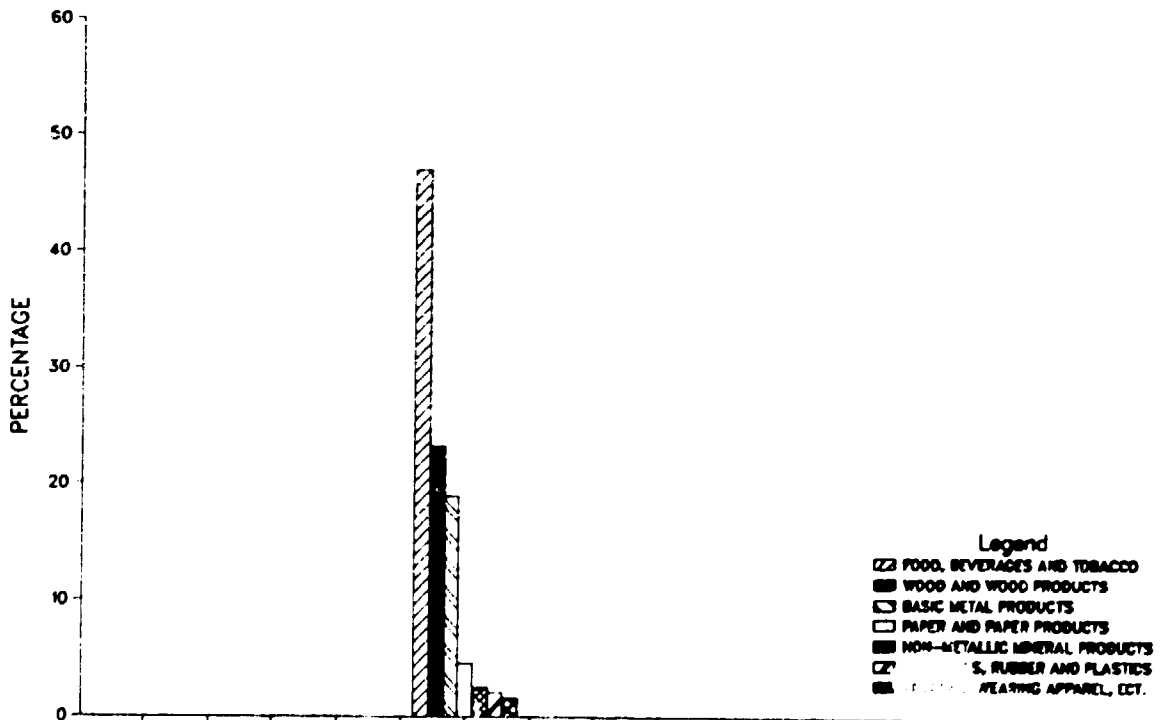
SECTORAL ORIGIN OF GDP, 1970 AND 1981



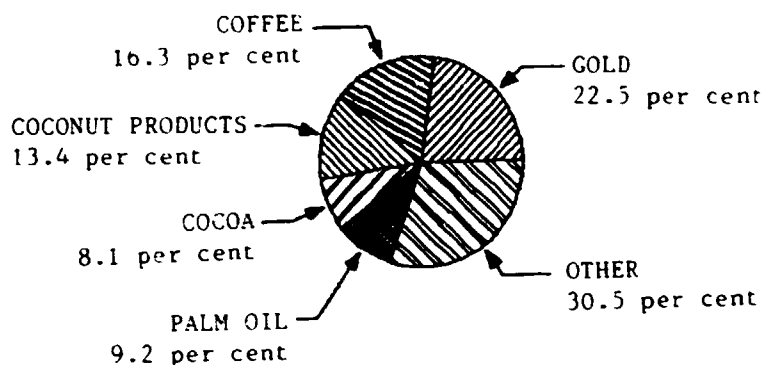
COMPOSITION OF MANUFACTURING VALUE ADDED, 1975 AND 1984 (In current prices)



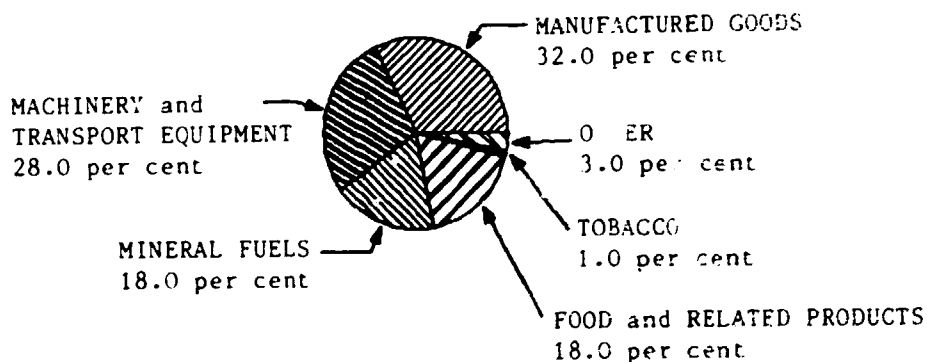
STRUCTURE OF MANUFACTURING EMPLOYMENT, 1983



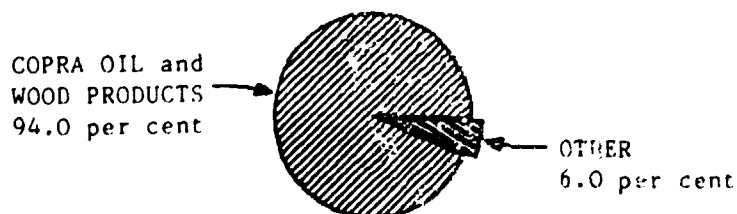
MAJOR COMPONENTS OF MERCHANDISE EXPORT EARNINGS, 1984



MAJOR COMPONENTS OF MERCHANDISE IMPORTS, 1984



SHARE OF COPRA OIL AND WOOD PRODUCTS IN MANUFACTURED EXPORTS 1983



2.2 STRUCTURE AND PERFORMANCE OF THE MANUFACTURING SECTOR

2.2.1 Overview of the manufacturing sector

Over the period 1970 to 1980 manufacturing has shown steady growth against agriculture and mining. Excluding mining, the industrial sector in Papua New Guinea contributes 14 per cent of GDP, with manufacturing contributing 10 per cent of both GDP and formal employment. Industrial enterprises are concentrated in the main urban centres, particularly in Port Moresby and Lae. The main determinants of industrial growth have been the growth of agricultural output and government spending; the major enclave projects based on natural resources have themselves had far reaching impact for the industrial sector. Constraints on industrial development include the small size of the domestic market, internal transport difficulties and costs, shortages of organizational and production skills, and the relatively high wages prevalent in Papua New Guinea. Nevertheless manufacturing growth reached 10 per cent per annum in the mid-1970s with the strongest growth in production of beverages and in the processing of tea, coffee and cocoa. Growth of real value added per employee in this period reached 7 per cent per annum and of industrial employment 3.3 per cent per annum. Foreign firms play a dominant role in the manufacturing sector - there are few domestic entrepreneurs in the sector. In 1973, 86 per cent of the manufacturing sector was in foreign hands; more recent data are unavailable, but the situation is unlikely to have changed significantly. Since independence the Government has sought to foster the emergence of domestically-owned manufacturing units and has achieved some modest success.

Papua New Guinea's manufacturing sector comprises mostly small- and medium-scale enterprises. In 1979 there were 492 factories engaged in manufacturing activities and numbers increased to 508 by 1980 out of a total of 776 industrial enterprises. Manufacturing employment totalled 19,980 out of total industrial employment of 25,581 - some 11 per cent of total formal sector employment. Over the period 1976-80 industrial employment has grown by 5 per cent per annum. In the same period the number of smaller enterprises and their share of manufacturing employment has contracted somewhat so that by 1979 65 per cent of manufacturing employment was located in 122 enterprises, each employing more than 50 persons.

Development of manufacturing industries in Papua New Guinea is constrained by:

- delays in securing land for industrial sites as a result of the land administration system;
- a small and fragmented domestic market;
- inadequate and expensive public utilities and transport;
- shortages of production skills and low productivity in relation to wage levels; and
- administrative and regulatory obstacles for investors.

2.2.2 Growth and structural change

The share of food products and wood-based industries within the sector's total capacity is indicative of the pattern of manufacturing development so far, showing important linkages between primary and secondary activities which, however, could be further improved. These two sectors have shown the strongest growth rates in the 1970s although engineering also showed rapid growth towards the end of the decade.

The three largest subsectors in manufacturing are:

- food and beverages with 40 per cent of value added and 35 per cent of employment;
- basic metal industries, fabricated metal products, etc. with 26 per cent of value added, 28 per cent of employment; and
- wood and wood products including furniture, with 22 per cent of value added, 25 per cent of employment.

The manufacturing sector's share of GDP doubled over this period and its relative gain during this period was second only to mining. Manufacturing productivity (measured in terms of value added per employee) grew at a rate of 7 per cent per annum during the 1970s. Once again productivity growth in the manufacturing sector was second only to mining. This contrasted sharply with the agricultural sector, the GDP share of which declined from 40 to 34 per cent during 1970-81.

Table 2.2 presents manufacturing value added growth in the 1975-84 period. The great majority of figures are estimates, and changes in the methodology of data collecting and classification may be responsible for part of the strong fluctuations in the growth pattern. It appears, however, that the food products industry expanded sharply during the second half of the 1970s, with the exception of a 2.4 per cent decline in 1979. Table 2.2 suggests that it was only a pause before a spurt as value added in food industry continued to expand since 1980. The second most important manufacturing branch, metal-based manufacturing, exhibited a much lower, strongly fluctuating growth rate. Wood products grew strongly during the late 1970s, but suffered from a setback in the early 1980s.

The structure of the manufacturing sector underwent one major change during the 1975-84 period. Food processing replaced metal-based manufacturing as the most important branch, representing 44 per cent of MVA in 1984. The wood and wood products branch has retained and slightly improved its position. These three branches together produced some 85 per cent of MVA in 1975, and approximately 80 per cent of MVA in 1984. Among the less important branches, non-metallic minerals strengthened its position considerably.

2.2.3 Employment and productivity

Table 2.3 presents figures showing the number of persons employed in the sub-sectors of manufacturing and salaries and wages paid to employees in 1983. In 1983 food, beverage and tobacco industries provided 10,445 out of a total of nearly 22,186 jobs (47 per cent) provided by the manufacturing sector. These industries have also exhibited the fastest rate of growth of employment in recent years. Between 1978 and 1981 employment levels grew on average by nearly 14 per cent per annum.

Industries associated with wood and metal fabrication employed almost 23 per cent of overall manufacturing employment in 1983. The average rate of employment growth in these industries between 1978 and 1981 was only 4.7 per cent per annum, while the corresponding rate for the basic metal industries was 7.7 per cent. The former was adversely affected by the 7 per cent decline in employment between 1980 and 1981.

Table 2.2. Manufacturing value added, 1975-84
(in millions of Kina at current prices)

Year	Total manufacturing	Food products	Textiles & leather	Wood, wood products	Paper and printing	Chemicals	Non-metallic minerals	Metal-based manufacturing	Others	Total manufacturing growth rate (per cent)
1975	80,290	24,019	733	11,650	2,992	3,308	1,119	33,692	4,138	27.88
1976	102,680	36,657	838	12,357	5,643	6,050	1,704	35,939	5,058	32.56
1977	136,110	58,302	889	16,403	6,345	10,936	1,719	40,744	4,929	1.51
1978	138,160	66,446	1,130	22,905	6,913	6,867	5,887	26,320	2,132	6.57
1979	147,240	64,830	1,063	25,569	7,169	5,800	7,305	34,561	3,188	27.07
1980	187,840	75,359	1,315	40,409	7,584	5,818	7,559	46,446	3,345	0.14
1981	188,100	82,914	1,404	34,771	8,721	7,529	8,305	41,009	3,434	5.70
1982	198,990	87,616	1,486	36,785	9,226	7,945	8,786	43,383	3,643	11.15
1983	221,180	97,495	1,651	40,886	10,255	8,782	9,766	48,221	4,050	9.53
1984	242,250	104,783	1,809	44,780	11,232	9,696	10,696	52,817	4,436	

Source: UNIDO data base.

Table 2.3. Number of factories, number of persons employed and salaries and wages paid, by industry group, 1983

PWC SIC Code	Industry	Factories	Persons employed ^{a/}			Salaries and wages ^{b/}		
			Persons	Males	Females	Persons	Males	Females
			number			K'000		
	ALL INDUSTRIES	718	28,694	26,933	1,761	112,363	107,421	4,942
3	Manufacturing industries	452	22,186	20,638	1,548	83,663	79,734	3,928
31	Food, beverages and tobacco	150	10,445	9,610	835	30,926	29,436	1,490
32	Textile, wearing apparel and leather industries	12	349	93	256	905	329	575
33	Timber and wood products, including furniture	101	5,161	5,005	106	14,113	13,818	295
34	Paper and paper products; printing and publishing	26	1,027	907	120	4,093	3,633	459
35	Chemicals and chemical, petroleum, coal, rubber and plastic products	21	472	426	46	2,252	2,097	156
36	Non-metallic mineral products, except products of petroleum and coal	18	549	528	21	2,489	2,325	164
37-39	Basic metal industries; fabricated metal products, machinery and equipment; other manufacturing	124	4,183	4,019	164	28,885	28,095	790
	Factories and workshops in other industries	266	6,508	6,295	213	28,700	27,685	1,013
4	Electricity, gas and water ^{c/}	30	513	513	...	3,595	3,595	...
5	Construction	70	2,370	2,315	55	10,248	9,995	252
6	Wholesale and retail trade, and restaurants and hotels	116	1,745	1,654	91	8,015	7,486	529
7	Transport, storage and communication	32	1,119	1,107	12	4,045	4,001	43
9	Community, social and personal services	9	113	94	19	573	509	64
1, 2 & 8	All other industries ^{d/}	9	648	612	36	2,224	2,099	125

Source: National Statistical Office, Secondary Industries - Preliminary Statement, December 1983.

a/ Average weekly employment over the whole year. Includes working proprietors.

b/ Excluding drawings of working proprietors.

c/ Electricity generating establishments.

d/ Includes four establishments in Mining and quarrying (PWC SIC code 2), three establishments in Financing, insurance, real estate and business services (PWC SIC code 8) and two establishments in Agriculture, hunting, forestry and fishing (PWC SIC code 1).

In the other subsectors, the average rate of employment growth over the same period was consistently positive except in the textile and leather industries where employment levels declined significantly in both 1980 and 1981. The fastest average annual rate of growth of employment at 10.8 per cent was in non-metallic mineral products. By 1983 the paper and publishing industry employed just over 1,000 persons. The chemicals sector remained exceedingly small and provided only some 472 jobs in 1983.

Table 2.3 shows that manufacturing employment in total has grown quite rapidly between 1978 and 1981 at around 9 per cent per annum. This is almost double the 4-5 per cent rate of increase in annual employment that has been achieved by the formal sector as a whole.

Nevertheless, it is important not to exaggerate manufacturing's potential contribution to employment in Papua New Guinea. In 1980 manufacturing and utilities accounted for about 10.8 per cent of the total formal sector employment of nationals. The latter stood at about 200,000 people. Between 1976 and 1980, national employment levels in the formal sector grew by 5.2 per cent a year. The corresponding figure for employment growth in manufacturing and utilities was 8.1 per cent per annum. However, this seemingly impressive performance represented only some 1,400 new jobs per year. It is, therefore, clear that even on highly optimistic assumptions the sector could only make a tiny contribution to the 40,000 jobs required annually by new entrants into the active labour force.

Finally, some mention should be made of more recent trends in employment in the manufacturing sector. The preceding discussion has been restricted by the availability of data on the situation pertaining to the years up to 1981. Although economic growth had by this time begun to slow markedly, employment levels in manufacturing appear to have remained buoyant. However, there is some evidence to suggest that between mid-1981 and mid-1982 employment in manufacturing may have actually declined. For example, Table 2.4 presents the quarterly employment indices for selected sub-sectors. Although these are by no means comprehensive figures, and cover only some 30 per cent of private sector enterprises, the downward trends revealed in drinks and tobacco, until September 1982, and fluctuating trends in steel and engineering seem to support the possibility of an overall decline in manufacturing employment.

Further support is provided by a separate survey of 214 private sector employers which concluded that between June 1981 and March 1982 employment in manufacturing declined by 6.5 per cent. The December 1983 employment indices show an improvement in employment creation in the selected sub-sectors of manufacturing.

Table 2.4. Quarterly employment indices in selected manufacturing sub-sectors, 1981-83

		Drinks and tobacco	Steel and engineering
1981	March	140.9	150.3
	June	131.8	143.8
	September	129.9	136.4
	December	119.7	115.5
1982	March	118.6	125.6
	June	110.0	117.9
	September	107.3	117.6
	December	121.5	109.5
1983	March	129.7	108.2
	June	128.9	110.4
	September	133.6	110.6
	December	153.3	113.2

Source: Bank of Papua New Guinea Employment Indices published in Quarterly Economic Bulletin, various issues.

Note: Base March 1978 = 100; covers about 30 per cent of all private sector enterprises.

Manufacturing employment grew faster than manufacturing value added and productivity levels consequently declined. Table 2.5 presents estimates of labour productivity and of the share of value added in gross output at the branch level over the period 1978-80. It can be seen that for the manufacturing branches, shown in Table 2.5, aggregate labour productivity declined by about 4 per cent over this period. The fall was most marked in the case of food products where productivity levels fell by almost 40 per cent. The paper products branch also registered a decline. On the other hand productivity increased significantly for the chemical, woods and metal based branches. The wood and metal products branches also experienced a rapid

increase in the value added to gross output ratio. Overall, however, this ratio declined by about 12 per cent over this period indicating that industrial costs rose substantially. Once again the food products branch was most seriously affected - value added declined by as much as 33 per cent in this case.

Table 2.5. Output ratio in selected sub-sectors of manufacturing, 1978-80

	Value added ratio ^{a/}			Productivity ratio ^{b/}		
	1978	1979	1980	1978	1979	1980
Food products	45.5	30.2	30.0	16,360	10,700	10,290
Textiles & leather	53.3	50.5	59.0	2,985	3,514	5,058
Wood	50.3	52.4	58.5	5,087	5,176	7,108
Paper	54.8	47.8	47.4	5,934	6,494	6,841
Chemicals	60.4	52.9	52.7	22,413	19,566	27,335
Non-metallics	54.6	52.9	50.0	12,240	11,128	13,933
Metal band products	40.1	40.7	45.8	8,001	7,009	9,624
Total manufacturing	45.7	37.5	39.8	9,508	8,013	9,219

Source: Official National Statistics.

a/ Value added to output (in percentages).

b/ Value added to total employment (K'000).

2.2.4 Manufacturing trade

All manufacturing branches are essentially domestic demand oriented. In 1983, the latest year for which data is available manufactures accounted for only 4.8 per cent of total exports. Copra oil and wood products (plywood, chopsticks, woodchips and veneer) accounted for 94 per cent of these manufactured exports.

It is also important to appreciate the manufacturing sector's reliance on imported inputs. Although recent data is lacking, figures presented in the Government's White Paper on Industrial Development indicate that in 1976-77 imported inputs comprised more than 70 per cent of the intermediate products

used in manufacturing industry. This, of course, suggests weak linkages with other domestic sectors. The share of manufactured imports has, however, fallen in recent years.

Papua New Guinea's main exports consist of minerals (particularly copper and gold) and agricultural production (coffee and cocoa). Local processing of these commodities can be advantageous, but will not reduce the vulnerability of the domestic economy to movements in international commodity prices. Moreover, expansion of exports depends crucially upon successful negotiations opening up markets in the EEC, Australia and Japan, which together account for about two-thirds of the total exports from Papua New Guinea. Although some progress has been made particularly with the signing of the Lomé III agreement in 1985, increasing access to these markets will not be an easy task.

2.2.5 Size, distribution and ownership patterns

In 1981 there were 484 factories in manufacturing, employing a little over 21,000 people. Figures available for both 1979 and 1980 show that more than two-thirds of all employment in the manufacturing sector was provided in approximately 100 factories employing at least 51 persons each. Government involvement in the manufacturing sector is rather marginal. In 1980, government factories accounted for a little under 10 per cent of total employment and less than 5 per cent of value added. Private capital expenditure on manufacturing was around K24.5 million, accounting for 9.8 per cent of total private capital expenditure on industry group in 1984.

The largest concentration of manufacturing enterprises is to be found in Port Moresby, with Lae running a close second. Figures show that in 1980 there were 170 factories in the National Capital District employing a total of 6,046 people. The figures for Morobe Province are 145 factories and 5,554 employees.

2.2.6 Recent trends and developments

The manufacturing sector has grown more rapidly than most other sectors in the post independence period. Real MVA growth has substantially exceeded GDP growth throughout the 1970-81 period. The average growth rate for the

1981-84 period has been relatively modest. The 1985 budget included measures to stimulate import substitution. The general import levy has been raised from 3.5 to 4.0 per cent. Legislation has been formulated to encourage private industrial investment, however, new taxes are likely to be levied on management fees paid to foreign firms by firms operating in Papua New Guinea. Export growth is being encouraged and sales promotion drives in the fields of clothing, craft products furniture, timber, jewellery, confectionary and beer have been launched in the Australian market. If satisfactory progress can be made in the completion of the OK Tedi project developments (the completion date originally agreed upon was March 1989), there is likely to be a significant increase in the production of copper- and gold-based manufactured products in the medium run. The Government has taken a series of policy initiatives to stimulate industrial growth. These are reviewed in the next chapter.

2.3 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

2.3.1 Goals of industrial policy

In 1972, the Government formulated the following overall development objectives:

- rapid increase in the proportion of the economy under the control of Papua New Guinea nationals;
- a more equitable distribution of economic benefits;
- decentralization of economic activity, planning and government spending;
- emphasis on small-scale, artisan, service and business activity;
- the development of a self-reliant economy, less dependence on imported goods and services so that the economy is better able to meet the needs of its people through local production;
- increasing capacity to meet government spending needs from domestically raised revenue; and
- government involvement to be limited in those sectors of the economy where control is necessary to achieve the objectives outlined above.

Since independence the Government of Papua New Guinea has concentrated on establishing policies to promote economic stability as a prerequisite for investment and growth. A series of large, natural resource-based projects have been used to generate revenues for programmes aimed at a more equal distribution of economic benefits and at self-reliance. However, the move to increase national control of the economy has limited the use of expatriate expertise and capital outside the enclave projects. Decentralization has also increased the size of the public sector although it may well at the local level. Trade policies have been open and liberal. There has been no explicit policy to use trade measures to promote local industries although some protective tariffs have been granted on an ad hoc basis. Government interventions in industry have been fairly limited and relatively few are offered to foreign investors.

Industrial policies have been presented in a 'Framework for industrial development' issued in 1975, a 'National Development Strategy' 1976 and in the 1984 White Paper on Industrial Development. Industrial development has been given secondary importance to agricultural and rural development, and development creation, impact on government revenues, and balance-of-payments effects. In 1983, this overall strategy was extended to include criteria of decentralized location of industry, use of locally produced inputs, potential for fostering linked industries and skills and possibilities for export.

The Government of Papua New Guinea holds to the belief that no industrial growth is possible without a climate of careful economic management. The aim therefore has been to create a package of incentives which will lead to the development of a suitable environment and ensure increasing participation by nationals. For this reason particular importance has been attached to small enterprise development although this is primarily a responsibility of provincial governments. It is intended to encourage the establishment of small modern factories and traditional, rural industries, based on simple technologies together with an informal sector primarily providing service functions associated with manufacturing because of the relative 'ease of entry' for nationals. Government purchasing policy has been reorganized to give preference to locally manufactured products and it is proposed to provide a supporting technical extension service for small enterprises.

2.3.2 Policy measures and instruments

Government spending in Papua New Guinea is structured within the context of a National Public Expenditure Plan (NPEP) on a four year rolling basis. This, however, covers 25 per cent of the budget only. The allocation of funds by strategic objective focuses attention on national priorities and avoids the perpetuation of existing patterns of expenditure. However, the decentralization of administrative, financial and legal powers to the provincial level has increased the need for planning, budgetting and enhanced implementation capabilities at both national and provincial levels. The NPEP allocates funds among nine strategic objectives, e.g. production, welfare and administration; projects prepared by departments are then assigned to these objectives and a selection for funding is made by a committee of senior public servants. In addition sectoral programmes channel funds to the provincial level but these suffer from a lack of ceilings, neglect of recurrent expenditures and inadequate policy formulations.

A package of incentives for small-scale industries has been introduced at the national level. This includes tax rebates for infant industries in proportion to wage costs (to reduce labour costs in start-up situations), flexible depreciation allowances, export incentives, import controls on 'competitive' products, taxation incentives associated with training and transport costs and marketing/promotional costs.

2.3.3 Institutional framework

In 1983 the Department of Industrial Development was created as the chief industrial promotion agency and point of contact for potential investors. The Department's capabilities include project identification and analysis, market analysis, opportunity studies, project profile preparation and pre-investment studies; assessment of manpower, finance and technology requirements, identification of entrepreneurs and provision of assistance in project formulation are also within its responsibilities. The Department is the co-ordinating agency within government for all matters concerning the development of secondary industries.

The National Investment and Development Agency, created in 1974, functioned as an industrial promotion agency and regulator of foreign investment in Papua New Guinea. Its role is now confined to dealing with foreign investment proposals.

An Industrial Assistance Board is to be established as a specialist advisory body in industry assistance matters apropos protection to manufacturing and infant industries, tariff and other forms of protection from import competition and market disruption through dumping.

An Industry Advisory Council is to be established to provide a forum for Government and the private sector to discuss manufacturing policy issues, production and cost patterns, trends of development and change, overall performance of the manufacturing sector and its interface with other sectors.

The 1984 White Paper announced that the Government, in co-ordination with the provincial Governments, will establish a technical-cum-business extension system to provide advice to small-scale and rural industries. The skills of the existing Business Development Officers (BDOs) at the provincial level, who provide business and accounting advice to small businessmen, will be improved through additional training and/or the deployment of technical advisers at the provincial level. At the national level, technical specialists will be available to assist BDOs.

2.4 RESOURCES FOR INDUSTRIAL DEVELOPMENT

2.4.1 Human resources

In Papua New Guinea about 15 per cent of the 1.1 million economically active population are formally employed. The public sector is the largest employer, with plantations being the second largest. Skill shortages exist at all levels and in all sectors in Papua New Guinea and are a serious obstacle to development. The shortage of trained manpower reduces the level and quality of government services, weakens the management of industrial enterprises, limits the expansion of production and accounts for the continuing need to use expatriate manpower. Currently the ratio of skilled to unskilled workers is well below the national average in primary industry, manufacturing, building and construction.

Migration is a significant feature of Papua New Guinea's population distribution. Three hundred and ninety-five thousand people presently reside in urban areas, (approximately 13 per cent of the total as against 6 per cent in 1966). The urban proportion is expected to reach 17 per cent by 1990. The creation of new urban centres, land shortages, the large urban-rural wage gap, and the rapid normalization of sex ratios in urban areas will all combine to keep the urban population growth rate above that for the population as a whole in the foreseeable future.

The urban labour force is expected to grow by 4.8 per cent per annum in the 1980s if current growth rates continue, implying an additional 6,000 per annum. The 1971 Census revealed that less than 30 per cent of the population above 10 years were in the monetized workforce. Total identifiable formal employment in 1979 was 165,000 (15 per cent of the economically active population). The public sector was the largest employer (30 per cent), followed by plantations (28 per cent), finance, trade and services (20 per cent), with building and construction fluctuating widely.

Minimum wages were first introduced in Papua New Guinea in 1945 with far-reaching effects. The high levels of both rural and urban minimum wages compared to other developing countries discourage manufacture for export and encourages the substitution of capital for labour. There is also a large gap between urban and rural rates which encourages rural-urban migration.

2.4.2 Agricultural raw materials

Papua New Guinea has large resources of land for agricultural expansion on both large scale or small holder basis. Expansion and diversification of crops is likely to make import substitution possible to a very large extent and to generate export crops. Within this agro-base there are substantial opportunities for processing of primary commodities and for manufacturing based on locally grown raw materials.

Papua New Guinea's forest resources provide a wide range of opportunities for the production of timber and products as well as linked manufacture of wood-based consumer items. Papua New Guinea's animal resources have similarly a largely unexploited potential both for domestic and export

markets. It has been estimated that Papua New Guinea's fishery resources may have a potential as large as 500,000 tons per annum. While the better prospects exist for export of frozen fish, the planned development of coastal fisheries should give rise to a complex fishing and processing sector with associated support and servicing activities.

2.4.3 Minerals

Papua New Guinea's mineral resources have made a considerable contribution to the country's development through a small number of large enclave projects. The full variety of Papua New Guinea's resources however has scarcely been surveyed. Possibilities exist for a number of metals including chromium, nickel, lead, zinc, iron and titanium, aluminium, manganese, silver and mercury, as well as industrial minerals such as rhinestone, pumice, silica, asbestos, sulphur, graphite and phosphates. While many of the resources will await exploitation for the long term, the potential for associated and supporting industrial activities is very large.

During 1984, the production of copper - the country's leading minerals export - declined. Production at Bougainville Copper Ltd. amounted to 133,000 tons in the January-September 1984 period, a 5.2 per cent drop compared with the same period to 1983. Production of silver also dropped by some 5 per cent, when looking at the same periods. Bougainville Copper produced 164,447 tons of copper concentrates in 1984, as compared with 183,191 tons in 1983, a drop of some 10 per cent. Gold production in 1984 was 15.7 tons, as compared with more than 18 tons in 1983, most of it coming from the Bougainville mine. Production was affected by a strike in the second-half of 1984. The difficulties which led to the closure of the OK Tedi mines in February 1985 are also likely to have depressed mineral output during that year.

In addition to known mineral resources, high-grade gold deposits have been discovered in the Porgera area, Enga province. The new gold deposits has a much higher gold content than the known deposit at that location - averages at two drill locations were 32.7 and 38.9 grams per ton, and exploration and assessment are still continuing.

2.4.4 Energy

A number of petroleum gas and oil discoveries have been made in Papua New Guinea including two with commercially exploitable reserves. The exploitation of these resources would reduce the present dependence on imported fuels and lubricants.

The Government offers a number of incentives to potential operators who will explore and exploit oil reserves, and its energy programme is supported by the World Bank and OPEC.

Agreements for oil exploration were signed in 1976 with major US oil companies. Under these the Government was to receive between 60 and 80 per cent of revenues. Moreover, there was to be a 1.25 per cent royalty on the value of production at wellhead, a petroleum income tax rate of 50 per cent of taxable income and an additional profits tax on net cash receipts of 50 per cent.

The first commercially exploitable oil field was discovered in the border area of the Southern Highlands and the Western provinces. Negotiations on the further development of this area have taken place with a consortium of oil companies.

2.4.5 Finance

Thus far the financing of Papua New Guinea's major natural resource-based projects has not been achieved at the expense of other domestic projects, since major projects have been funded through direct foreign investment and overseas borrowing. Thus far borrowing needs and debt servicing requirements have remained at manageable levels. Nevertheless Government needs to increase the proportion of its revenues raised internally, not least because of the falling Australian aid transfers.

For national investors there are four programmes of assistance. The Papua New Guinea Development Bank is the most important agency; its lending totalled K21.4 million in 1980, but only 10 per cent of its portfolio has gone to industry. A Credit Guarantee Scheme has benefitted industry to the extent

of 9 per cent of its K3 million portfolio. The Village Economic Development Fund which is administered by provincial Governments has also financed some small enterprise development but its uses are largely unmonitored and unreported. The National Investors Scheme^{1/} which began in 1980 also provides financial assistance to new projects but thus far has focussed on agricultural and trading activities. A number of provincial development corporations were established in 1977-1979 with grants and loans from central Government and some are reported to have successfully promoted investment in some provinces. However, no details are available. Lastly, in 1972 the Investment Corporation of Papua New Guinea was established to mobilize savings and increase participation in foreign owned enterprise by share ownership. Its portfolio amounted to K27.6 million in 1980.

Papua New Guinea welcomes new business initiatives and investment from overseas.^{2/} All foreign investment must however be registered with the National Investment and Development Authority (NIDA), unless it is in an industry exempted from this requirement by the Government. NIDA distinguishes between "priority" and "open" activities, where foreign investment is permitted, and "reserved" activities which are open only to Papua New Guinea nationals.

The Department of Industrial Development will assist foreign investors in formulating applications to NIDA for registration and will actively expedite the decision.

Papua New Guinea has attempted to encourage the growth of foreign investment by offering the following financial incentives:

- free repatriation of profits;
- accelerated depreciation;
- writing off forward losses for two years;
- 200 per cent deductions for apprenticeship training;
- provision of infrastructure for user charges; and
- contributions to cost of feasibility studies.

1/ For details, see Appendix 2.A.

2/ Appendix 2.B presents industrial investment project proposals seeking foreign co-operation.

2.4.6 Technical assistance to industry

The manufacturing sector received only 9.1 per cent of commercial bank loans in 1984, and the industrial sector as a whole could obtain only K1.4 million out of the total K51.2 million sectional loan sanctioned by the PNG Development Bank in 1984. The non-Australian development assistance was around K35.5 million in 1984. International assistance could be provided for training in project planning and industrial promotion and in industrial management supervisory skills, particularly in medium- and small-scale manufacturing enterprises. The growth of such enterprises can make a significant contribution towards achieving a better integration of the manufacturing sector within the domestic economy and towards reducing its import dependence. International technical assistance can play a useful role in the design and implementation of industrial planning, surveys and policies in Papua New Guinea.

Finally, the Government has emphasized the need to reorient some manufacturing production towards exports and to increase industrial efficiency. Assistance could therefore be provided for identifying export potential, gathering relevant market information and developing the institutional and policy infrastructure necessary for sustaining a purposive and successful export drive in regional and international markets.

Appendix 2.A: National Investors Scheme^{a/}

Aim of the Scheme

The National Investors Scheme (NIS) has been specifically designed to assist Papua New Guinea Business groups wishing to initiate relatively large scale commercial projects. Because of the limited funds and a desire to encourage new investment, takeovers will only be eligible for the National Investors Scheme assistance if they have substantial new investment components.

The scheme recognizes that national investors wishing to initiate large projects (i.e. those with total project cost exceeding K100,000 and with an upper ceiling on loan funds of K200,000) face particular problems, such as the initial cost of proper feasibility studies, raising sufficient equity and loan finance and securing adequate management for the early years of the project. The scheme assists national investors in overcoming such problems by making funds available for feasibility studies, by lending to project companies on an unsecured basis in order to complement commercial financing, and by providing technical and financial advice on subjects such as management and how to approach banks for loan finance.

Who is eligible?

To be eligible for assistance under the scheme, an applicant must fall into one of the following three categories:

- (i) a company incorporated in Papua New Guinea with at least 74 per cent of its share capital held by Papua New Guineans;
- (ii) a business group comprising at least five people all of whom are citizens of Papua New Guinea; or
- (iii) an individual who is an automatic citizen of Papua New Guinea.

In addition, to be eligible for assistance under the scheme, an applicant must be able to make certain contributions to the cost of the project from his

^{a/} Reproduced from Government of Papua New Guinea, A Guide for the National Businessman, 1984, pp. 3-5.

Appendix 2.A (continued)

own resources. The scheme aims to provide financial assistance for those who need it most. Accordingly, where an applicant already has existing business interests the applicant will be required to make some contribution to the cost of a feasibility study. Where this is not the case, however, a feasibility study may be fully funded under the scheme.

At the project funding stage, the applicant will be required to make a minimum equity contribution of K10,000, or 5 per cent of the total project costs, whichever is the greater, in the form of cash or relevant project assets. In the case of an applicant who claims eligibility under category (iii) above, he will be required to make a minimum equity contribution of 20 per cent of the total project cost.

The actual equity contribution from the applicant in each particular case will exceed the required minimum according to the applicant's financial capacity to contribute to the project.

Which projects are eligible?

(i) Investment type

Any investment type is eligible for assistance under the scheme provided it is a new investment, or a significant upgrading of a small-scale investment, and provided the total project funding is expected to exceed K100,000. Investments below this figure should seek assistance under the Credit Guarantee Scheme. The "project company" must be a legally constituted corporate entity. Where a foreign party is to be involved in a formal management or technical assistance agreement, the foreign party will be permitted and encouraged to take up to 26 per cent of the total equity in the project company.

Takeovers of existing investments will be eligible for National Investors Scheme assistance as long as they have substantial new investment components.

Appendix 2.A (continued)

(ii) Commercial Bank Assessment

Project funding under the scheme will only be granted if a commercial bank, or the PNG Development Bank, indicates its willingness to fund at least 50 per cent of the total project cost in the form of loan finance to the project company without a government guarantee over the loan.

This is the major condition that must be fulfilled before NIS Project funding can be finally approved. The objective is to ensure an independent commercial assessment of each project, and thus provide for the productive use of Government's limited financial resources.

Applications, although satisfying the various conditions for eligibility, may not receive assistance if the total funds requested exceed the budget allocation to the NIS for any particular year.

Accordingly, the budget allocations to the scheme will be made to stretch as far as possible for maximizing the contribution to project funds from other sources such as the applicant's own resources and commercial loans.

How the scheme works

Once an application for assistance is received by The Department of Industrial Development which co-ordinates all NIS applications, a sponsoring government department and associated contact will be appointed to liaise directly with the applicant in order to ensure the proposal is in an acceptable form for the NIS Committee's consideration. Where an application is eligible, this committee will make a recommendation to the Minister for Finance, who gives the final authorization for funds to be allocated.

(i) Feasibility study funding assistance

Applicants are reminded of the need for fully researched and documented proposals. If in doubt about the need for a full feasibility study,

Appendix 2.A (continued)

applicants are advised to liaise with their sponsoring department, or directly with a firm of chartered accountants.

The Minister will convey his decision on whether such assistance is to be granted, and if so, to what amount, within six weeks of the date the co-ordinating committee received the application or of the date it received any requested further information.

Once a decision is taken to allocate NIS feasibility study funds to the project, the co-ordinating committee, in close consultation with the applicant, shall select appropriate consultants and shall draw up precise terms of reference for the feasibility study. Where NIS funds are allocated to a particular feasibility study these funds will be disbursed directly to the consultant group on the understanding that, should the project proceed, the project company will assume liability for the repayment of the loan funds. At the conclusion of the study, the selected consultants will submit their report on the feasibility of the project to the NIS co-ordinating committee. If in fact the project does not proceed, then the feasibility study report shall become the property of the National Government.

(ii) Project funding assistance

If the applicant has a fully researched proposal, either as a result of an independent appraisal, or from the formal feasibility study funded under the scheme (see (i) above) then application for "project funding" assistance may be made under the scheme.

Along with this, there is a strong emphasis that only applicants who have demonstrated a sound management track record can be qualified for funding under the National Investors Scheme.

Ideally, a bank's forms, indicative of its willingness to finance at least 50 per cent of the total project cost on an unguaranteed basis should be forwarded with the application.

Appendix 2.A (continued)

If this is not available in the first instance, then the NIS Committee and the relevant sponsoring department will actively assist applicants in securing commercial loan finance for approved projects.

Again, within six weeks of the date of receipt of the application, or of the date of receipt of requested additional information, the Minister for Finance will convey to the applicant his decision on whether "project funding" assistance is to be granted and if so to what extent and under what terms and conditions. Such conditions may include a recommendation that the commercial bank fund greater than 50 per cent of total project cost.

This "project funding" assistance is, therefore, an unsecured loan to the project company which will rank behind commercial loan finance in terms of debt servicing. The precise terms and conditions of this loan will vary somewhat in each particular case. A number of general provisions, however, will always apply. The interest rate will be two percentage points below the Papua New Guinea Banking Corporation prime lending rates.

Where a company would like to borrow again from a commercial bank but the National Investors Scheme loan is still outstanding, the repayment schedule for the National Investor Scheme loan must not be amended. Interest subsidy on the National Investor Scheme loan ceases and reverts to the commercial rate as soon as the commercial loan has been fully repaid (with interest).

Where the project company includes a foreign equity partner, such partner will usually be required to extend a "shareholder's" loan to the project company in parallel to the NIS project loan. This shareholder's loan shall be in proportion to the foreign party's equity position, and on terms and conditions no more onerous than the NIS project loan. Repayment of the shareholder's loan shall proceed in parallel with repayment of the NIS project loan. Interest on the NIS 'project loan' will be capitalized in any period in which it is not paid.

How to apply

Application for assistance under the NIS must be made to:

The Chairman
N.I.S Co-ordinating Committee
C/- Department of Industrial Development
P O Wards Strip
WAIGANI

Appendix 2.B: Industrial investment project proposals, ^{a/} 1984

ISIC	Project Number	Project Title
2903 3121	001/V/84-05	Solar salt plant
3111 3231	002/V/84-05	Meat processing
3114	003/V/84-05	Dried and frozen sea cucumber
3121	004/V/84-05	Soluble coffee
3212	005/V/84-05	Jute sacks for coffee beans
3212 3214	006/V/84-08	Hand woven rugs and bags
3220 3233 3240	007/V/84-05	Footwear and other leather products
3311	008/V/84-05	Sawn timber and timber products
3412 3419 3420 3560	009/V/84-09	Packaging materials
3560	010/V/84-06	Plastic household utensils
3819	011/V/84-06	Aluminium and stainless steel domestic utensils
3819	012/V/84-06	Production of pillar taps, cocks and valves
3829	013/V/84-06	Domestic refrigerators
3839	014/V/84-06	Dry cell batteries
3841	015/V/84-05	Shipbuilding and repair
3843	016/V/84-06	Automobile filters
3843	017/V/84-06	Automobile silencers and mufflers
3819 3823	018/V/84-06	Common industrial services centre
3111	019/V/84-09	Beef production

Appendix 2.B (continued)

ISIC	Project Number	Project Title
3113	020/V/84-09	Mango juice
1302 3114	021/V/84-09	Aquaculture
3211	026/V/84-09	Textile printing
3233	027/V/84-09	Sports and travel bags
3233 3240	028/V/84-09	Footwear and leather articles
3320	029/V/84-09	Wooden furniture
3419	030/V/84-09	Paper products
3691	031/V/84-09	Facing bricks and floor and roofing tiles
3710	032/V/84-09	Foundry for grinding balls
3511 3720	033/V/84-09	Copper smelting and refining
3811	034/V/84-09	Agricultural hand tools

a/ This list includes industrial projects in Papua New Guinea for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 2.C: The technical co-operation projects of UNIDO

PAPUA NEW GUINEA

1. The completed projects since 1972

<u>Division/Section (Spec.Act.Code)</u>	<u>Project Number</u>	<u>Project Title</u>
IO/PLAN (31.2.C)	SI/PNG/79/803	Industrial incentive study, preparatory assistance
IO/INFR (31.4.01)	RP/PAP/73/001	Small-scale industries promotion
IO/INFR (31.4.03)	DP/PAP/73/012	Fact-finding tour of small business and industrial development
IO/INFR (31.4.04)	DP/PAP/73/020	Small industrial development survey
IO/INFR (31.3.D)	SI/PNG/78/801	Consultant on the manufacture of rubberized coir mattresses
IO/INFR (31.3.L)	DP/PNG/74/039	Preparatory assistance to the small-scale industry development programme
IO/INFR (31.3.L)	SI/PNG/79/805	Consultant for the development of industrial estates programmes
IO/TRNG (31.5.00)	DP/PAP/69/002	Indigenous entrepreneurship
IO/TRNG (31.5.8)	RP/PNG/76/004	Promotion of small-scale industry
IO/TRNG (31.5.B)	SI/PNG/77/801	Technical co-operation among developing countries; visit to the Republic of Korea, attendance at the International Small Business Symposium and observation tour
IO/TRNG (31.5.B)	RP/PNG/79/001	Training programme in the field of silk weaving in Thailand
IO/TRNG (31.5.B)	SI/PNG/79/801	Training programme in furniture industry
IO/FEAS (31.6.B)	TS/PNG/77/001	Feasibility study on the development of the handloom industry
IO/AGRO (30.6.01)	RP/PAP/73/003	Silk culture
IO/AGRO (30.6.01)	RP/PAP/74/003	Silk culture
IO/AGRO (31.7.A)	DP/PNG/78/053	Assistance to the secondary wood processing industry

Appendix 2.C (continued)

Division/Section (Spec.Act.Code)	Project Number	Project Title
IO/AGRO (31.7.A)	SI/PNG/79/808	Assistance to the secondary wood processing industry
IO/AGRO (31.7.B)	SI/PNG/79/807	Garment industry consultant
IO/AGRO (31.7.C)	SI/PNG/84/801	Assistance for meat cannery
IO/AGRO (31.7.D)	DP/PNG/79/028	TSR (technically specified rubber) adviser
IO/AGRO (31.7.D)	TS/PNG/76/0C3	Exploratory mission to assess the leather and leather product industries
IO/MET (31.8.D)	DP/PNG/79/004	Foundry development, preparatory assistance
IO/ENG (31.9.B)	DP/PNG/79/010	Manufacture of agricultural tools
IO/CHEM (30.5.02)	DU/PNG/74/035	High altitude crop study (Executing agency: FAO)
IO/CHEM (32.1.A)	IS/PNG/75/010	Cement industry
IO/CHEM (32.1.A)	TS/PNG/76/002	Establishment of national cement industry
IO/CHEM (32.1.B)	SI/PNG/79/804	Assistance in small-scale ceramics manufacture, exploratory mission
IO/CHEM (32.1.B)	DP/PNG/80/001	Development of small-scale ceramics manufacture in Rabaul
IO/CHEM (32.1.C)	DP/PNG/79/012	Alcohol production from Nipa palm
IO/CHEM (32.1.C)	DP/PNG/80/006	Advisory services on charcoal production
IO/CHEM (32.1.C)	SI/PNG/79/806	Assistance in charcoal production
IO/CHEM (32.1.C)	SI/PNG/78/802	Development of solar salt production
IO/CHEM (32.1.C)	TS/PNG/76/005	Assistance in solar salt production
IS/SEC (62.3.A)	RP/PNG/76/001	UNEP/UNIDO: Workshop on appropriate technology

Appendix 2.C (continued)

Division/Section (Spec. Act. Code)	Project Number	Project Title
<u>2. The ongoing projects</u>		
IO/PLAN (31.2.A)	SI/PNG/85/801	Assistance to the Department of Industrial Development (DID) for re-organization
IO/TRNG (31.5.B)	XP/PNG/86/078	Training on promotion of small-scale enterprises in developing countries
IO/AGRO (31.7.A)	SI/PNG/86/801	Study tour by officials from Papua New Guinea to appraise UNIDO's wooden bridge system
IO/AGRO (31.7.D)	DU/PNG/78/005*	Rubber industry development

* Large-scale project (= total allotment \$150,000 or above).

** Total allotment \$1 million or above.

3. Projects in the pipe-line, 1986

(1) Development and preparation of small- and medium-scale projects.

The object of the project is to promote the development of small- and medium-scale commercial and industrial ventures in Papua New Guinea and to assist the Ministry of Commerce and Industry in the development of policies plans, project proposals in the industrial sector. The project is being formulated by the Government authorities.

(2) Assistance in the development of the wood-processing industry.

The object of the project is to advise the Government on technology for the production of low-cost wooden bridges in place of conventional steel bridges. In addition, advice will be given on improving the production techniques in joinery manufactures.

(3) Assistance in the development of resource-based industry in the highlands region.

The object of the project is to advise the Government on the policy and strategies that should be adopted by the Government for the industrial development of the area.

The Government wishes to use the resources available under the regional small industries project to obtain specific assistance in respect of the

following projects, with a view to improving the technical and productive capability in the industrial sector:

- (4) Village boat-building programme development.
- (5) Development of the cement industry.
- (6) Assessment of the potential for a pharmaceutical industry.
- (7) Development of a foundry industry.
- (8) Study on the prospects for manufacturing of agricultural hand tools.
- (9) Prefeasibility study for non-metal waste recycling.
- (10) Prefeasibility study for the manufacture of tractor steel products.
- (11) Provision of technical assistance to the furniture industry in quality control and the finishing of products.

- (12) Development of a standardization infrastructure.

Under this project, one staff member will be required to visit the country in connection with the formulation of the project.

- (13) Development of a garment industry exclusively for women.

The object of the project is to upgrade production techniques in the industrial and technical skills of the employees, to promote the development of the industries and also provide increased employment opportunities for the women of Papua New Guinea.

- (14) Provision of assistance to the Small-scale Industries Research and Development Centre, Port Moresby.

The object of the project is to enable the South Pacific Appropriate Technology Foundation to develop wood working, ceramic, footwear, and engineering industries for the rural areas.

- (15) Provision of assistance to the small-scale industry and entrepreneurial development centre, Lae.

The object of the project is similar to that of project No. (14). The project will be based at Lae, in the northern part of the country.

Appendix 2.D: Leading industrial companies, 1984
(all values in millions of US\$)

Rank	Company	Type of Business	Sales/ Turnover	Net profit (loss)	Employees	Total Assets
1	Bouganville Copper Ltd	Copper & gold	585	82.5	3,862	1,171.5
2	OK Tedi Mining Ltd	Copper & gold			4,000	2,000
3	Burns Philp	Trading	138.3	3.9	2,687	60.6
4	South Pacific Brewery	Beer	67.2		900	
5	Golling Co PNG Pty	Agriculture exports	59.7		1,972	
6	Boroko Motors	Auto sales	37.3		480	
7	PNG Petroleum Ltd	Petroleum				23.7
8	JANT pty Ltd	Property			457	8.55
9	New Guinea Marine Products	Fish			82	1.95

Source: South, June 1985.

3

FIJI

3. FIJI

3.1 THE ECONOMY OF FIJI

3.1.1 Recent economic trends

A sharp decline in commodity prices and unfavourable weather conditions resulted in a 1.7 per cent decline in the growth of real GDP in 1985. World prices of sugar, Fiji's principal export item, fell sharply in 1985. The price of coconut oil, Fiji's other major export, fell by about half in 1985 from its 1984 peak. Average prices of other exports, such as gold, fish and forestry products, dropped by about 10 per cent during 1985. To reverse the deteriorating trend in terms of trade, the Government has undertaken an adjustment programme that seems to set the stage for a resumption of growth.

Real per capita GDP (adjusted for the terms of trade) declined during 1981-84. The wage policy pursued until 1984 had an adverse impact on government finances through its effect on the wage and salary bill, which soared by 50 per cent. To contain the budget deficit, the Government accommodated the increase in the wage and salary bill by reducing investment outlays. Capital expenditure as a proportion of total expenditure fell from 27 per cent in 1982 to 13 per cent in 1984. However, the imposition of the wage freeze at the end of 1984 has helped reverse this trend, resulting in a 10 per cent decline in wage and salary expenditure in 1985. Current expenditure on repairing the damage caused by four cyclones that hit Fiji in 1985 increased sharply.

Fiji's Ninth Development Plan (1986-90) envisages an average annual growth of 5 per cent in real GDP. It also aims at maintaining financial stability and reducing the external account deficit in relation to GDP by nearly 1 per cent. The immediate outlook for economic growth depends on commodity prices and weather conditions. Fiji benefits from sharp declines in world oil prices and interest rates.

Fiji has for a number of years had a large deficit in merchandise trade, partly offset by a surplus from tourism services and by net transfers, including remittances from expatriate Fijians. From 1977 to 1979 these

surpluses covered 70 per cent of the trade deficit. In 1980 they covered less than 50 per cent. The gap was filled by net capital inflows, including some direct investment. In 1982-83 this situation continued with a small absolute decline in GDP as earnings from sugar, fish, coconut oil and timber all fell. In 1983 sugar output was again hit by bad weather with two hurricanes damaging almost half the sugar crop. Tourism was also in decline while industrial production was stagnant and government spending was restrained by fiscal and monetary caution. Only in 1984 did signs of recovery appear as sugar output and tourism grew and domestic economic activity expanded under government stimulus. Real GDP thus rose by 9.4 per cent in 1984 and was export led. Export growth was however impeded by the collapse of the International Sugar Agreement in 1984 and the consequent rapid fall in world sugar prices. However, real GDP declined by 1.7 per cent in 1985. Although Fiji is to an extent protected by long-term contracts, the average sugar export price has fallen some 25 per cent since 1980, and the reduction in export revenue can have serious implications for the development prospects of the manufacturing sector.

3.1.2 Economic structure

The population of Fiji was estimated at 700,000 in mid-1985, of which 63 per cent of the population lives in rural areas; 37 per cent, chiefly living in the Suva area, is urban or near urban. The population growth rate is high but decelerating. Overall density of population at 36 per sq. km. is low. Most land is customarily owned, but a high percentage is leased either to Indian tenant farmers or for large development schemes. Fiji is an archipelago of some 330 mainly volcanic islands. Only one-third of the islands is inhabited but a large proportion of the land, 56 per cent, is suitable for cultivation, mainly the coastal lowlands and river basins.

Services accounted for a considerable and growing percentage of GDP during the 1970s, reaching 60 per cent by 1980. Of these distribution services accounted for one-third; government, community and personal services another third; financial business services and transportation the final third. In contrast, productive sectors make up under 40 per cent of GDP. Agriculture, forestry and fisheries plus mining amount to 24.4 per cent; manufacturing 12.2 per cent. As half of the manufacturing output consists of

processed sugar, non-processing manufacturing amounts to only 6 per cent of GDP. It was the development of tourism in the 1970s which brought about the predominance of services contributing over half the total increase in real GDP over the period 1970-84. In contrast primary activities and processing contributed less than one-quarter of the increase in real GDP.

Table 3.1. Distribution of GDP by sector of origin, 1970-84
(in millions of Fijian \$ at constant 1977 prices and percentage shares)

Year		Agriculture, forestry, fishing	Mining quarrying	Manufac- turing	Electricity, gas, water, construction	Trade hotel and restaurant	Transport and communication	Other services	Total ^{a/}
1970	\$m	128.7	1.4	49.4	46.0	69.4	30.3	101.5	426.7
	per cent	30.2	0.3	11.6	10.8	16.3	7.1	23.8	100.0
1975	\$m	126.4	1.0	58.5	52.8	99.0	52.1	174.9	564.7
	per cent	22.4	0.2	10.4	9.3	17.5	9.2	31.0	100.0
1980	\$m	152.8	0.3	80.7	66.2	117.3	66.8	195.2	679.3
	per cent	22.5	0.1	11.9	9.7	17.3	9.8	28.7	100.0
1981	\$m	172.6	0.4	88.9	67.3	125.5	70.6	194.6	719.9
	per cent	24.0	0.1	12.4	9.3	17.4	9.8	27.0	100.0
1982	\$m	175.6	0.6	86.4	60.4	113.0	77.6	196.6	712.2
	per cent	24.7	0.1	12.1	8.5	15.9	10.9	27.9	100.0
1983	\$m	143.7	0.6	77.6	53.8	124.2	78.0	203.1	681.0
	per cent	21.1	0.1	11.4	7.9	18.2	11.5	29.8	100.0
1984	\$m	180.9	0.7	91.0	53.0	124.9	86.3	208.2	745.0
	per cent	24.3	0.1	12.2	7.1	16.8	11.6	27.9	100.0

Source: Fiji's Ninth Development Plan 1986-90.

a/ Totals subject to rounding error.

In spite of Fiji's abundant natural resources and favourable agricultural conditions, Fiji's agricultural export commodity base is very narrow, resting almost entirely on sugar. Furthermore Fiji's self-sufficiency ratio in food is surprisingly low, being in the 35-40 per cent range. Thus while the country's economic structure has progressively been diversified over the last two decades, the agricultural sector, potentially one of the most productive, has remained largely unchanged and undeveloped.

Fiji's forestry sector is undergoing something of a transformation. In addition to some small hardwood production in 1972 a major pine project was launched to produce quick growing softwood for domestic needs and for export. Thus far almost 32,000 ha out of 186,000 ha are under pine cultivation and in 1980 28,000 cu. m. were harvested, diminishing imports of sawn timber to negligible levels.

Fiji's fishing industry has also expanded rapidly since 1972, having become the third largest foreign exchange earner after sugar and gold. Tuna fishing and processing has become a significant employer and contributor to national output.

Table 3.2. Central government budget, 1982-86
(in millions of F\$, per cent of nominal GDP)

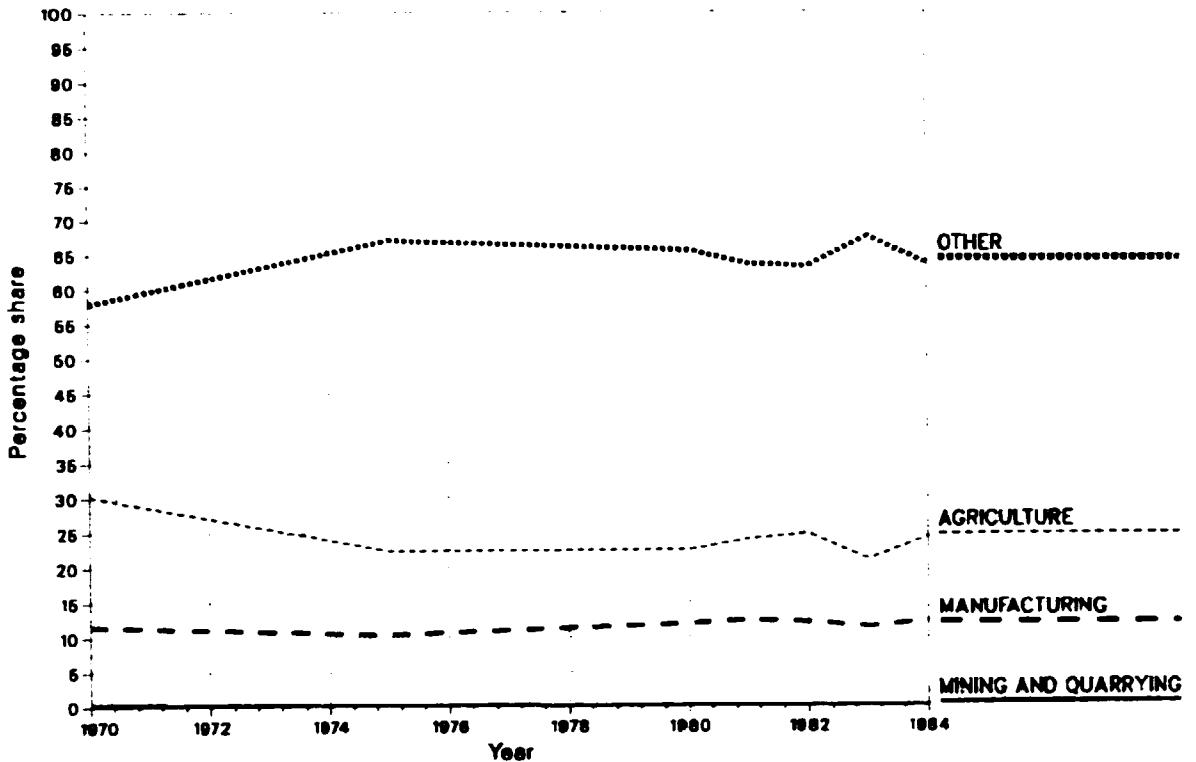
	1982	1983	1984	1985	1986 ^{a/}
<u>Revenue and grants</u>	<u>265</u>	<u>293</u>	<u>330</u>	<u>345</u>	<u>356</u>
Tax revenue	211	238	272	281	296
Nontax revenue	44	45	47	47	46
External grants	10	10	11	17	14
<u>Expenditure and net lending</u>	<u>338</u>	<u>337</u>	<u>375</u>	<u>389</u>	<u>406</u>
Current expenditure	247	280	324	320	326
Wages and salaries	134	150	175	170	171
Capital expenditure	79	50	49	62	68
Net lending	12	7	2	7	12
<u>Overall deficit</u>	<u>-73</u>	<u>-44</u>	<u>-44</u>	<u>-44</u>	<u>-50</u>
Bank financing	19	7	-2	3	...
<u>Revenue and grants</u>	<u>23.8</u>	<u>25.7</u>	<u>25.7</u>	<u>25.8</u>	<u>24.4</u>
Tax revenue	19.0	20.8	21.2	21.0	20.2
Nontax revenue	4.0	3.9	3.7	3.5	3.1
External grants	0.9	0.9	0.8	1.3	1.0
<u>Expenditure and net lending</u>	<u>30.4</u>	<u>29.5</u>	<u>29.2</u>	<u>29.1</u>	<u>27.8</u>
Current expenditure	22.2	24.5	25.3	23.9	22.3
Wages and salaries	12.0	13.1	13.7	12.7	11.7
Capital expenditure	7.1	4.4	3.8	4.7	4.7
Net lending	1.1	0.6	0.1	0.5	0.8
<u>Overall deficit</u>	<u>6.6</u>	<u>3.8</u>	<u>3.5</u>	<u>3.3</u>	<u>3.4</u>
Bank financing	0.7	0.6	-0.2	0.2	...

Source: IMF Survey, June 1986.

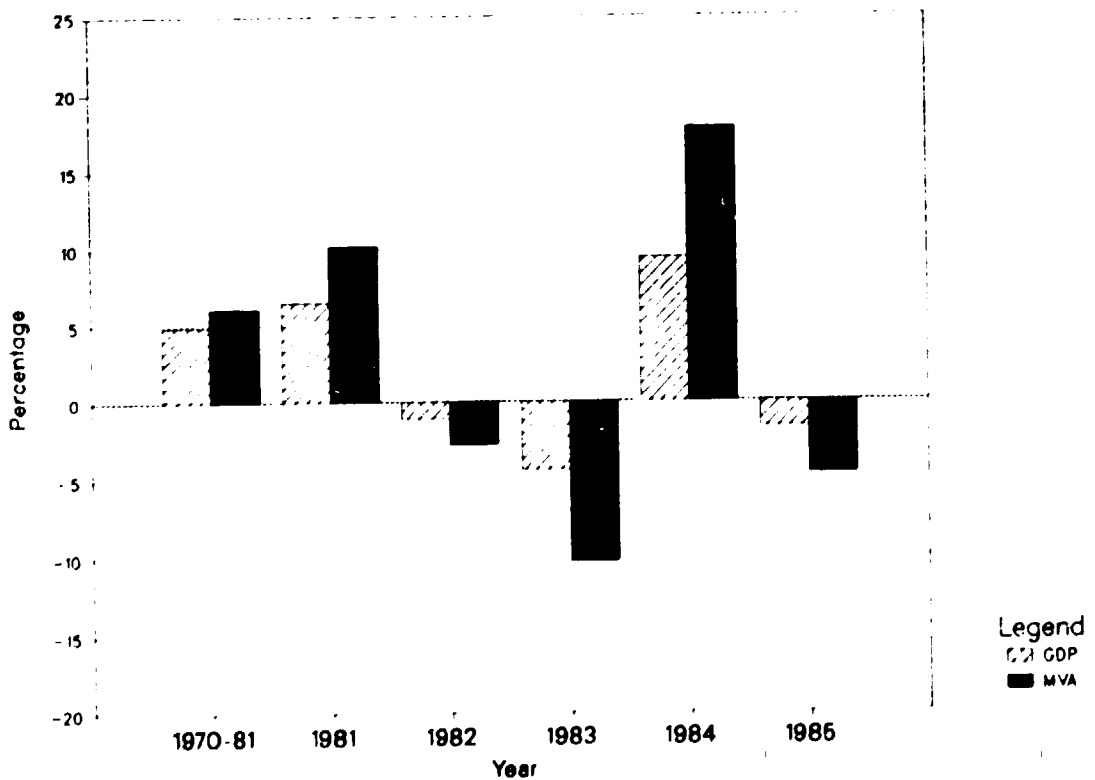
a/ Estimate.

MANUFACTURING TRENDS

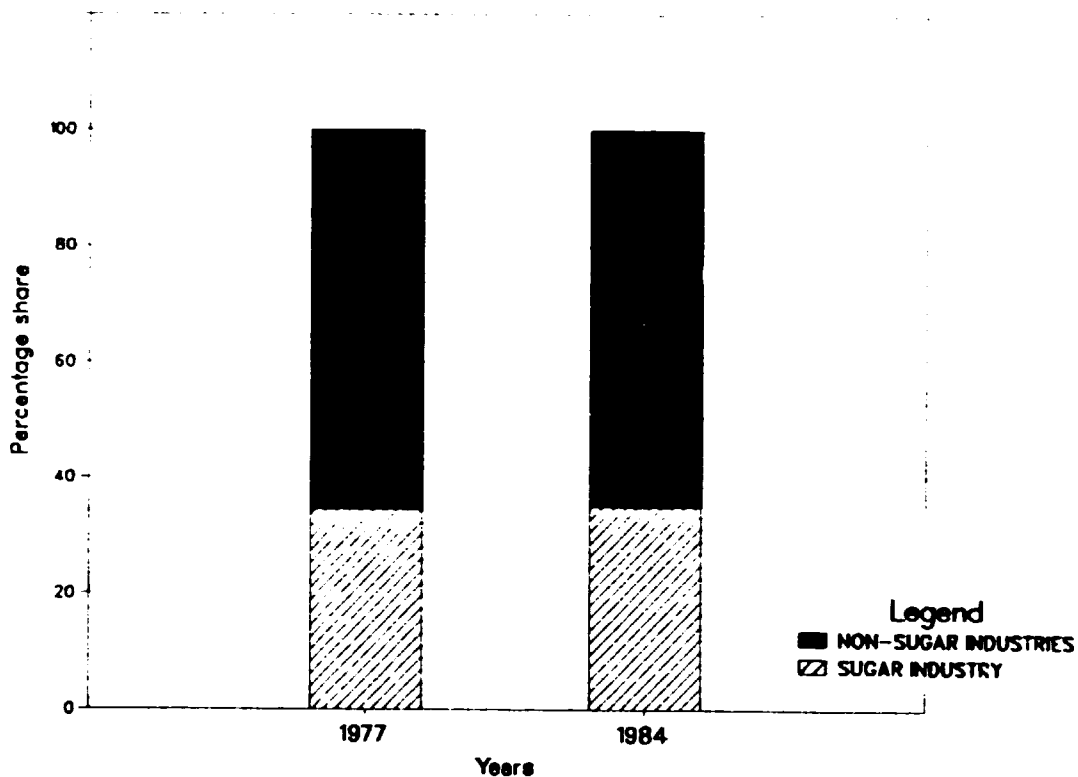
DISTRIBUTION OF GDP BY SECTOR OF RIGIN, 1970-1984 (in constant 1977 prices)



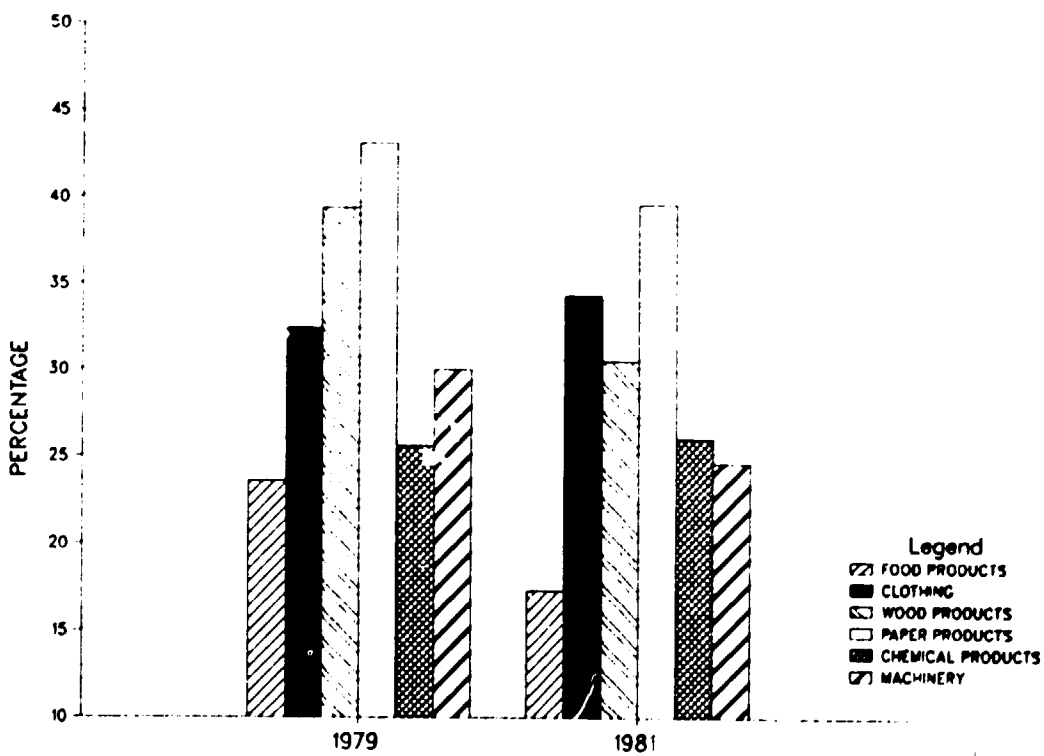
GROWTH OF REAL GDP AND MVA, 1970-1985



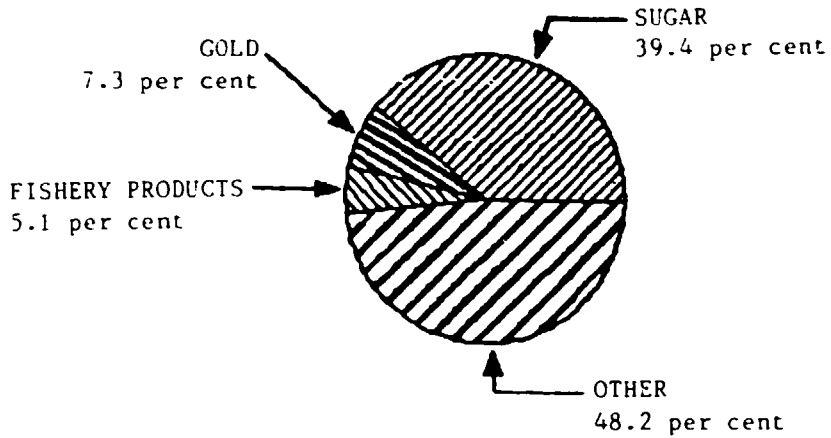
**SHARES OF SUGAR AND NON-SUGAR INDUSTRIES IN MVA, 1977 AND 1984
(in constant 1977 prices)**



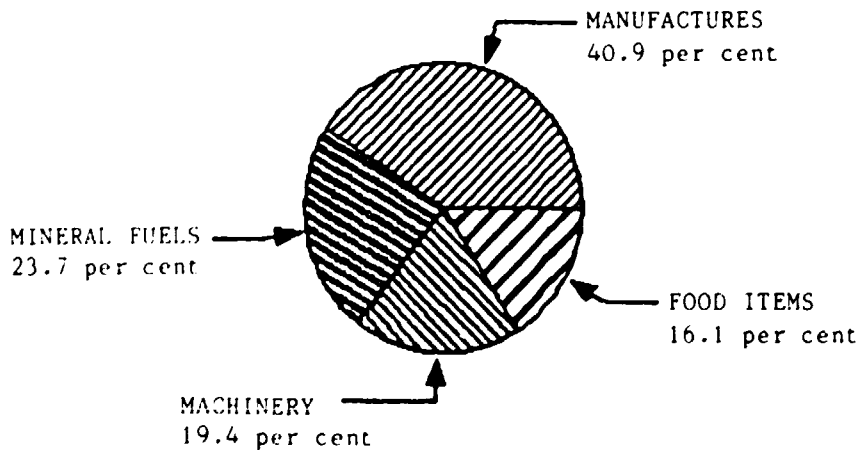
VALUE ADDED TO GROSS OUTPUT RATIO IN SELECTED INDUSTRIES, 1979 AND 1981



MAJOR COMPONENTS OF MERCHANDISE EXPORT EARNINGS, 1984



MAJOR COMPONENTS OF MERCHANDISE IMPORTS, 1984



3.2 STRUCTURE AND PERFORMANCE OF THE MANUFACTURING SECTOR

3.2.1 Overview of the manufacturing sector

In the early 1980s the manufacturing sector was estimated to have contributed 12 per cent of GDP at current prices. Two-thirds of this activity relates to food processing; sugar itself accounts for just under one-half. Fiji has perhaps the largest and most diversified manufacturing sector of all the South Pacific islands. Many of Fiji's manufacturing activities have emerged in response to government efforts to encourage import substitution and a broad range of activities now covers eight major subsectors, food, clothing and footwear, wood products, paper and printing, chemicals, non-metallic products, machinery and equipment, and miscellaneous. One consequence of the emphasis on import substitution, however, has been the increasing protection of the industrial producers to the point when their efficiency and competitiveness relative to international standards has deteriorated. It is revealing that over the last two decades - a period of considerable structural change within Fiji's economy - the share of manufacturing has remained largely unchanged at approximately 12 per cent of GDP. Production growth within manufacturing has not outpaced growth in other sectors of the economy.

Table 3.3. Physical output indices, value added and employment in manufacturing, 1977-84

	1977	1980	1981	1982	1983	1984
1. <u>Physical Output</u>						
Index of Industrial Production ^{a/} (1977=100)	100	116.3	128.6	125.5	109.8	132.4
Percentage change over previous year		-8.6	10.6	-2.4	-12.5	20.6
2. <u>Value Added (V.A.)^{b/}</u>						
Sugar (F\$m)	24.0	26.3	31.2	32.2	18.3	32.0
Non-sugar (F\$m)	45.4	54.4	57.7	54.3	59.3	59.4
Total (F\$m)	69.4	80.7	88.9	86.5	77.6	91.4
Percentage change over previous year		-8.0	10.2	-2.3	-10.3	17.8
Per cent of GDP	11.5	11.9	12.3	12.1	11.4	12.3
3. <u>Employment</u>						
Employment in sector	11,253	15,413	14,223	13,522	14,700	14,200
Per cent of total paid employment	15.5	19.2	17.5	17.3	18.3	18.1

Source: Fiji's Ninth Development Plan 1986-90.

a/ All items excluding gold, water and electricity.

b/ In 1977 constant prices.

3.2.2 Growth and performance

The broad spread of manufacturing activity in Fiji is evident from Table 3.4. The main products of the Fijian manufacturing sector include:

- matches, cartons, toilet rolls
- cans and various metal containers
- plastic pipes, bags and wrappings, moulded bottles, etc.
- metal kitchen utensils and containers
- motor repair
- wooden handles and other products
- bread, biscuits and confectionery
- tea, coffee, oils (repacking)
- ice-cream
- pulse milling, animal feeds.

One distinctive characteristic of manufacturing activities in Fiji is the lack of specialization in individual enterprises and the horizontal integration of production of related or similar items. For ethnic reasons and for lack of controls, excessive competition has developed, fragmenting production for a limited market and sacrificing any economies of scale. The protected market allows enterprises to profit from inflated prices. Under-utilized capacity is common in Fiji.

The manufacturing sector provides employment for 18 per cent of the wage earning workforce, approximately 14,200 in 1984. The more capital-intensive activities tend to be found in the food processing branch; clothing, sawmills, furniture production and printing are more labour intensive. Manufacturing value added has fluctuated considerably over the last decade, as can be seen in Tables 3.1 and 3.3. However, this is to a large extent a reflection of the ups and downs of the highly dominant sugar processing industry. Of the other subgroups, machinery and equipment has increased its share considerably. Clothing and footwear also grew significantly but from very low bases. With the exception of chemicals, the increase in value added slowed considerably in all product groups in the late 1970s. In part this resulted from the over-rapid growth in the early 1970s when the more profitable or more accessible processing and substitution opportunities were first exploited.

Table 3.4. Estimated gross output, intermediate consumption and value added of local industries, 1979-81
(excluding government industries)
(F\$ '000)

ISIC	INDUSTRY	GROSS OUTPUT			INTERMEDIATE CONSUMPTION			VALUE ADDED			COMPENSATION OF EMPLOYEES			CONSUMPTION OF FIXED CAPITAL			OPERATING SURPLUS		
		1979	1980	1981 ^{a/}	1979	1980	1981 ^{a/}	1979	1980	1981 ^{a/}	1979	1980	1981 ^{a/}	1979	1980	1981 ^{a/}	1979	1980	1981 ^{a/}
2	Mining and Quarrying	13,654	14,654	14,854	13,375	17,199	16,238	219	-2,545	618	6,091	7,597	6,223	319	415	527	-6,191	-10,547	-6,132
31	Food Manufacturing	255,079	300,928	295,668	194,765	235,227	239,467	60,314	65,701	57,201	20,603	23,748	22,761	4,451	5,731	6,230	35,260	36,222	28,210
32	Clothing and Footwear	6,767	5,222	7,564	4,575	3,362	4,964	2,192	1,860	2,600	1,098	907	1,247	127	140	151	967	813	1,202
33	Wood Products	19,819	29,526	28,931	12,010	19,379	20,995	7,809	10,147	8,836	4,780	5,726	6,978	1,278	1,831	1,294	1,751	2,590	564
34	Paper and Printing	12,875	17,366	17,223	7,324	10,769	10,199	5,551	6,597	7,074	3,293	4,304	4,618	382	499	424	1,876	1,714	1,982
35	Chemical Products	19,634	20,442	23,916	14,592	14,928	17,683	5,042	5,514	6,233	2,379	2,553	3,016	500	438	559	2,163	2,523	2,658
36	Non-Metallic Products	10,591	11,789	13,870	6,739	6,759	9,027	3,852	5,030	4,843	1,703	1,825	2,250	694	576	821	1,455	2,623	1,772
38	Machinery and Equipment	33,499	36,988	35,027	23,438	27,512	26,409	10,061	9,416	8,618	5,687	8,057	6,651	766	968	803	3,608	3918	1,164
39	Miscellaneous Products	1,363	1,517	3,209	1,051	1,138	2,437	322	379	772	267	287	260	31	76	61	24	16	451
3	TOTAL MANUFACTURING	359,627	423,778	425,408	264,484	319,134	329,281	95,143	104,644	96,127	39,810	47,487	47,781	8,229	10,259	10,343	47,104	46,898	38,003
4	Electricity, Gas & Water	27,518	39,872	49,367	16,684	25,103	29,389	10,834	14,769	19,978	4,361	4,814	7,210	3,361	4,335	12,055	3,112	5,620	713
2,3,4	GRAND TOTAL	600,799	678,304	691,631	274,544	361,436	374,908	106,256	116,868	116,723	50,262	59,888	61,214	11,969	15,009	22,925	44,025	41,971	32,584

Source: Bureau of Statistics, Reports on the Censuses of Industrial Production, various issues.

^a Projected.

Table 3.5. Manufacturing performance indicators, 1979-81
(percentage)

	<u>VA</u>		<u>Surplus</u>	
	<u>Output</u>		<u>Gross output</u>	
	1979	1981	1979	1981
Food	23.6	17.3	13.8	9.5
Clothing	32.4	34.3	14.3	15.8
Wood	39.4	30.5	8.8	2.0
Paper	43.1	39.6	14.6	11.1
Chemical	25.6	26.0	11.0	11.0
Non-metallic	36.3	35.0	13.7	12.7
Machinery	30.0	24.6	10.7	3.3
Miscellaneous	23.6	24.0	1.7	14.0
Total manufacture	26.4	22.5	13.1	8.9

Source: Bureau of Statistics, Reports on Industrial Production.

The food products (particularly the sugar processing) sector suffered a net decline in value added and operating profits during 1979-81. The machinery and equipment subsector suffered a larger decline in value added and surplus generated during this period. The predominant position of sugar manufacturing in Fijian manufacturing is reflected in the fact that despite high growth rates in value added registered by all the other branches, aggregate MVA growth was only 1 per cent during 1979-81. Value added growth had decelerated significantly in the wood products, non-metallics and paper products branches. During 1979-81 industrial costs rose rapidly. The value added to gross output ratio declined for five of the eight industrial branches - the fall again being most marked in the case of the food, wood products and machinery subsectors. The surplus to gross output ratio fell most drastically for wood products (from 8.8 to 2 per cent) and the machinery branch (from 10.7 to 3.3 per cent) over this period. The aggregate surplus ratio declined from 13.1 per cent to 8.9 per cent. Significantly high levels of surplus growth were recorded in the miscellaneous manufacturing, and also in clothing.

Development strategies for the industrial sector have in previous Plan periods focused on import substitution. Although most export products - sugar, coconut oil and gold - involve some processing, most industrial activity is thus import substitution oriented. Development programmes have stimulated the creation of a highly diversified manufacturing sector. Apart from sugar and coconut oil, a very wide range of food products industries may be found. The same goes for household products, and the printing and publishing, shipbuilding, agricultural machinery, metal working, electrical goods, wood and wood products, footwear and garment industries and traditional crafts are also represented. The GDP share of industry has stagnated around 12 per cent, and the value of manufacturing output has fluctuated sharply, but in most subsectors, a steady increase in value added may be noted. One major problem is the lack of linkages between industry and the primary sector, which partly explains the rather high import content of the manufacturing sector.

The number of large State industrial establishments in Fiji, both in terms of employment and output, is limited. Larger scale operations process coconuts, rice, pulses, and flour; dairy, fish canneries and fruit canneries, beer and cigarette manufacturers, sawmills, feed mills, scap and match factories also belong to the relatively large scale category.

Most industrial enterprises in Fiji are owned by traditional trading groups, especially the Indian and Chinese communities. This in part explains the horizontal integration or duplication of production. Native Fijians rarely figure in manufacturing ownership. Government equity participation in individual enterprises is seen as a form of trustee ownership for indigenous Fijians.

Since the majority of manufactured products in Fiji are consumer items, proximity to the main markets and ports has led to the concentration of enterprises in or near Suva and Lautoka. In part this has been influenced by the construction of industrial estates, in part also by the availability of services and utilities. A number of larger processing plants are located near raw material supplies.

3.2.3 Recent trends and developments within the manufacturing sector

The manufacturing sector recorded positive real growth rate during 1984. Extensive damage has however been caused by cyclones in 1985, particularly to the sugar industry. Real MVA declined by 4.7 per cent in 1985. The growth in industrial costs has been held in check by an agreement with the trade unions which froze wages for a 12-month period during 1984 and 1985. It was expected that after November 1985 wages will be index-linked to consumer prices and some indicator of economic and productivity growth. The manufacturing sector may also benefit from new incentives introduced to stimulate exports. Intra-Pacific exports are likely to be stimulated by the early establishment of a regional chamber of commerce and industry with headquarters in Vanuatu. The Government is also attempting to attract foreign investment within the manufacturing sector and negotiations are under way with Japanese officials.

The annual average rate of increase in the consumer price index fell to 5.3 per cent in 1984 from 6.8 per cent in 1983. In 1980 inflation had been running at almost 50 per cent. Although the trade deficit for 1984 was higher than that for 1983, some exports, particularly coconut oil, increased sharply. Gold output has increased and local shipbuilding has passed a landmark with the launching of the largest ship yet built in Fiji in December 1984. The Government has given priority to the reconstruction of the three sugar mills damaged by the 1985 cyclones. It is hoped that despite this set-back total sugar production will not fall during the present year.

The sustained fall in international sugar prices has induced the Government to increase the emphasis on diversification of the manufacturing sector. Industrial branches which employ relatively labour-intensive technologies of production are being encouraged in view of the rapid increase in the urban employment rate during the 1980s. There is also a need to reduce the import content of manufacturing units and to increase inter-industry linkages and linkages with other sectors.

3.2.4 Agro- and forest-industries - a sub-sectoral analysis

The agro- and forest-based industries currently account for roughly 60 per cent of MVA and little over half of total MVA. Notwithstanding the

fluctuations in international demand on prices, their products may be expected to continue playing a major role in Fijian exports. Both the unique natural conditions and the large stock of experience gathered in both agriculture and the agro-industries should continue to contribute to the outstanding quality of the products. Agro- and forest-based industries make an important contribution to rural employment and incomes. The industries in the sub-sector include:

- sugar;
- coconut oil and other edible oils;
- fruit processing;
- fish processing;
- dairy products; and
- forestry products.

Generally, capacity utilization is low, even though the number and size of plants is in most cases quite limited. Low productivity in the agricultural sector leads to raw material shortages. These problems are exacerbated by technological backwardness, and in many cases the agro-industry cannot meet domestic demand. Attempts to raise agricultural productivity by plantation-type operations have only had limited success. More attention would need to be paid to raising small-holder productivity through expanded extension services, marketing facilities and incentives for the producer. As to technology, many enterprises use second-hand, outdated machinery from developed countries. Although many entrepreneurs in developing countries have become masters in profitably operating such machinery, technological obsolescence can only damage the economy in the long run.

Export potential exists in a wide range of agro- and forest-based manufacturing branches. These include refined sugar, animal feed, coconut and other vegetable oil, meat products, processed fruit, shaped wood and furniture, veneer and plywood boards. The Government has formulated a wide ranging strategy for stimulating export growth and restructuring the manufacturing sector. This strategy is reviewed in the next chapter.

3.3 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

3.3.1 Goals of industrial policy

Fiji has consistent, clear and comprehensive policies and priorities in regard to industrial development and has developed an institutional framework to implement these. In all their Five-Year Plans since independence in 1970, diversification of the economy, self-reliance and promotion of employment through industrial development have been emphasized.

Fiji's contemporary major national objectives as incorporated in the Eighth Development Plan are:

- to strengthen and further diversify the economic base of the nation;
- to promote a more equitable distribution of the benefits of development;
- to ensure that the opportunity for productive and rewarding social or economic activity is available to the population;
- to increase self-reliance;
- to promote a greater sense of national unity within the framework of a multi-ethnic society; and
- to promote regional and international co-operation.

Fiji's Fifth Development Plan for the five years prior to independence represented a major shift in government attitudes, with growth as the major goal. Resource surveys and development projects aimed at opening new possibilities for growth in the economy in agriculture, forestry, fisheries and tourism. The Sixth (1970-75) Plan recognized growth as a necessary but not a sufficient condition for development. It sought to tackle urbanization problems by stimulating rural production and developing urban services. Specifically it sought to improve the distribution of incomes, achieve moderate per capita income growth, increase employment opportunities and promote development in a climate of political, economic and social stability within a regional Pacific context. The Seventh Plan (1975-80) aimed at reducing dependence on capital from foreign sources, maximizing the retention of earnings from tourism, and developing hydro-electric potential to reduce

dependence on imported fuels. It also sought to decentralize economic activity by location, broader ethnic participation in development and improvement of life in rural areas. Increased national self-reliance was a major objective. The Eighth Plan's (1980-85) basic strategy was one of considerable investment in increasing and diversifying primary sector output coupled with primary sector processing at a later stage. There was to be a reorientation of investment by region to ensure better distribution across the country. Fiji's Ninth Development Plan (1986-90) aims at achieving real GDP growth of 5 per cent a year. On the output side, emphasis is given to the growth of resource-based industries. The Plan retains the diversification and distribution objectives. Creating new employment opportunities is also an ongoing concern. Measures to increase financial stability as well as efficiency and competitiveness in the manufacturing sector are to help increase economic growth. Special attention will be given to cottage and small-scale industries. There is to be a shift from investment in infrastructural works to directly productive activities.

The objectives of Fiji's Ninth Development Plan are broadly expressed as to attain a dynamic growth oriented industrial structure; expand output, particularly for exports; increase efficiency and competitiveness; facilitate and encourage vigorous private sector; and create more skill-intensive jobs to fully exploit its human resources. Table 3.6 shows the projected sectoral growth rates set in the Ninth Development Plan ending 1990.

Within these planning frameworks the industrial sector was expected to help make optimal use of the available human and physical resources and to reduce income disparities. Initially industrial projects were chosen allowing only moderate economies of scale, and with modest export potential and capabilities of enhanced value added. Although import substitution was well developed by the time of the Sixth Plan it was not to be taken as far as full self-sufficiency - rather there would be a concentration on activities with export possibilities. In the Eighth Plan both export and import industries are encouraged with high priority to industries based on local primary commodities and the production of inputs required by primary and other sectors. Industries based on imported raw materials were to produce essential items for the domestic market and goods for export. Low priority is given to industries based on imported raw materials and producing non-essential items.

Table 3.6. Projected sectoral rate of growth in terms of gross value added at factor cost, 1985-90
(\$ Million, 1985 prices)

	Gross value added 1985	Gross value added 1990	Growth rate (per cent)
1. Agriculture, forestry, fishing			
1.1 Crops			
1.1.1 Sugar cane	51.6	74.2	7.5
1.1.2 Other crops	37.5	53.3	7.3
1.2 Livestock	13.7	17.4	4.9
1.3 Fishing	15.5	22.3	7.5
1.4 Forestry	11.2	16.7	8.4
1.5 Subsistence	72.4	80.0	2.0
2. Mining and quarrying	10.3	16.9	10.4
3. Manufacturing			
3.1 Sugar	25.1	36.7	7.9
3.2 Other food, drink and tobacco	48.2	67.4	6.9
3.3 Other manufacturing	75.4	96.5	5.0
4. Electricity, gas, water	24.4	31.9	5.5
5. Construction	90.2	115.7	5.1
6. Trade	229.2	293.2	5.0
7. Transport and communications	114.8	143.2	4.5
8. Finance, insurance and real estate and business services	94.2	129.5	6.6
9. Community and other services	328.3	390.2	3.5
Total	1,242.0	1,585.1	5.0

Source: Ninth Development Plan 1986-1990, p. 14.

Fiji's approach to the industrial sector has encompassed multiple objectives. Thus in the Eighth Plan the industrial sector was expected to keep in view the following objectives in addition to contributing significantly towards the growth of the economy:

- increase the employment absorptive capacity;
- promote more equitable distribution of the benefits of industrial development;

- expansion and diversification of export commodities;
- secure import substitution;
- encourage small- and medium-scale industries; and
- contribute significantly to regional development.

Such an impressive array of multiple objectives may be difficult to realize simultaneously within a five-year period. It is essential that a pragmatic priority ranking be established and adhered to in the formulation and implementation of operational policies within the industrial sector.

3.3.2 Policy measures and instruments

Fiji's post independence development plans show great consistency, reflecting the central aim of the Government to ensure a favourable investment climate for both domestic and overseas investors. To this end the Government sought to create an appropriate infrastructure, provide concessions to encourage new investments and to provide other forms of assistance to industry. In order to contribute to a favourable investment climate the Government placed no major restraints on repatriation of funds, maintained equitable taxation and allowed normal commercial operation of industrial activities. It also sought to maintain a stable political framework, improve the skills of the workforce, not to impede the use of expatriate labour and to provide reassurance against the threat of nationalization.

The concessions available to encourage investors were to have a finite duration. They included tariff concessions on imported plant, machinery and equipment, tariff concessions on imported raw materials, income tax concessions or accelerated depreciation, protection from imports by substantial tariffs or quotas, refund of excise tax paid on inputs for export goods. Extension services were conceived as a means of improving overall efficiency relating to technical matters, plant operations, labour and managerial matters, financial questions, marketing, etc. The nature and extent of assistance awarded to a project were intended to be determined by a comprehensive appraisal of contribution to national income, employment potential, interlinkage effects, contribution to long-term improvements in balance of payments, and the likely impact on domestic competition and price

levels. These policies have been maintained throughout the series of plans but the Seventh Plan showed awareness of the possible negative effects of concessions and the Eighth Plan criticized the incentives and their inefficient implementation as well as the lack of consideration to domestic value added, regional dispersal or increased local participation. The Ninth Plan stresses improved co-ordination of policy measures and increased efficiency while retaining the overall objectives of the previous plans.

3.3.3 Institutional framework

Applications for special concessions and incentives are made to a Business and Industrial Development Committee (BIDC) which provides 'one-stop' approval since it represents all the relevant ministries and departments: Commerce and Industry, Finance, Labour, Industrial Relations and Immigration, Lands and Mineral Resources, Agriculture and Fisheries, Urban Development, Housing and Social Welfare. The application takes the form of an investment appraisal. The approval mechanism is used to guide new investment towards areas thought to be beneficial to the country.

The Economic Development Board (EDB), with wide ranging tasks of an advisory and promotional nature, was formed in 1980. The EDB advises Government on possible locations for various types of industry, the need for government investment, promotes the development of industrial estates and promotes Fiji as a place of investment for overseas funds. It also acts as a facilitator in assisting investors deal with Government.

3.4 RESOURCES FOR INDUSTRIAL DEVELOPMENT

3.4.1 Labour

The labour force in Fiji expanded from 125,800 in 1966 to 175,800 in 1976, while unemployment (mainly in urban areas) increased from 5,200 to 11,300. Unemployment has risen rapidly during 1980-84. While the formal monetized economy employs an increasing proportion of the potential labour force, a considerable number work in the subsistence sector. Formal employment has grown with the expansion of the construction and tourism industries. The share of Fiji nationals in labour force has increased from

92.5 per cent in 1966 to 96 per cent in 1976 as a result of an actively pursued policy. Except for the construction industry, agriculture and primary industries are the most rapidly growing sectors in terms of employment and were expected to provide more than half the 30,000 new jobs to have been created from 1980-1985. These employment goals have however not been realized.

The increase in numbers of professional, technical and managerial workers was 2,600 from 1976-79; between 1976 and 1980 the number of workers with some tertiary education increased by 1,500, with secondary education by 8,100 and with primary education by 27,500. There is a shortage of skilled labour and experienced entrepreneurs in Fiji, although the high rate of literacy and the number of successful ventures point to the potential. The shortage arises from a number of factors; while technical and vocational training courses have expanded they have been often associated with secondary education and take-up has been limited. While basic manual skills can be taught on a full-time basis, further skills require a blend of practice and experience. Such activities are inextricably linked with private sector activities through apprenticeships or secondments. Some skills are scarce because of migration of better workers and reservation for opportunities in family concerns, preventing the flow of skills to new ventures. In addition, shortages exist in Fiji through overmanning and the multiplication of similar ventures all operating below capacity. Wages in Fiji are amongst the highest in the South Pacific as a result of minimum wage legislation and strongly unionized labour. The wage negotiated with the union for the period November 1984 to November 1985 may thus be an important contribution towards improving Fiji's industrial competitiveness in its major export markets.

3.4.2 Raw materials

Fiji's resource endowment in terms of agricultural potential is large but has not been fully developed. Fiji has gone further than most Pacific island countries in the identification of industrial opportunities based on domestic resources and in the development of several resources as inputs for processing activities is now being studied.

In the case of sugar-based activities the aim would be to diversify products using raw sugar as a resource to increase value added and insure

against price changes. With coconut products the overlap with other Pacific island countries is such as to create a need for some organized product differentiation and a common marketing policy. Cocoa, coffee, fruits, vegetables and spices all provide processing opportunities where supplies can be assured and products tailored to market opportunities. Root crops offer more limited prospects for processing; rice and tobacco may have greater potential. Fiji's livestock resources and by-products offer significant opportunities if market outlets can be expanded. There are also good opportunities for wood products especially as hardwoods can be substituted by local softwoods and utilized for higher value added products.

Fiji's fisheries offer considerable potential for preservation providing the marketing issues can be solved. While metal deposits must still be proven as commercially extractable and prospects are more doubtful, industrial minerals may well offer significant possibilities when integrated with processing operations.

Other industrial products may well be feasible depending on the level and nature of demand in Fiji's growing domestic market. Metal components, inputs into the fishing industry, including boats, and a limited number of consumer items deserve further attention.

3.4.3 Energy

Fiji has made substantial progress towards achieving self-sufficiency in energy with hydro-electric schemes, solar energy sources and biogas units in operation or under development. Imported petroleum now accounts for approximately half of the current energy consumption. Local production has risen considerably during 1983-84, reducing import costs. Energy policy in Fiji has been very effective and energy use has been economized. A large part of the demand is met by converting bagasse, a residue of sugarcane processing, into energy.

3.4.4 Finance

The full range of financial and business services is available in Fiji. The Central Monetary Authority controls the financial sector consisting of six

commercial banks. These banks tend to concentrate on working capital and trade financing. The Development Bank of Fiji (FDB) is the main vehicle for long-term financing, 5-7 years for machinery, 10-12 years for integrated plants. Some 15 per cent of lending has gone to the manufacturing sector and 11 per cent to commerce and tourism. FDB funds come from Government backed by bilateral aid, long-term loans from the National Provident Fund and credit lines from the major international institutions.

3.4.5 Role of technical assistance

Technical assistance extended to Fiji can contribute towards two major goals. First of all Fiji's emphasis on industrial diversification and import substitution has led to the growth of a system of regulations which requires streamlining and rationalization. It is generally recognized that industrial protection has impeded the growth of industrial efficiency. International assistance could therefore be provided to assist Fiji in developing a more effective industrial policy making structure capable of providing increasing domestic economy linkages and exploiting the country's international comparative advantages.

Secondly Fiji needs to rapidly increase manufactured exports. There exists a large and growing balance-of-payments deficit and terms of trade have deteriorated by almost 30 per cent over the period 1975-85, reflecting the collapse in international sugar prices. A recent UNIDO study^{1/} has identified the following branches, the export potential of which can be usefully explored by Fiji:

1. Garments, clothing, cotton fabrics and made textile fabrics
2. Toys, games and sports goods
3. Foot-wear
4. Leather
5. Travel goods, handbags
6. Lime, cement and building materials
7. Printed matter and stationery

1/ UNIDO, Fiji Industrial Strategy and Policies, DP/ID/SER A588, January 1984.

8. Medicinal and pharmaceutical products
9. Passive electrical and electronic components
10. Plastic products, tubes, pipes, etc.

In addition, a few future-oriented high value and low volume products also need to be thoroughly examined for promoting investment and production. These are:

1. Assembly of electronic components and sub-assemblies including television, radio sets and components
2. Clocks and watches
3. Medical instruments and sound recorders
4. Scientific measuring and optical instruments
5. Office machines, typewriters, calculators and micro-computers
6. Automobile parts such as antennas, piston rings and brake lining
7. Electrical lighting
8. Simple hand tools.

International assistance may be provided to conduct market surveys, design appropriate institutional support structures and provide relevant training and assistance to enterprises for production and export growth in these fields.

Appendix 3.A: Investing in Fiji

Basic principles

The Government of Fiji recognizes the vital role that private investment, from both local and foreign sources, can play in the country's future development, and aims to promote the growth of industry as one of the principal factors creating employment and wealth. Foreign capital, technology and managerial skills are expected to play a major role in such growth, and for this reason the Government is determined to improve the investment climate in Fiji for foreign investors, as well as for local entrepreneurs.

Thus no distinction is made between local and overseas investors in the award of investment incentives such as tax and import duty concessions, depreciation allowances, rebates on export earnings and import protection. The Government is particularly keen to encourage

- foreign investment in areas where the capital requirement is high and local technological and managerial skills are not yet available;
- joint ventures between local and foreign business interests, particularly where the overseas involvement may lead to the penetration or expansion of export markets.

For industrialization to conform with national economic goals, its development must be integrated with that of other sectors of the economy, and especially with agriculture, forestry and fisheries. To achieve such integrated development three priority levels for new industries have been established. Priority A is reserved for the processing of locally produced raw materials and commodities, priority B for the manufacture of goods for export and essential items for the domestic market, and priority C for other types of manufacture. The award of tax concessions and other incentives depends on the priority rating of the activity in question.

Foreign investment

Foreign investment is welcomed by the Government of Fiji, and particularly where it introduces technical, managerial and marketing expertise not otherwise available, and contributes to the Fijian economy in terms of

Appendix 3.A (continued)

employment and human resource development, the balance of payments, and the utilization of local raw materials.

Approval of overseas investment

Overseas investment requires approval by the Business and Industrial Development Committee of Fiji (BIDC), a straightforward procedure which normally takes no more than 4 weeks to complete. Fiji's Economic Development Board, which acts as the BIDC's secretariat, will give all necessary assistance in preparing the application and ensuring it is processed as quickly as possible.

Financing overseas investment

Generally speaking, foreign investors will be expected to finance investment in Fiji from overseas sources. Where there is a joint venture with local equity participation, an appropriate portion of the investment can be financed from local sources. Businesses that are controlled by non-residents are normally expected to have an initial debt-equity ratio of not more than 3:1.

Local borrowing by overseas investors

The policy on local currency borrowing by non-resident companies is flexible and depends on considerations such as whether the activities of the company will

- generate additional employment;
- increase export earnings;
- result in import substitution or other tangible economic benefits to Fiji.

Companies controlled by non-residents are normally permitted to borrow their working capital requirements locally.

Appendix 3.A (continued)

Repatriation of capital and profits

Repatriation of capital brought in from overseas and remittances in respect of profits, interest, royalties, trade debts, etc. are permitted, subject to tax clearances where appropriate.

Mergers and acquisitions

The Government regulates takeovers and mergers, i.e. cases where a foreign investor wishes to acquire more than 20 per cent of a Fiji company's share capital; applications are processed by the Reserve Bank of Fiji.

Employment of foreign personnel

Key positions may be filled by expatriate personnel without time limit. Other managerial and technical posts for which suitably qualified Fijians are not available may likewise be filled by expatriates. The investor is however expected to make arrangements to train local staff with the ultimate aim of phasing out the majority of expatriate personnel. Work permits are normally granted for an initial period of three years. Foreign investors willing to bring in assets of not less than F\$ 200,000 may be granted seven year permits.

Investment incentives

The Government affords equal treatment to local and overseas investors alike, offering a wide range of incentives aimed at assisting industries which are at the initial stage of development

Income tax concessions

A new industry may deduct F\$ 8,000 annually from its taxable profits for up to eight years from the commencement of production. Alternatively, a percentage of the enterprise's paid up equity capital or investment may be deducted from taxable profits. The maximum deduction is 25 per cent for a business employing more than 50 persons.

Appendix 3.A (continued)

The award of these concessions depends on the following factors: the industry's priority level, the extent of its utilization of local raw materials, its contribution to exports, the degree of import substitution, its effect on employment, the magnitude of local value added and finally the location and its contribution to development and revitalization of depressed areas.

Incentives for agro-industries

Such industries may select any five single years in their first 10 years of operation to qualify for total exemption from income tax. They may carry losses forward without time limit or may set them off against profits earned in other, non-exempt activities.

Accelerated depreciation

A company engaging in a new industry may claim a deduction of one-fifth of its depreciable capital expenditure on new buildings, plant and equipment in any five of the eight years from the date of the expenditure.

Export incentives

A repayment of tax chargeable on export earnings can be obtained. The size of the repayment depends on the local value added of the products exported, being half of the tax where the local value added is 30 per cent, and the full amount of tax where the local value added is more than 50 per cent. This incentive is available for a period of eight years, starting from the date of first exports. Additional tax relief is available to exporters of locally grown Fiji timber.

Other tax exemptions

The Government may waive or reduce dividend and interest withholding taxes if it decides such action will benefit the economy.

Appendix 3.A (continued)

Import duty concessions and protection

Import duties on plant and machinery and industrial raw materials are generally low or non-existent. Applications for further reduction will however be considered. The award of the concession depends on the extent of local processing, and on the contribution to exports and to local value added. Arrangements also exist for refunds of duty when imported goods, including raw materials, are re-exported.

Application for approval of projects and award of concessions

Applications for tax and other concessions, and for assistance with matters such as work permits, should be submitted to the Economic Development Board. For new projects the standard Project Appraisal Information Form available free of charge from EDB should be used.

Source: UNIDO, Basic Information for Participants in the Investors' Forum for the South Pacific Region, November 1984.

Appendix 3.B: Industrial investment project proposals, ^{a/} 1984

ISIC	Project Number	Project Title
1110 3113	004/V/84-04	Vegetable cultivation, processing and canning
3113	005/V/84-07	Processing of green ginger
3119 3121	006/V/84-04	Snack food and confectionery
3122	007/V/84-06	Cattle feed
3211	008/V/84-06	Woven labels
3212	009/V/84-06	Household linen
3233	010/V/84-04	Polyvinyl chloride and leather bags
3220 3240 3560	011/V/84-03	Leather footwear and other leather articles
3320	012/V/84-04	Wooden furniture
3411 3412	013/V/84-04	Paper and paperboard from waste paper
3839	014/V/84-06	Domestic electrical fittings
3610	015/V/84-03	Ceramic products
3692	016/V/84-04	Quicklime and hydrated lime
3819	017/V/84-04	Food cans
3821 3843	018/V/84-04	Automotive and industrial filters
3909	019/V/84-06	Acrylic buttons
3909	020/V/84-06	Plastic buttons
3311	021/V/84-04	Timber for low-cost housing
3119	025/V/84-10	Cocoa liqueur
3540	026/V/84-10	Recovery of used lubricating oil
3551	027/V/84-05	Rubber tubes for bicycles and motor vehicles

Appendix 2.B (continued)

ISIC	Project Number	Project Title
3811 3819 3821	028/V/84-10	Steel rolling mill
3819	029/V/84-10	Brass products
3841	030/V/84-10	Shipbuilding and repair
3115	034/V/84-11	Edible oil manufacture and packaging
3523	035/V/84-11	Soap manufacture
3851	036/V/84-11	Cotton wool manufacture
3851	037/V/84-11	Napkins and sanitary towels

a/ This list includes industrial projects in Fiji for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 3.C: The technical co-operation projects of UNIDO

FIJI

1. The completed projects since 1972

<u>Division/Section (Spec.Act.Code)</u>	<u>Project Number</u>	<u>Project Title</u>
PC/ECDC (30.9.2)	RP/FIJ/85/001	Participation at the 'Symposium for organizers of higher productivity', Seoul, Republic of Korea
IO/COOP (31.1.A)	UC/FIJ/78/182	Investment in Fiji
IO/PLAN (31.2.A)	SI/FIJ/75/805	Incentive measures for industrial development
IO/PLAN (31.2.A)	SI/FIJ/84/801	Review and formulation of industrial development strategy and policies
IO/INFR (31.3.L)	DP/FIJ/73/008	Industrial estates support services
IO/INFR (31.3.L)	DP/FIJ/80/010	Assistance to traditional rural artisan industries
IO/INFR (31.3.L)	DP/FIJ/80/002	Industrial promotion and development
IO/INFR (31.3.L)	DP/FIJ/80/003	Assistance to small-scale rural industry
IO/INFR (31.3.L)	TF/FIJ/78/002	Rural and urban industrial support services
IO/INFR (31.3.L)	TF/FIJ/79/001	Associate expert in industrial engineering in Kalabo (Mr. de Boer)
IO/INFR (31.3.L)	TF/FIJ/80/002	Associate expert for Nabouwalu (multifund to DP/FIJ/80/003)
IO/INFR (31.3.L)	TF/FIJ/81/001	Associate expert in industrial engineering for Nabouwalu (multifund to DP/FIJ/80/003)
IO/INFR (31.3.0)	DP/FIJ/80/013	Business opportunity and management advisory service (BOMAS)
IO/TRNG (31.5.B)	RP/FIJ/76/001	Industrial training
IO/TRNG (31.5.B)	RP/FIJ/77/001	Shipyard organization and management
IO/TRNG (31.5.B)	RP/FIJ/79/001	Fellowship in the field of promotion of small-scale enterprises in developing countries
IO/TRNG (31.5.B)	RP/FIJ/79/002	Fellowship in the field of general management

Appendix 3.C (continued)

Division/Section (Spec. Act. Code)	Project Number	Project Title
IO/TRNG (31.5.B)	RP/FIJ/80/001	Fellowships in small-scale industries
IO/TRNG (31.5.B)	RP/FIJ/82/001	Training in the promotion of small-scale enterprises in developing countries
IO/TRNG (31.5.B)	RP/FIJ/82/002	Training in ceramic technology
IO/FEAS (32.1.02)	RP/FIJ/68/003	Industrial programming
IO/FEAS (31.6.B)	TS/FIJ/80/001	Assistance to Ministry of Commerce and Industry on feasibility studies for export processing zone
IO/AGRO (30.6.02)	RP/FIJ/75/002	Food processing and technology
IO/AGRO (30.6.03)	IS/FIJ/75/010	Feasibility study on the establishment of a tannery
IO/AGRO (31.7.D)	DP/FIJ/71/506	Centre for leather training, development and promotion
IO/MET (00.0)	TS/FIJ/71/002	Metal working
IO/ENG (00.0)	DP/FIJ/70/003	Shipbuilding, repair and maintenance
IO/ENG (31.9.A)	SI/FIJ/81/801	Wood stove development
IO/ENG (31.9.D)	DP/FIJ/71/007	Shipyard manager (OPAS)
IO/ENG (31.9.D)	DP/FIJ/79/003	Assistance to the shipbuilding industry
IO/CHEM (30.3.01)	TS/FIJ/75/001	Preparatory assistance for discussion of cement project
IO/CHEM (30.4.00)	TS/FIJ/70/001	Assessment of solar salt industry sectors
IO/CHEM (32.1.B)	DP/FIJ/80/005	Development of ceramic industries
IO/CHEM (32.1.C)	SI/FIJ/79/801	Assistance in solar salt production

2. The ongoing projects

IO/AGRO (31.7.A)	SI/FIJ/86/801	Assessment on power generation in Labaza using bagasse and/or wastewood
------------------	---------------	---

* Large-scale project (= total allotment \$150,000 or above).

** Total allotment \$1 million or above.

Appendix 3.C (continued)

3. Projects in the pipe-line, 1986

(1) Development of a Production Efficiency Centre.

The objective of the project is to enable the Government to help bring about improvements in the economy, including human resource development at the operational and managerial levels. The project is being formulated by the Government authorities.

(2) Strengthening the organization and capabilities of the Fiji Development Bank in project preparation and evaluation.

The object of the project is to assist the Fiji Development Bank in developing its capabilities in project preparation, evaluation and financing. The project is being formulated by the Government authorities and the SIDFA.

(3) Advising the Government on improvement of the Kaleban CFD Workshop and other rural service centres.

The object of the project is to advise the Government on the improvement of the Kaleban CFD workshop and other rural service centres, in order to enable these centres to play a more meaningful and catalytic role in the development of Fijian rural areas.

(4) Advising the Government on the viability of bagasse and wastewood for power generation in Labasa and on the technology required for such a workshop.

(5) Visit of a UNIDO staff member to formulate a project for the establishment of an appropriate calibration laboratory standards and quality control unit.

(6) Setting up of a honey production unit for rural women.

Appendix 3.D: Leading industrial companies, 1984
(all values in millions of US\$)

Rank	Company	Type of Business	Sales/ Turnover	Net profit (loss)	Employees
1	Fiji Sugar Corp.	Sugar	111.9	3,500	
2	Fiji Pacific Fishing Co.	Canned fish	11.6	314	1.6
3	Fiji Motibhai & Co.	Trading	35 (est)		
4	Fiji Ika Corp.	Tuna fish	3.83	350	

Source: South, June 1985.

4

SOLOMON ISLANDS

4. SOLOMON ISLANDS

4.1 THE ECONOMY OF THE SOLOMON ISLANDS

4.1.1 Recent economic trends

Between 1978 and 1981 export volumes of primary commodities, with the exception of copra, were maintained or else grew slightly. A fall in copra production in 1980, falling commodity prices and the impact of the world recession caused a break in the previously steady pattern of growth in export receipts. Increased exploitation of forests and fisheries resources, a consequence of the Government's policy of export diversification, have contributed significantly to export growth. Forest reserves are now being commercially exploited at a rate of 300,000 cu. metres per annum with an increasing proportion of exports of rough wood and sawn timber. International participation in exploiting the 200-mile fishing zone offshore has greatly increased exports of frozen and canned fish, mostly tuna.

Rice and cocoa beans are new export crops and are making an increasing contribution. Against these slowly rising exports, the Solomons have experienced faster increases in imports, up by 24 per cent in 1980, including food and beverages, petroleum and machinery and transport equipment. The comparatively large, overall surpluses in the balance of payments between 1977 and 1979 (despite deficits for services) have given way to overall deficits and falls in official reserves. Restrictive fiscal and monetary policies inevitably followed in an attempt to restrain the drain on foreign exchange reserves, limit international public indebtedness and reduce domestic inflationary pressures. The net effect was to depress the economy to the extent of bringing about a real fall in GDP in 1982 of 1.7 per cent. 1983 saw some recovery with real growth in GDP of 3.2 per cent, a major part of which came from the fisheries sector with export volumes and values doubling, and also from exports of palm oil and kernels. As a consequence, business activity, consumer demand and investment recovered. The share of government spending in GDP remained static, helping to reduce inflation to 6.4 per cent from the 14 per cent experienced in 1980-1982. Continued expansion of export earnings in 1984, largely the result of improving copra prices and production, permitted some increases in development expenditures although inflation rose

to 10 per cent in 1984. Growth of real GDP in 1985 has been estimated at below the recent growth rate of 13.1 per cent achieved in 1984.

4.1.2 Economic structure

The total population at the last census in 1976 was 196,823 and was estimated in 1984 at 260,000, of which 94 per cent are Melanesians; other ethnic groups include Polynesians, Micronesians, Chinese and expatriate Europeans. Most of the population reside in small, widely dispersed settlements along the coasts. The Solomon Islands comprise a scattered Melanesian archipelago extending over 1,400 km from Bougainville to Vanuatu.

There are eight provincial governments. Decentralization has become a major preoccupation since independence but provincial bodies have a low share (10 per cent) in total public expenditure.

The Solomon Islands are predominantly agricultural. Primary production accounts for 70 per cent of GDP. The subsistence economy contributes 40 per cent of GDP with 90 per cent of households being engaged in subsistence food production to some extent. Sixty-six per cent of rural households are involved in growing coconuts which serves as a source of cash income as well as a major element of traditional diet. Smallholders (individually and on communal farms) produce some 70 per cent of total copra production. Smallholder output tends to fluctuate more than that from the plantation sector which is most important as a source of copra for export. Smallholders are increasingly participating in the production of beef, cocoa and spices. Development of this sub-sector is one major means of monetizing the economy.

Table 4.1 shows that the Solomon Islands have diversified production of primary commodities in the last decade, making the economy almost equally dependent on copra, fish and timber. This is a result of a government policy of heavily investing in logging, fishing and fish canning, palm oil and rice production in the early 1970s, when the rate of investment was 17-18 per cent of GDP. Since then the rate of investment has declined to less than 14 per cent. The monetary element of GDP has consistently grown faster than the subsistence element (15 per cent per annum as against 12 per cent). The primary sources of money incomes have been exports, followed by government

Table 4.1. Production of primary commodities, 1978-83

Commodity	Unit	1978	1979	1980	1981	1982	1983
Copra	metric tons	27,529	33,616	29,169	34,000	32,000	28,000
Fish	metric tons	17,453	23,804	22,755	25,000	21,000	39,000
Palm oil	metric tons	10,911	13,010	14,228	21,000 ^{a/}	23,000 ^{a/}	24,000 ^{a/}
Rice	metric tons	7,658	10,224	14,256	14,000	11,000	9,000
Cocoa	metric tons	235	309	346	592	668	1,115
Timber	cu.m	274,200	298,800	298,800	365,000	388,000	395,000

Source: ADB, Key Indicators of Developing Member Countries of ADB, various issues.

^{a/} Palm oil and kernel.

expenditures and investment. Government expenditures have in large measure been maintained with the help of foreign aid, which over the period 1970-77 have ranged up to 37 per cent of total government expenditures. Of late this share has tended to fall.

The subsistence sector has been able to grow sufficient food for a rapidly growing population. The 33 per cent expansion of crops for domestic consumption over the period 1970-78 reflects the availability of land rather than higher productivity. Over the same period food imports have declined from some 25 per cent of total imports in the 1960s to 16 per cent in 1978.

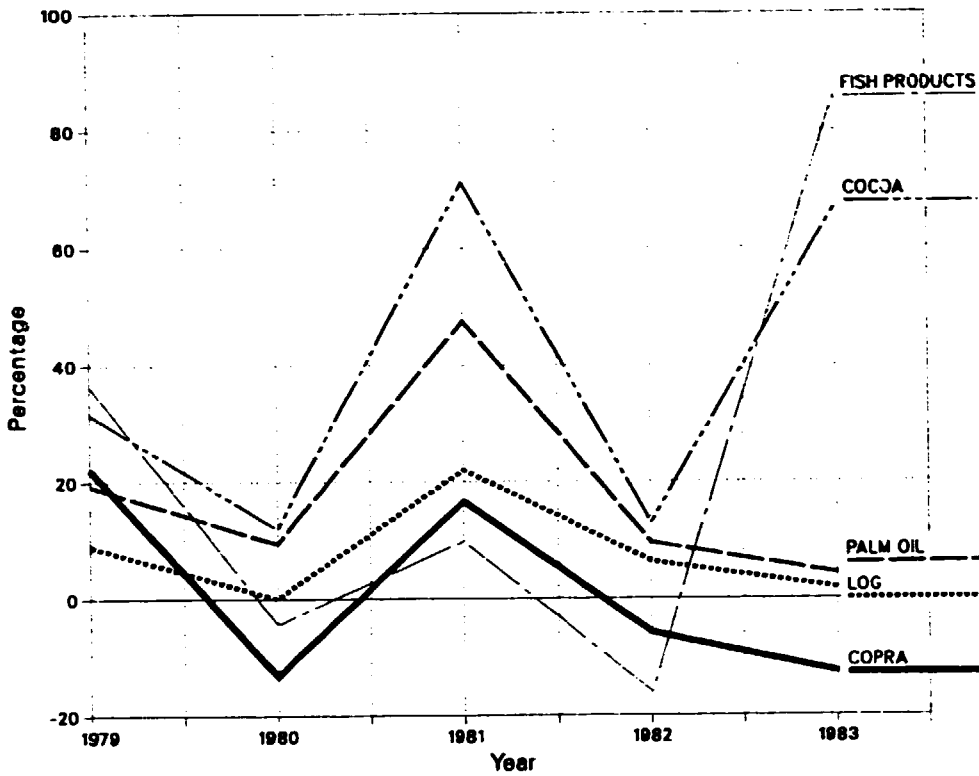
The growth of the manufacturing sector in the last decade has primarily taken place in agro- and resource-based activities, such as palm oil milling, rice milling, fish canning and sawmilling. These are in part export-oriented. Other types of food processing, handicrafts and the production of boats and furniture are largely oriented towards the domestic market and often use local raw materials.

Tourism is not as yet a significant activity in the Solomon Islands partly by design. Visitor arrivals, largely dependent on one-day stopovers by cruise ships operating in the Pacific, amounted to approximately 10,000 in 1979. As in all island economies, the service sector is more important than secondary activities. Transport and communications, trade (especially through co-operatives), finance and government services account for the second largest share of GDP.

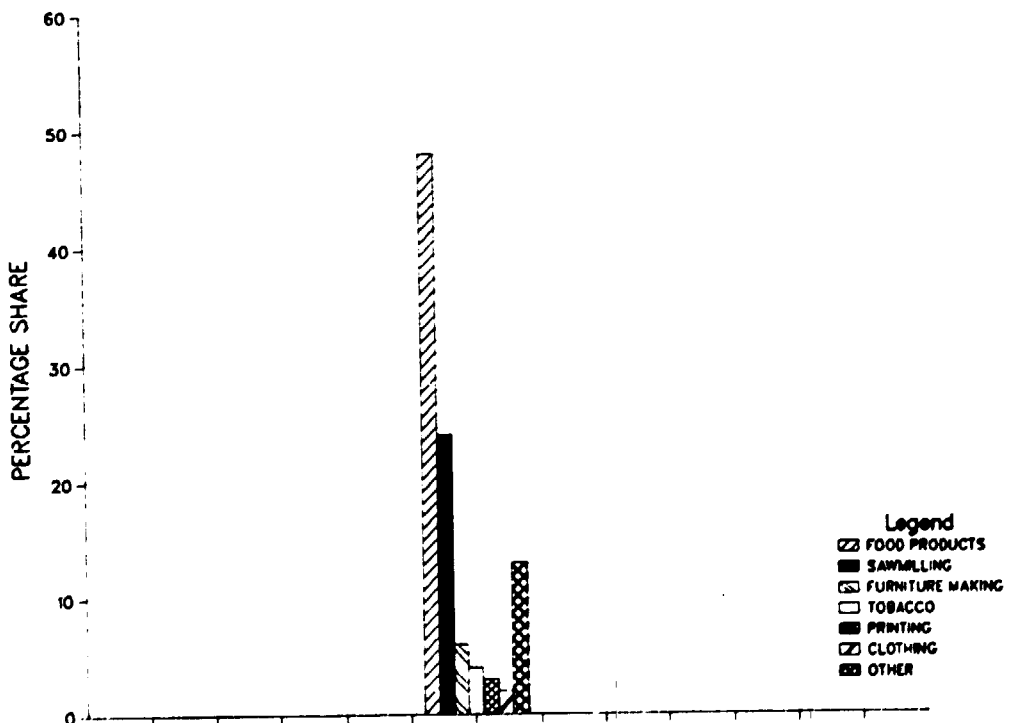
Large-scale expatriate or joint-venture companies with expatriate interests are mainly engaged in the exploitation of natural resources. Smaller expatriate investments are to be found in plantations, importing, distributing and retailing of consumer goods, shipping service industries and small-scale manufacturing or processing. The co-operative movement is under Solomon Islanders' control and is concerned principally with import distribution and retailing of consumer goods and the marketing of produce, chiefly in rural areas. Domestic entrepreneurs are mainly involved in trading consumer goods and increasingly in transport, building and contracting, buying and processing local produce, sawmilling and smaller fisheries.

MANUFACTURING TRENDS

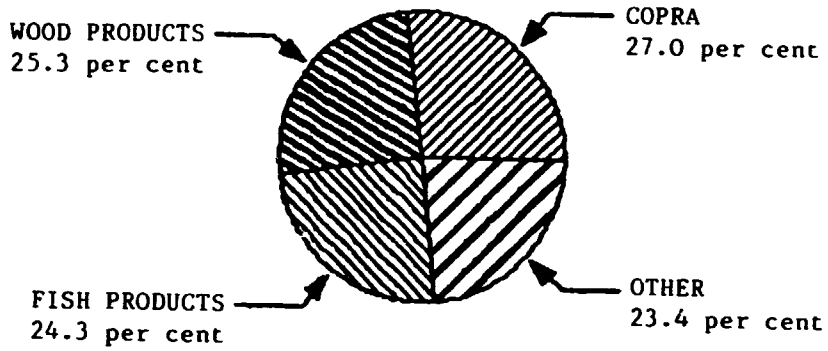
ANNUAL GROWTH RATES OF PHYSICAL OUTPUT, SELECTED COMMODITIES, 1979-1983



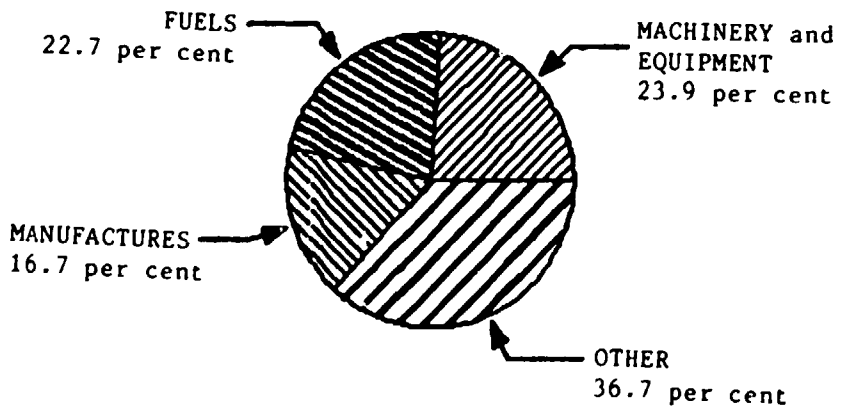
STRUCTURE OF MANUFACTURING EMPLOYMENT, 1980



COMPOSITION OF EXPORTS, 1984



COMPOSITION OF IMPORTS, 1984



4.2 OVERVIEW OF THE MANUFACTURING SECTOR

Growth of manufacturing activities, generally small-scale, has increased employment in this sector from about 650 in 1971 to 1,400 in 1977, some 8.5 per cent of paid employment. By 1980 some 200 enterprises provided employment for over 2,000. The only major factory in the Solomon Islands is the fish freezing, canning and smoking factory at Tulagi, operated under joint venture. Construction of another cannery is scheduled to start at Moro in 1986; it is expected to increase canned fish production by 300 per cent. The smaller enterprises produce furniture, boats, fiberglass products, costume jewellery, tobacco, foods and beverages, garments, wire products and soap. They also process primary commodities for export. There is some scope for further import-substitution activities provided production technologies can be adjusted to the limited size of the domestic market. Greater possibilities exist in producing resource-based consumer goods with low-level technologies. Most manufacturing enterprises are located in or near to Honiara including some 48 small enterprises at the Kukun Small Industry Centre. A breakdown of employment in the manufacturing sector in 1980 to be seen in Table 4.2 reveals

Table 4.2. Employment in the manufacturing sector, 1980

Sub-sector	Number employed	Share of total (per cent)
Food processing	989	48
Sawmilling	494	24
Furniture making	122	6
Tobacco	93	4
Printing	61	3
Clothing	50	2
Other industries	<u>271</u>	<u>13</u>
Total	2,080	

Source: ESCAP/ADB/SPEC, Industrial Survey of the Pacific, Country Report, The Solomon Islands, 1982.

that almost 50 per cent numbers employed were in food processing and a further 25 per cent in sawmilling. Furniture-making was the next largest source of employment.

In the rural economy there is a range of part-time or informal small-scale activities in such spheres as bakeries, carpentry, canoe building, copra and cocoa processing repair and servicing, gold mining. A well-developed segment of the handicraft sector caters to tourists and overseas markets.

4.3 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

4.3.1 Goals of industrial policy

Industrial policy has not been developed to any major extent in the Solomon Islands and specific guidelines for industrial development have not been prepared. A reorganization of Government in 1981 saw the incorporation of the former Ministry of Trade and Industry into the Ministry of Home Affairs and National Development.

The National Development Plan 1975-79 drawn up in anticipation of independence provided a five-year planning framework but contained no specific allocations or operational proposals. Its guiding principles were:

- decentralization (increased responsibility to provincial governments);
- promotion of self-reliance involving changes in the education system, a progressive reduction in dependence on foreign aid, import substitution policies, and broadening and strengthening the export base of the economy;
- equitable distribution of development;
- localization involving the replacement of expatriates by nationals at all levels of employment;
- local participation (special arrangements focussing development on locally owned businesses and co-operatives and on sectors which can be wholly or partly owned by Solomon Islanders);
- promotion and preservation of the domestic culture;
- regional co-operation vis-à-vis the rest of the world.

4.3.2 Policy measures and instruments

The 1981-84 Programme of Action replaced two unpublished development plans due to the change of Government. This emphasized devolution of decision-making, equitable distribution of development, increased economic productivity and redirection of programmes and policies better to serve the Solomon Islands' needs.

The 1979 Investment Guide had welcomed foreign investment, particularly in large-scale exploitations of natural resources and also for import substitution. However, the preference was for joint ventures. Some areas of investment were reserved for nationals, including road transport, marketing of primary commodities, wholesale and retail trading, service industries and small-scale fisheries. Government encouragement of manufacturing so far has taken three forms:

- fiscal incentives for selected enterprises, e.g. import duty concessions on capital goods and tax relief on profits;
- equity participation in large-scale projects through the Government Shareholding Agency; and
- limited additional lending to industry by the Solomon Islands Development Bank (which had invested more than SI\$ 23 million in various companies by the end of 1984).

Government holds shares in telecommunications, fisheries joint venture, palm oil plantations, rice plantations, transportation, hotels and local banks. Business is regulated by legislation on minimum wages and comprehensive price controls are designed to prevent monopoly positions being exploited and to reduce imported inflation.

4.4 RESOURCES FOR INDUSTRIAL DEVELOPMENT

4.4.1 Labour

The working population between 15 and 64 was estimated at 87,993 in 1976 and is projected at 116,180 for 1985. The 1976 workforce was 80,700, the great majority of these being employed in the non-wage sector. In total some 800 jobs per annum will be required to retain the proportion of wage-earning

employment in comparison to the estimated 600 jobs per annum created in the 1970s. The spread and increased awareness of the monetized economy are likely to increase demand for jobs above this level.

While localization has made some progress this has mainly been at lower levels with expatriates still holding higher or technical posts. A shortage of trained and experienced nationals exists for the public sector, and a shortage of skilled production workers and supervisors in the private sector. This has created considerable difficulties for education and training. Nevertheless some progress has been made in orientating secondary education towards rural vocations, and local institutions are generating a supply of apprentices and technically trained persons. For the foreseeable future the labour resource issue is likely to remain a constraint on local participation and ownership of industrial enterprises, other than very small-scale.

4.4.2 Raw materials

The agricultural and livestock resources of the Solomon Islands will provide the main base for industrial development in the foreseeable future. Commercial production of palm oil, copra and rice will have to be supplemented by secondary activities based on associated raw materials and by-products. Increased linkages between primary and secondary sectors and within the secondary sector will provide substantial production opportunities geared to the local market. Particular projects will be determined by the pattern of crop development in smallholder production as much as in the larger plantations.

Commercial timber resources are estimated at over 10 million cu.m. of which some 0.3 million cu.m. per annum are utilized by four logging and 16 sawmills. Replanting and reforestation schemes are being implemented to help secure the long-term future of the industry. The species available include both highly marketable renowned tropical hardwoods as well as species suitable for pulp, logs and chips. Thus far timber is largely exported in the form of logs and there are consequently opportunities for increased local value added by processing and the manufacture of wood products.

Fisheries have already received a high priority for development. A skipjack tuna cannery has been in operation since 1973. However, only 10 per cent of the catch (some 2,000 tons) is canned, the remainder is exported frozen. The transfer of fishing operations to domestic entrepreneurs is under way and will create further opportunities for supporting/servicing activities.

Geological surveys have established the existence of deposits of bauxite, gold, silver, copper, chromate, nickel, phosphate, limestone and industrial clays; the bauxite reserves on Rennel and Vaghona Islands are the most promising. However, no significant mining operations have been initiated or planned.

4.4.3 Energy

The Solomon Islands have considerable hydro-electric and solar potential for electricity generation but as yet this has not been developed. Thus far imports of petroleum are the main source of energy.

Appendix 4.A: Investing in the Solomon Islands

Basic industrial policy objectives:

- to stimulate the development of the country's natural endowment and to encourage those commercial and industrial sectors which can contribute to such development; to encourage the development of industries processing primary products and those manufacturing import substitutes;
- to encourage foreign participation in commerce and industry where the necessary skills and resources are not available locally;
- to promote improved methods of marketing Solomon Islands products, both at home and abroad;
- to assist Solomon Islanders in entering the commercial and industrial sectors of the economy.

Investment incentives

Low rates of income tax: companies incorporated in the Solomon Islands are taxed at 35 per cent. Personal tax is on a sliding scale starting at 14 per cent with a maximum rate of 42 per cent. There are numerous deductions.

Tax holidays: companies may apply for the status of a "pioneer company". Such companies are exempt from income tax for the period of the holiday. Shareholders of such companies are also exempt from tax on dividends received during the holiday.

Duty concessions: any company may apply for relief from import and export duties, each application being considered on its merits.

Special depreciation: any business may apply for fixed assets it has acquired to be classified as "special developmental assets". If the application is granted, such assets may be written down 100 per cent in the year of acquisition.

Protection: where the Government is satisfied that the development of an industry is in the public interest and that protection from competition is essential to its survival, the industry may be declared "protected", which means that no newcomers can enter it without a licence.

Appendix 4.A (continued)

Foreign investment

The Government of the Solomon Islands welcomes and encourages foreign investment which will result in benefits equally shared between the investors and Solomon Islanders. Foreign investment is particularly welcome in the areas of crop diversification, increased domestic processing of local raw materials and manufacturing for export.

In line with the policy of decentralization, priority will be given to projects which require participation by provincial Governments and local interests.

While there are no formal requirements regarding local equity participation, the Government is likely to prefer joint ventures with Solomon Islanders in projects of major economic significance.

Areas open to investment:

- large-scale development of natural resources: mining, forestry, fishing, agriculture, animal husbandry;
- manufacturing requiring advanced technology;
- import and finishing of semi-manufactures for the domestic and export markets;
- processing and marketing of locally produced foodstuffs.

Repatriation of capital and profits

There are no restrictions on remittances of dividends, profits, interest, royalties, loan repayments, settlement of commercial debts and the repatriation of capital by foreign investors.

Development financing

Both foreign and local enterprises may borrow in local currency for business purposes from a variety of sources: the commercial banks, the

Appendix 4.A (continued)

National Provident Fund and the Solomon Islands Development Bank. The Development Bank favours projects in which Solomon Islanders will participate, and industrial activities which will strengthen the country's economic self-reliance.

Employment of expatriate staff

Work and residence permits will normally be granted in respect of expatriate staff - particularly during the development period of a new enterprise - provided the post is one which no Solomon Islander is qualified and available to fill. Subsequently, companies will be expected to co-operate with Government training schemes and also to organize their own, so that in time Solomon Islanders can assume skilled and responsible positions. Certain types of employment, e.g. unskilled manual labour and clerical work, are reserved for Solomon Islanders without exception.

Institutional arrangements

Applications by foreign investors should be made to the Foreign Investment Division (FID) of the National Planning Office. After internal consultation and screening, each application is considered by the Foreign Investment Advisory Committee, which makes a recommendation to the Government. The Foreign Investment Division informs the investor of the outcome.

Source: UNIDO, Basic Information for Participants in the Investors' Forum for the South Pacific Region, November 1984.

Appendix 4.B: Industrial investment project proposals,^{a/} 1984

ISIC	Project Number	Project Title
3112	001/V/84-04	Manufacture of ice cream
3113	002/V/84-04	Fruit processing
3114	003/V/84-05	Dried shark meat
3115 3523	004/V/84-06	Coconut oil and laundry soap
3212 3215	005/V/84-04	Jute products
3212 3215 3909	006/V/84-05	Paint brushes and coir products
3220	007/V/84-04	Manufacture of garments
3699 3811 3813 3819	008/V/84-05	Hardware articles
3909	009/V/84-05	Trochus shell buttons
2903	010/V/85-02	Solar salt
3114	011/V/85-02	Dried fish
3220	012/V/85-02	Made-up garments and household linen
3529	013/V/85-02	Safety matches
3811 3812 3813 3819 3849	014/V/85-02	Metal products
2903 3111	015/V/85-03	Planting and processing of fruits, vegetables and spices

a/ This list includes industrial projects in Solomon Islands for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 4.C: The technical co-operation projects of UNIDO

SOLOMON ISLANDS

1. The completed projects since 1973

<u>Division/Section (Spec. Act. Code)</u>	<u>Project Number</u>	<u>Project Title</u>
IO/ENG (31.9.C)	US/SOI/83/076	Micro hydro-electric pilot power plant
IO/CHEM (30.4.02)	IS/SOI/73/003	Feasibility study on the establishment of a small soap industry

2. The ongoing projects

IO/INFR (31.3.L)	DP/SOI/84/004*	Indigenous enterprise promotion
IO/INFR (31.3.L)	SI/SOI/86/801	Assessment of industrial estate for Guadalcanal Province and small-scale industrial service centres in the provinces
IO/TRNG (31.5.A)	SI/SOI/86/802	Advisory service on assessment of industrial training needs
IO/TRNG (31.5.B)	XP/SOI/86/001	Training on planning and appraisal of industrial projects
IO/AGRO (31.7.A)	SI/SOI/86/002	Assistance to the wood processing industry
IO/AGRO (31.7.C)	SI/SOI/85/801	Assistance to food processing industry
IO/ENG (31.9.C)	SI/SOI/85/802	Development of mini hydropower programme

* Large-scale project (= total allotment \$150 000 or above).

** Total allotment \$1 million or above.

3. Projects in the pipe-line, 1986

(1) Development and promotion of indigenous enterprises.

The object of the project is to promote the development of industrial enterprises within the country and to assist the Ministry of Trade, Commerce and Industry in the development of policies, plans and viable projects. The project is being formulated by the Government authorities.

Appendix 4.C (continued)

- (2) Assistance in the development of an industrial estate in Guadalcanal, and small-scale service centres in the provinces.

The object of the project is to advise the Government on the development policy of the Guadalcanal Industrial Estate and its integration with the development of small-scale service centres.

- (3) Provision of advice to the Government on policy and strategy to be adopted for timber processing for export and local markets, including integrated saw-milling, furniture manufacturing and construction materials and utilization of by-products.
- (4) Provision of advice to the Government on strategy and policy to be adopted in food processing, in particular, the development of small- and large-scale integrated projects.
- (5) Provision of advice to the Government on policy and strategy to be adopted on the basis of training needs and programmes within the overall academic/physical Master Plan to be carried out in the first quarter of 1986.
- (6) Provision of advice to the Government on the overall potential schemes and strategy and policy to be adopted for the development of hydro-power industry in the country.
- (7) Provision of technical assistance to identify potential growing and processing of rattan (new industry) and manufacturing (existing) rattan products.
- (8) Assistance in the development of shell button manufacturing.
- (9) Viability/assessment for the development of a basket-ware production unit exclusively for women.
- (10) Provision of industrial economist and one engineer to assist the project manager of project SOI/34/004: Indigenous enterprises promotion.
- (11) Organization of study tours and exposure visits for government officials and businessmen in a specific field of industry.
- (12) Financing of the participation of nationals of the Solomon Islands at regional seminars and workshops on joinery and furniture industry and project identification, preparation, evaluation and financing, to be organized in Fiji in 1986.

Appendix 4.D: Leading industrial companies, 1984
(all values in millions of US\$)

<u>Rank</u>	<u>Company</u>	<u>Type of business</u>	<u>Sales/turnover</u>	<u>Net profit (loss)</u>	<u>Employees</u>	<u>Total assets</u>
1	Solomon Taiyo Ltd.	Fishing	12.2		722	1.1
2	Lever Solomons Ltd.	Copra	7			

Source: South, June 1985.

5

WESTERN SAMOA

5. WESTERN SAMOA

5.1 THE ECONOMY OF WESTERN SAMOA

5.1.1 Recent economic trends

In the late 1970s Western Samoa began to suffer the setback experienced by almost all the island developing economies in the Pacific as overall export revenues fell while the price of imports rose. In 1981, export revenues fell to a low of 19 per cent of imports. Since then, the share has gradually improved, with export revenues at around 38 per cent of imports in 1983 and 1984. These figures suggest a strong export growth, and in fact exports did respond to an extent to higher commodity prices and a devaluation of the tala. But the apparent increase is largely a consequence of declining imports, as government and private sector expenditure decreased sharply in response to the economic downturn.

Remittances from overseas Samoans and related private transfers have partly offset the trade deficit. Earnings from tourism have also been important, but so far have been insufficient to offset the cost of other service items, resulting in a negative net service income. The deficit on current account has largely been covered by official transfers - project aid amounted to some WS\$ 20 million in 1983.

To restore economic growth and achieve external viability, the Government embarked upon a stabilization programme in 1983 supported by an Im. standby agreement. Various fiscal, monetary and exchange rate measures were introduced in early 1983 and these were followed up with supplementary measures later in the year. Among the specific corrective measures introduced were: import control through a new foreign exchange allocation system; concessionary loans for export promotion; a flexible exchange rate policy; increased interest rate levels; reduced government borrowing from the commercial banks; strict guidelines on bank lending to the private sector; and careful watch over public enterprise activity. Development and administrative expenditure have been restrained and a range of new measures to bolster revenue has been introduced.

Judging from current trends, these measures, assisted by the price increases for small export items, have largely succeeded in restoring the financial balance. Inflation, however, remains high, and government spending will have to be continuously watched. Government support for agriculture has led to marked improvements in the domestic food supply.

5.1.2 Economic structure

The population is estimated at 159,000 (1984), two-thirds of whom live on Upolu and one-third on Savaii. Population growth rates have been high since 1951 with some decline in recent years, but the effective increase in population has been held down by high emigration. A large number of Western Samoans are thought to be living overseas. The overwhelming majority of the population are Polynesian and literacy rates are very high at 98 per cent.

Western Samoa is an archipelago of seven islands. The two main islands Savaii and Upolu make up over 95 per cent of the total land area. Some 70 per cent of the land area on these two islands is potentially cultivable, but only some 25 per cent is cultivated at present.

Social and economic life in Samoa is centered on the extended family system. Extended families own 80 per cent of the land, forming the basis of the dominant subsistence sector. The remaining 20 per cent of the land belongs to the private sector and to the Government and the Western Samoan Trust Estates Corporation (WSTEC), the latter holding land in trust for the Samoan people. WSTEC's estates have been used successfully as a 'lead sector' in agricultural development, and have also expanded into agro-industries.

Since independence Western Samoa has developed from being a highly self-sufficient subsistence economy to one increasingly dependent on imports. Over the period 1978-1980 the ratio of import payments to GDP was 75 per cent; the ratio of exports to GDP in the same period was 17 per cent.

There are no precise statistics on national income or output in Western Samoa. However, total primary sector output probably accounts for 50 per cent of GDP. The World Bank estimated GDP per head of population in 1979 at US\$ 595 placing Western Samoa in its category of middle-income countries. In

1981 UNCTAD for the Conference on the Least Developed Countries included Samoa in this category with an estimated income per head of US\$ 350.

Gross Domestic Product in 1984 was estimated at WS\$ 95.2 million in 1980 prices. GDP in real terms has grown by 1.6 per cent per annum between 1972 and 1979, but declined during the 1980-83 period by 2.3 per cent annually. Some 50 per cent of GDP is generated by agriculture, and services contribute 35 per cent; manufacturing contributes 6.5 per cent and construction some 4 per cent. Copra, cocoa, taro and bananas are the main agricultural products. Most copra is processed to produce coconut oil, the main foreign exchange earner. Between 15 and 20 per cent of cash crops are produced on WSTEC estates. There has of late been significant growth in non-traditional exports, mostly manufactures, e.g. coconut cream, beer and exotic fruit juices.

Village agriculture in Samoa is characterized by traditional husbandry practices, inadequate inputs and low yields. Coconuts occupy 65 per cent of the harvested land but production volumes fluctuate quite wildly; changes of 30 per cent from one year to the next are not uncommon.

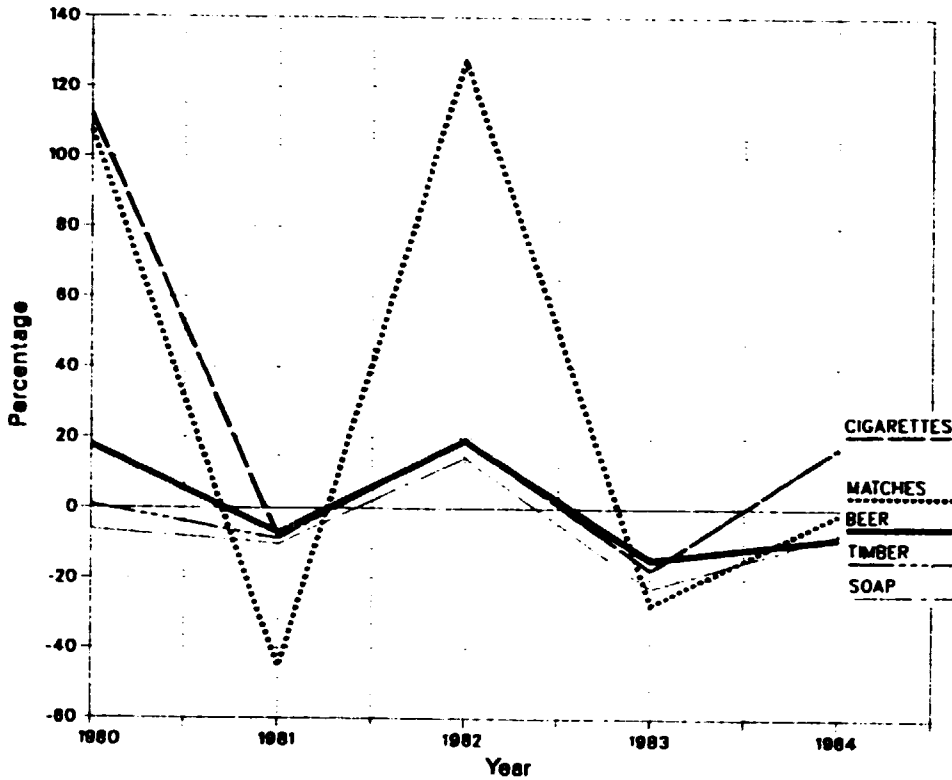
The forestry sector has been contributing more effectively to national output of late with careful exploitation and replanting programmes designed in the first place to meet local demand for timber and wood products. Some imports still occur but exports of construction timbers have also taken place.

The traditional exploitation methods for marine resources have been the subject of a concerted development programme. Between 1975 and 1979 a 45 per cent increase in catches took place. There are also proposals for large-scale commercial fishing on a joint-venture basis but Samoa's fishery resources are rather limited compared with other Pacific islands, since the EEZ is small.

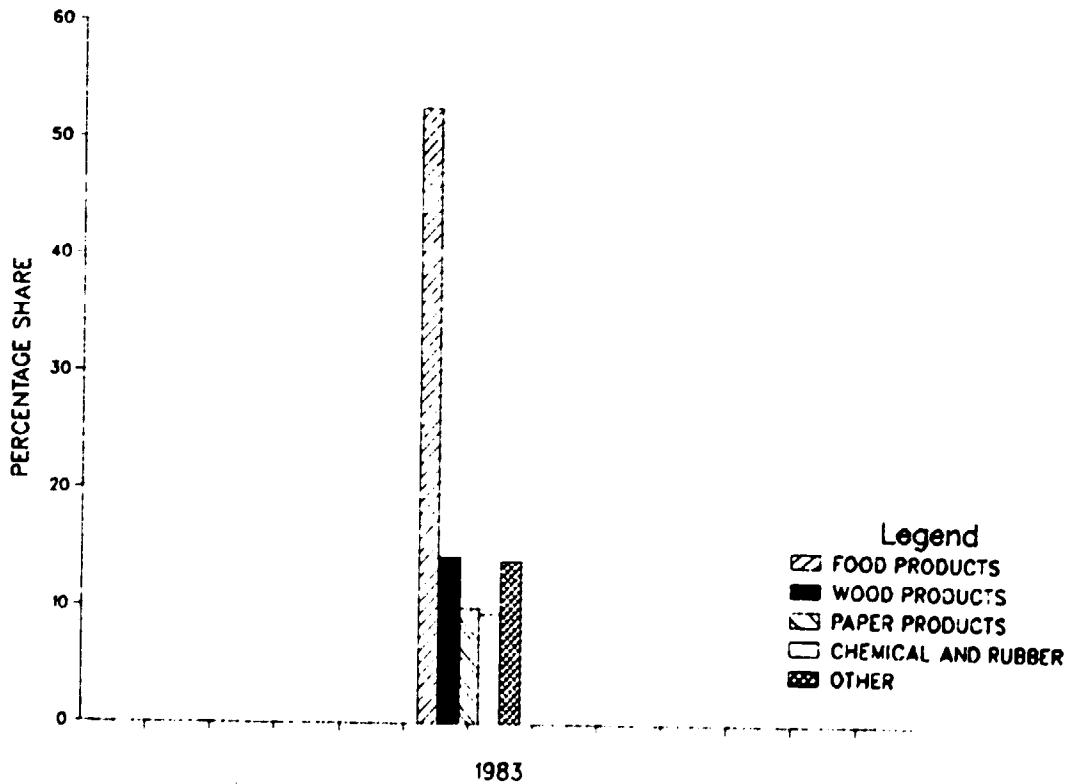
The manufacturing sector in Samoa has developed significantly in the last decade with the Government successfully initiating the establishment of a few medium-scale plants, mainly to substitute for imports. A number of smaller enterprises have also been established to cater for domestic consumption in the consumer goods area.

MANUFACTURING TRENDS

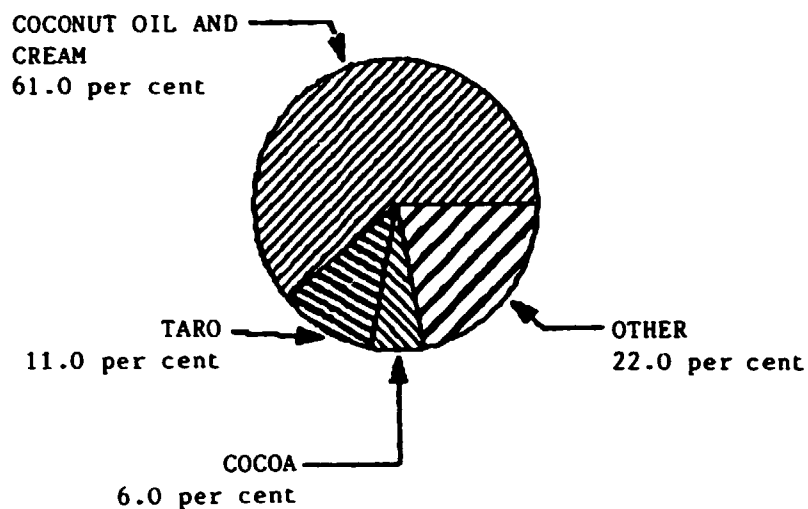
ANNUAL GROWTH RATES OF PHYSICAL OUTPUT, SELECTED INDUSTRIAL PRODUCTS, 1980-1984



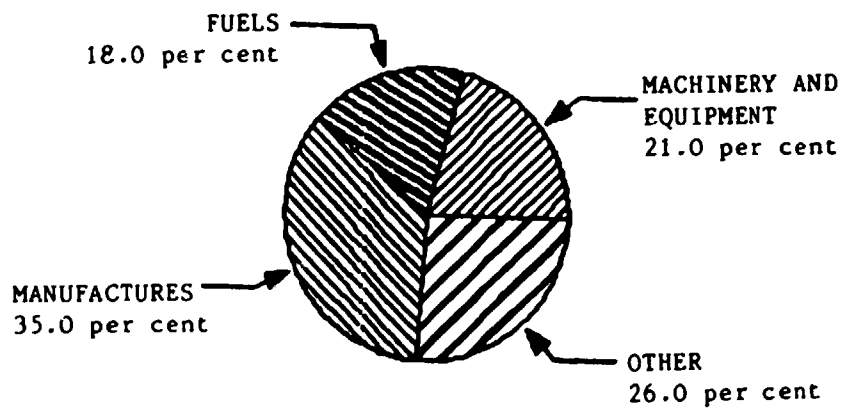
STRUCTURE OF MANUFACTURING EMPLOYMENT, 1983



MAJOR COMPONENTS OF MERCHANDISE EXPORT EARNINGS, 1984



MAJOR COMPONENTS OF MERCHANDISE IMPORTS, 1983



5.2 OVERVIEW OF THE MANUFACTURING SECTOR

Manufacturing activities grew quite quickly during the 1970s, averaging over 3.5 per cent per annum, but are still very modest. In 1983 some 75 industrial enterprises were in operation. In 1981, the manufacturing sector contributed 6.5 per cent of GDP and employed 757 persons. In 1983, without improving its GDP share, the industrial work force had grown to 1,431, about half of these being employed in the food industry, the most important manufacturing branch.

In the period 1978-80 a number of medium-scale enterprises came into production including a brewery, a cigarette factory, an animal feed mill and a match factory. Coconut cream, exotic tropical fruit juices and fishing boats were also produced on a significant scale. A coconut oil mill and a veneer mill factory were completed during the Fourth Plan (1980-84). The coconut mill brought considerable benefits, adding WS\$ 4.7 million in foreign exchange to the 1983 export receipts. Potential earnings from the veneer mill are estimated at WS\$ 1.4 million per year. During the same period, another coconut cream factory was completed, and in 1984 a new meat canning factory started operations. A new soap factory was to be built in 1985/86, and the Samoa Forest Products factory was to be re-equipped in 1985. The majority of enterprises are small-scale employing less than 15 persons. The range of enterprises in operation can be seen in Table 5.1.

Table 5.1. Manufacturing statistics, 1983

ISIC		Number of establishments	Number of employees ^{a/}	Wage bill (in '000 tala)
31	Food, beverages and tobacco	25	753	1,577.9
32	Textiles, wearing apparel	3	58	62.2
33	Wood products and furniture ^{b/}	11	203	392.3
34	Paper and paper products	11	143	427.9
35	Chemical and rubber products	9	135	303.0
36	Non-metallic mineral products	1	56	264.3
37	Fabricated metal products and structural engineering	10	83	196.8
TOTAL		70	1,431	3,224.4

Source: Western Samoa's Fifth Development Plan 1985-87.

^{a/} Employment figures are only a rough approximate of the actual employment, since statistics do not allow for short-term employment.

^{b/} Does not include Samoa Forest Products Limited and Samoa Veneer Products Limited.

The market for manufactured goods in Samoa is limited by the small population, its low purchasing power and the small size of the monetized sector. Distance from major metropolitan markets also inhibits larger-scale operations. Manufacturing activities in the main are oriented towards substituting for imports of consumer goods. The potential for both forward and backward linkages remains underexploited and many enterprises rely heavily on imports of raw materials and intermediate inputs.

Table 5.2. Indicators of industrial output, 1979-84

	1979	1980	1981	1982	1983	1984
Beer						
Volume ('000 hecto litre)	36.8	45.7	42.5	50.6	43.2	39.6
Value (market prices in '000 tala)	2,727	3,792	3,965	5,126	5,900	6,243
Cigarettes						
Volume (millions of cigarettes)	67.5	142.9	131.3	157.0	129.6	152.1
Value (market prices in '000 tala)	1,630	2,953	3,516	4,708	5,608	8,762
Timber						
Volume ('000 cubic feet)	8,906	8,983	8,197	8,666	6,722	6,273
Value ('000 tala)	1,914	2,618	2,797	3,507	3,454	4,159
Veneer						
Volume (in cubic metres)	...	...	...	1,066	1,579	1,241
Value ('000 tala)	...	...	...	261	542	575
Coconut oil						
Volume (million tons)	...	...	...	8,679	12,252	10,955
Value ('000 tala)	...	...	...	4,452	11,446	21,621
Copra meal						
Volume (million tons)	...	...	...	4,577	6,574	5,477
Value ('000 tala)	...	...	...	442	673	766
Soap						
Volume (million tons)	956	898	807	923	713	661
Value ('000 tala)	755	721	819	1,183	1,065	1,215
Matches						
Volume (in '000 of boxes)	1,738	3,604	1,967	4,477	3,251	3,200
Value ('000 tala)	80	127	101	283	205	230

Source: Department of Economic Development.

5.3 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

5.3.1 Goals of industrial policy

Previous plans have recognized the primacy of agriculture as the base of Samoa's subsistence lifestyle as well as the major source of export. This primacy has been reflected in the allocation of development expenditure; since 1965 agriculture and associated infrastructure have consistently accounted for over 80 per cent.

The Fifth (1985-87) Plan reduces the share of agriculture and infrastructure to 77.4 per cent (see Table 5.3). Industry accounts for 18.7 per cent of expenditure, almost as much as agriculture by itself. Infrastructure accounts for more than half of expenditure, with high-cost energy, water supply and transport projects. The Plan relies heavily on external sources of funds. The general development objectives are:

- to increase production, particularly in the case of village agriculture, by working through existing leadership and social organization;
- to move toward true economic independence and self-reliance;
- to provide greater opportunities for Western Samoan citizens to participate more actively in the development process;
- to ensure a fair distribution of the fruits of economic development and the satisfaction of basic economic, social and cultural needs; and
- to protect and conserve the environment.

The objectives for industrial development are:

- to contribute to a structural strengthening of the country's balance of payments through the diversification and expansion of export manufacturing and import substitution industries;
- to further increase the processing of the country's traditional agricultural products;
- to create paid employment opportunities and develop work skills by encouraging the development of industries with a high local value added content; and

- to encourage local entrepreneurship in the form of joint-ventures with foreign partners and small-scale village industries.

During the Fifth Plan efforts will be made to enhance Samoa's capability to identify industrial projects and to carry out pre-feasibility studies. Considerable manufacturing potential has already been identified in especially the food products branch. To stimulate small-scale industry, the establishment of a Small-Scale Industries Centre is envisaged.

5.3.2 Policy measures and instruments

A number of measures cover the establishment of industrial enterprises in Western Samoa but the basic control mechanism relies on the Enterprises Incentives Act of 1965 and its subsequent amendments. The 1984 amendments rationalized the incentive system (which covers tax and import duty reductions and protection from foreign competition) while at the same time improving incentives for new industries. Tariffs were also revised, those on capital equipment being lowest (20 per cent) now. To protect developing domestic industries, high tariffs (50 per cent and over) apply for imports of finished goods. The Enterprises Act is administered by the Economic Development Department, the most important government department involved in industrial development.

Direct public sector involvement in support of industrial development has taken a number of different forms including direct equity participation, expansion of WSTEC into processing, sub-contracting, activities of the Development Bank, the National Provident Fund, other banks and insurance companies, and the construction of the Vaitele industrial estate on the outskirts of Apia. A shift in government involvement is to be expected. Direct participation in enterprises will be reduced while guidelines for industrial development will become more selective and clear. Domestic entrepreneurs are to be stimulated by government purchases. Joint ventures will be encouraged as a way of developing the domestic industrial base. UNIDO has been actively involved in identifying joint-venture partners for manufacturing industries in Western Samoa. The Pacific Island Industrial Development Scheme (PIIDS) sponsored by New Zealand and the Australian Joint-Venture Scheme also offer assistance in establishing joint-ventures

Table 5.3. Sectoral breakdown of Fifth Plan development expenditure, 1985-87
(in thousands of tala)

	1985	1986	1987	Total costs	Percentage of total DP5 programme	Aid component	Aid component as a percentage of sectoral programme
Total DP5 Programme Costs	41,257	50,076	55,646	146,979	100	114,229	77.7
Agriculture, Forestry and Fisheries	8,418	10,415	10,353	29,186	19.9	20,854	71.5
Infrastructure	22,237	28,181	34,201	84,619	57.5	73,317	86.6
Social Services	1,598	1,685	1,668	4,951	3.4	4,070	82.2
Industry and Commerce	8,681	9,751	9,079	27,511	18.7	15,665	56.9
Public Administration	323	44	345	712	0.5	323	45.4

Source: Western Samoa's Fifth Development Plan 1985-87.

between resident companies of both countries with Samoan partners. To date, ten companies are operating under PIIDS, of which the total employment is estimated at 110. Total assistance approved under PIIDS amounts to \$0.5 million. A further ten companies have been assisted in the preparation of feasibility studies, but these projects have not yet been implemented. Three joint-ventures have been established during the past three years under the Australian Joint-Venture Scheme.

5.4 RESOURCES FOR INDUSTRIAL DEVELOPMENT

5.4.1 Labour

The labour force in Western Samoa was estimated to have grown to 40,200 in 1981. Participation in the monetized sector of the economy had increased to 48 per cent by 1981. Attempts to integrate the trainees from technical institutions in the industrial sector through on-the-job training schemes have not been successful. As in all small island developing countries, there is a shortage of skilled and semi-skilled production workers with experience and with the capability to develop supervisory skills. Government policy is now committed to keeping government employment down and stimulating the creation of more jobs in the private sector.

5.4.2 Raw materials

With fertile volcanic soils Western Samoa possesses considerable potential for tropical agriculture, but a reliable soil survey has yet to be made, and soil productivity losses have become evident in densely settled areas. Downstream processing of coconuts is already quite well developed in Samoa with a soap factory, coconut cream cannery, coconut timber panelling mill and an incipient coconut fibreboard plant. There are however opportunities for further expanding agricultural processing which partly depends on rehabilitation programmes for copra, cocoa and bananas.

Livestock production in Samoa is limited and beef production is sufficient only for 50 per cent of domestic demand. If supply is expanded, some possibilities for canning exist as well as for utilizing by-products.

Forestry resources in Samoa are sufficient to permit limited exploitation for the domestic market. The match factory is the major user but sawn timber of construction quality is also utilized.

Western Samoa has limited offshore fishery resources since her exclusive economic zone is small, though well stocked with fish (e.g. skipjack). No systematic exploitation of offshore fisheries has yet been organized. Some of the surplus catch is sold for canning in American Samoa.

5.4.3 Energy

During the Fourth Plan major hydro-power works were completed and initiated. The country is now self-sufficient in resources for electricity generation during the wet season. Further projects involving the use of solar energy and wood gasification are under way.

5.4.4 Finance

The Development Bank of Western Samoa (DBWS) and the National Provident Fund provide long-term investment funds, the former giving loans for up to 15 years as well as equity for fixed assets. DWBS to a large extent relies on external funds. In 1983 some 40 per cent of DWBS loans was earmarked for "industry," but this category includes services; loans to manufacturing presumably were only a fraction of this share. The National Provident Fund mobilizes savings locally for medium- and long-term investments. Most funds go to the building and construction sector but provision of finance for industrial development is made through loans to Government and to public sector enterprises including WSTEC. Investment in industry by commercial banks amounted to some 2-3 per cent of their total loan portfolio in the early 1980s.

Table 5.4. Summary of industrial development expenditure during the Fifth Plan, 1985-87
(in thousands of tala)

	1985	1986	1987	Total	Aid
Re-equipment Samoa Forest Products plant	1,400	-	-	1,400	1,400
Soap factory WSTEC	865	1,335	-	2,200	2,200
Feasibility studies industrial projects	50	100	100	250	250
Small-Scale Industries Centre	-	240	400	640	600
TOTAL	2,315	1,675	500	4,490	4,450

Source: Western Samoa's Fifth Development Plan 1985-87.

Appendix 5.A: Investing in Western Samoa

Basic principles

The aims of Western Samoa with regard to manufacturing industry are:

- promoting exports by creating industries producing for export;
- reducing the level of imports by supporting enterprises producing for the domestic market;
- encouraging industries with a high labour content, thereby creating employment and a better qualified workforce;
- increased processing of local raw materials.

Particular emphasis has been placed on the first aim - creating industries producing primarily for export which will contribute to the country's foreign exchange earnings. Firms producing for export, therefore, receive priority in the award of fiscal and other incentives.

Foreign investment

The Government of Western Samoa welcomes foreign investment, recognizing that it is needed in addition to domestic capital in order to achieve the country's developmental goals. The Government hopes that foreign investors will introduce the production technologies and marketing skills required to develop successful industries and make better use of the country's natural endowment.

While there are no rules on the proportion of foreign to local equity participation, shareholdings by Western Samoans are encouraged, and this aspect of a proposed new enterprise is taken into consideration when applications for incentives and business licences are reviewed.

Investment incentives

Tax holidays: an exemption from company income tax of up to five years (with the possibility of extension for a further five years) is available to approved enterprises engaging in:

Appendix 5.A (continued)

- agro-industrial processing;
- manufacturing;
- fisheries;
- hotels and other tourist facilities.

Dividends paid to shareholders in approved enterprises are exempt from taxes until the entire investment has been recovered. This exemption lasts for two years after the end of the agreed tax holiday.

Exemptions from import duties: an approved enterprise is entitled to import free of duty a wide range of items, e.g. plant and machinery, vehicles, raw materials and articles required for buildings construction.

Industrial development zone: land in the Zone, five kilometres from Apia, is available to approved manufacturing enterprises. Infrastructural facilities are excellent, and the annual lease payment is modest.

Export processing zone: particularly attractive tax and other incentives are available to new enterprises whose principal objective is manufacturing, processing or assembling goods for export. Such firms, which must be incorporated or registered in Western Samoa, may claim:

- a five-year exemption from income tax on all export-derived profits. After the tax holiday, all income will be taxed at the concessionary rate of 25 per cent;
- 30 years' lease of a site in the Zone on which the investor may erect premises for the needs of his business. The lease may contain provision for renewal for a further 30 years;
- unrestricted repatriation of capital, profits, dividends, licence and royalty fees, etc.

Other benefits: in addition to the benefits offered by the Government of Western Samoa, a number of tariff advantages exist for investors intending to manufacture for export using Western Samoa as a base. These apply to exports to most developed countries, including the member states of the European

Appendix 5.A (continued)

Economic Community (EEC) under the Lomé convention. In addition, negotiations are being held with Australia and New Zealand on tariff and licencing advantages for exports to those markets.

Remittances of funds

Although remittances of funds out of Western Samoa are, in common with most other countries, subject to exchange control regulations, repatriations of capital and capital gains, profits and repayments on loans are normally permitted without restriction.

Development finance

In addition to the two commercial banks operating in Western Samoa, loan finance can be obtained from the Development Bank of Western Samoa and from the National Provident Fund. The Government will itself take up an equity holding in projects which are considered to be of special importance to the national economy.

Employment of foreign labour

Applications for work permits for foreign staff can be made by any local firm. They are initially granted for a period of six months and are renewable on request.

Institutional arrangements

Foreign investors who would like to learn more about the opportunities for investment offered by Western Samoa are invited to contact the Director of the Department of Economic Development in Apia, who will assist them both with additional information and in formulating an application for approved enterprise status.

Source: UNIDO, Basic Information for Participants in the Investors' Forum for the South Pacific Region, November 1984.

Appendix 5.B: Industrial investment project proposals,^{a/} 1984

ISIC	Project Number	Project Title
3115	001/V/84-05	Cold process coconut oil extraction
3121	002/V/84-04	Coconut cheese products
3131 3119	003/V/84-04	Passion fruit liqueurs and liqueur chocolates
3220	004/V/84-04	Garment manufacture
3233	005/V/84-04	Eel skin leather goods
3320	006/V/84-05	Furniture manufacture
3511	007/V/84-05	Fuel ethanol from breadfruit
3511	008/V/84-04	Glycerine and esterified coconut oil
3112	009/V/84-08	Ice cream

a/ This list includes industrial projects in Western Samoa for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 5.C: The technical co-operation projects of UNIDO

Independent State of WESTERN SAMOA

1. The completed projects since 1972

<u>Division (Spec.Act.Code)</u>	<u>Project Number</u>	<u>Project Title</u>
IO/PLAN (32.4.01)	DP/WES/71/003	Industrial survey
IO/PLAN (31.2.A)	SI/SAM/79/801	Industrial development diagnosis
IO/PLAN (31.2.C)	SI/SAM/78/801	Incentive measures for industrial development
IO/INFR (32.3.04)	DP/WES/73/010	Industrial free zone preparation
IO/INFR (32.3.04)	RP/WES/75/001	In-plant training course on industrial free zone development and management
IO/TRNG (31.5.B)	RP/WES/77/001	Fourth general course on development banking
IO/TRNG (31.5.E)	RP/SAM/79/002	Study tour, fashion industry
IO/FEAS (31.6.A)	IS/WES/75/003	Pre-feasibility study for the erection of a match factory
IO/FEAS (31.6.A)	SI/SAM/79/802	Feasibility study on establishment of corned beef cannery
IO/FEAS (31.6.A)	SI/SAM/79/803	Feasibility study on manufacture of starch from taro
IO/AGRO (30.6.02)	RP/WES/74/002	Food processing
IO/AGRO (31.7.A)	DP/SAM/79/003	Assistance to the match industry
IO/AGRO (31.7.A)	RP/SAM/79/001	Assistance to the match factory
IO/AGRO (31.7.A)	RP/SAM/79/003	Study tour for marketing of match products
IO/AGRO (31.7.A)	SI/SAM/77/801	Assistance in the establishment and initial operation of a match factory
IO/AGRO (31.7.A)	SI/SAM/76/806	Establishment of a match factory
IO/AGRO (31.7.A)	UC/SAM/78/169	Assistance to the match factory
IO/AGRO (31.7.B)	SI/SAM/80/801	Garment industries development

Appendix 5.C (continued)

Division (Spec.Act.Code)	Project Number	Project Title
IO/AGRO (31.7.C)	UC/SAM/78/176	Food processing development
IO/MET (31.8.A)	RP/SAM/80/001	Assistance in welding of aluminium
IO/ENG (30.6.04)	RP/WES/74/001	Paper conversion
IO/ENG (31.9.B)	RP/SAM/84/001	Assistance for manufacturing efficient wood-burning stove (continued under XP/SAM/84/0010)
IO/CHEM (32.1.C)	SI/SAM/77/802	Development of solar salt production
IS/TEC (62.4.2)	RP/SAM/82/001	Strengthening of national technological capabilities in the sector of small-scale industry, with particular reference to the coir industry

2. The ongoing projects

IO/ENG (31.9.B)	XP/SAM.84/001	Assistance for manufacturing efficient wood-burning stove (ex RP/SAM/84/001)
-----------------	---------------	--

* Large-scale project (= total allotment \$150,000 or above).

** Total allotment \$1 million or above.

Appendix 5.D: Leading industrial companies, 1984
(all values in millions of US\$)

Rank	Company	Type of business	Sales/turnover	Net profit (loss)	Employees	Total assets
1	Western Samoa Trust Estates	Coconut	2.1			
2	Western Samoa Breweries	Beer	0.36			

Source: South, June 1985.

6

VANUATU

6. THE REPUBLIC OF VANUATU

6.1 THE ECONOMY OF VANUATU

6.1.1 Recent economic trends

Vanuatu achieved its independence in July 1980 under difficult circumstances. Civil disturbances, the departure of a number of skilled expatriates, and the sudden depreciation of the French franc to which the local currency, the Vatu, had been pegged, as well as the world economic recession combined to bring about a sharp decline in GDP (by almost 12 per cent in that year). Despite these difficulties Vanuatu has achieved a significant measure of political stability - a critical achievement for its future economic and social development. Economic growth and resumption of external aid have resumed as a consequence. The real growth rate of GDP was 1-2 per cent in 1981, 3-4 per cent in 1983 and over 5 per cent in 1984.

The period of high inflation in the late 1970s gave way to much reduced rates after independence, largely due to delinking the local currency from the French franc and pegging it to the SDR in 1981. The rate of inflation has fallen from 47 per cent in 1981 to 5 per cent in 1984. Export earnings have increased by 73 per cent in 1983 and over 30 per cent in 1984. Despite a large trade deficit - imports are still twice the size of exports - there is a substantial surplus on the current account. Export earnings depend almost entirely on the world price of copra which has been high in recent years. In turn the strength of the local currency and domestic price stability have revived local and international business confidence to enable small but significant revaluations in late 1982 and 1984. Increased fiscal self-reliance brought rising revenues from indirect taxes.

At the time of independence Vanuatu inherited a top heavy administration where functions and responsibilities were duplicated or even triplicated under condominium arrangement; both physical and institutional infrastructure were underdeveloped, few nationals had acquired the necessary skills and experience for positions of high responsibility, and there was a heavy reliance on external budgetary support. Levels of current expenditure bore little relation to the prevailing levels of economic activity in Vanuatu.

The Government has tried to reduce recurrent expenditure and has over the period 1981-85 managed to produce a surplus on the recurrent budget despite a substantial decline in foreign aid. In 1984, 83 per cent of recurrent expenditure was financed from domestic resources and this ratio is expected to reach 100 per cent by 1988.

The First National Development Plan (1982-86) envisages an investment outlay of Vt 11,500 million (1981 prices, equivalent to about US\$ 100 million), of which 59 per cent was allocated for development expenditure. The mid-term review of the plan acknowledges that allocation of intersectoral resources depended heavily on the availability of donor finance. External assistance thus remains a key determinant of both the volume and pattern of development expenditure undertaken by the Government. The relative decline in aid levels in recent years (from 38 per cent of total revenues in 1981 to 24 per cent in 1982) can therefore have serious implications for the achievement of the sectoral and project level targets specified in the development plans. Industry's share in domestically funded domestic expenditure was 0.2 per cent in 1982 and 2.5 per cent in 1983. This share was expected to go up to about 7 per cent by the end of 1985. However, industrial projects planned for the 1982-86 period remain crucially dependent on the availability of foreign funds.

6.1.2 Economic structure

Vanuatu is an archipelago of 80 islands with a land area of approximately 11,900 sq. km and a sea area of 680,000 sq. km. In relation to land area the population is small, numbering 127,000 in 1984. Average population density is about 10 per sq. km. Ninety-three per cent of the population is Melanesian, 4 per cent of European descent and the remainder is of Asian or other Pacific origin.

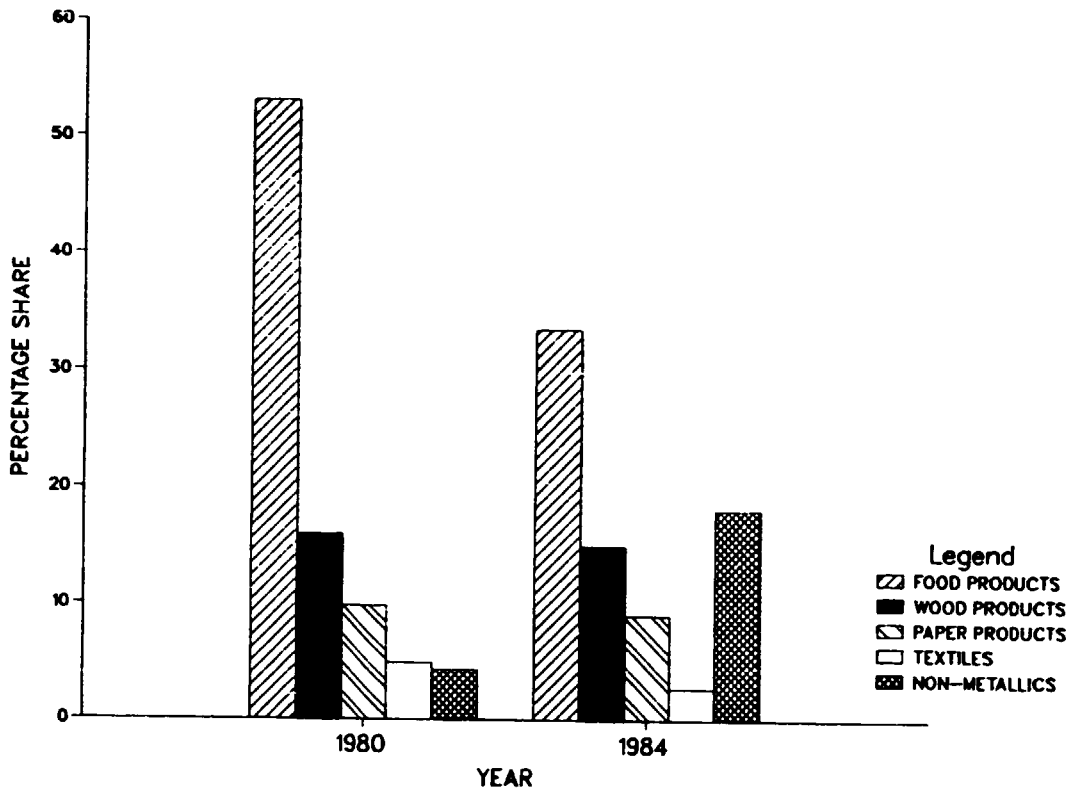
Vanuatu is essentially a primary commodities producing country. The structure of production reflects the distinction between modern and traditional sectors. Agriculture accounts for approximately 20 per cent of GDP; Government and other services make up 50 per cent of GDP partly because a proportion of government service is financed by foreign grants. Offshore banking (Vanuatu is a tax haven) and tourism are estimated to account for 10-15 per cent of GDP.

Vanuatu's economy exhibits a form of economic dualism. The expatriate sector is heavily service oriented, including international and domestic banking, the public service, tourism and plantation agriculture. The indigenous sector consists of mixed and subsistence farmers with very low incomes in comparison to those of the expatriate sector. The integration of these parallel activities and the development of appropriate linkages within the economy are priority tasks for government policy in the medium to long term; in particular priority will need to be given to the promotion of greater participation in, and ownership of, domestic economic activities and resources by nationals.

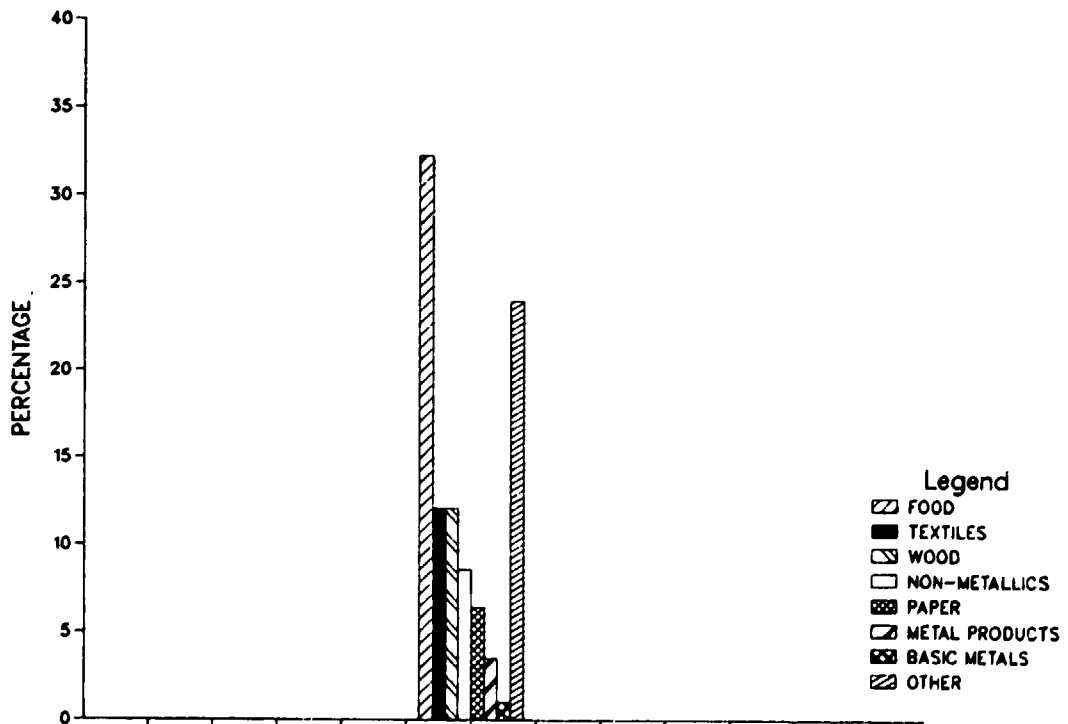
Copra products account for over 70 per cent of the export earnings of the country. The dependence on foreign trade is very high. Most essential consumer, intermediate and capital goods, including fuel, food, machinery and industrial raw material, are imported. The relatively narrow domestic production base has rendered the economy particularly vulnerable to the movements in the prices of exports and imports. An important objective of government economic policy is to reduce this vulnerability.

MANUFACTURING TRENDS

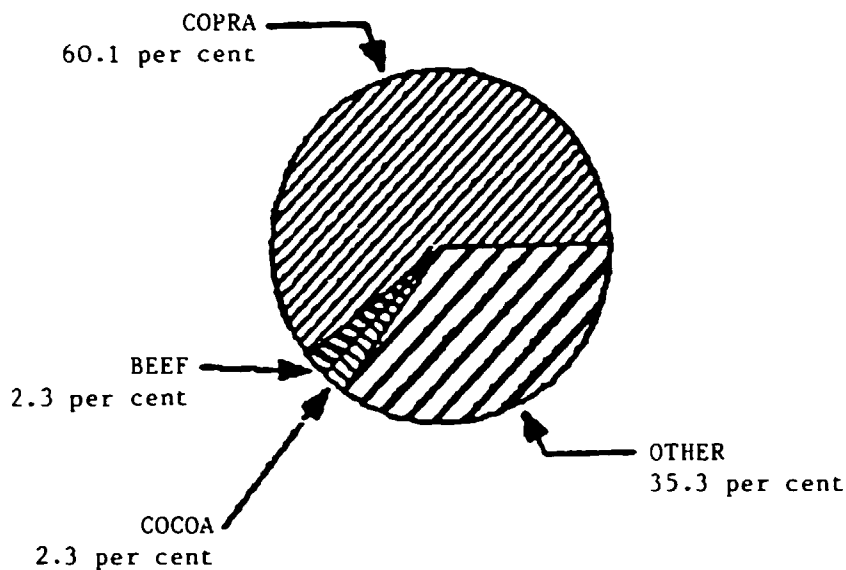
STRUCTURAL CHANGE IN MANUFACTURING VALUE ADDED, 1980 AND 1984



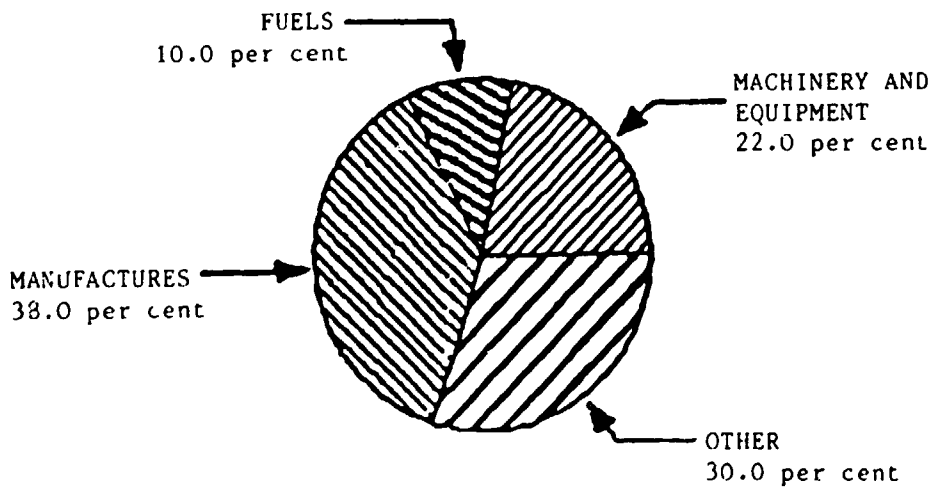
STRUCTURE OF MANUFACTURING EMPLOYMENT, 1983



MAJOR COMPONENTS OF MERCHANDISE EXPORT EARNINGS, 1984



MAJOR COMPONENTS OF MERCHANDISE IMPORTS, 1984



6.2 STRUCTURE AND PERFORMANCE OF THE MANUFACTURING SECTOR

6.2.1 Overview of the manufacturing sector

The manufacturing sector remains relatively underdeveloped. There is only one large-scale manufacturing enterprise. A number of smaller enterprises concentrated mainly in Port Vila produce simple consumer goods for the local market such as soap, bakery items, dairy products, orange juice from concentrates, aerated waters, plastic containers, sawn timber, furniture. Canned meat, boats, aluminium items, metal products and building materials are also produced. There are three saw mills in Vanuatu. Most manufactured production is geared towards the satisfaction of domestic demand. Exports of manufactured items are modest but include shell buttons, plastic containers and canned meats.

While in general there is a reasonable standard of infrastructural services and facilities, the manufacturing sector faces some difficulties with a shortage of serviced industrial premises, long delays in constructing new buildings and lack of security of tenure. Banking services in Port Vila are well developed; because of the tax haven status, however, these are primarily oriented to offshore activities. Domestically there are few dispersed banking outlets and few financial instruments to attract long term savings and provide appropriate credit facilities, e.g. mortgages.

The first plan period has seen important development within the manufacturing sector. With the assistance of UNIDO the Government has converted the Office of the Development of Enterprise into a Department of Industry. The ministry has participated in the establishment of the first large-scale national manufacturing unit - a cement factory - in 1983. A number of projects are now in the final stages of evaluation and registration including a tannery, a brewery, a papaine factory, industrial alcohol and confectionary units.^{1/}

^{1/} For a list of projects seeking external assistance, see Appendix 6.B.

6.2.2 Growth and structural change

The manufacturing sector has grown rapidly since independence. MVA grew by 88 per cent over the period 1981-84 and employment has increased by 38 per cent during this period. Due to data deficiencies in the compilation of GDP estimates it is difficult to give an accurate measurement of the change in the manufacturing sector's share of GDP. There is little doubt however that this share has risen in the post independence period and currently stands at about 5 per cent.

Table 6.1 provides estimates of the inter-branch distribution of employment, wages and value added within the manufacturing sector. The food products and wood manufacturing branches are the leading contributors. Their combined share of MVA in 1984 was estimated at over 60 per cent - the greater part of which is produced within the food products branch. The combined share of these branches in manufacturing employment is almost 50 per cent. The non-metallic products and clothing and leather industries, which contribute only 5.4 per cent of MVA, employ 12.1 per cent of the manufacturing labour force. These are the branches with the lowest labour productivity ratio. The metal products, chemicals and basic metal branches have the highest labour

Table 6.1. Structure of manufacturing employment and composition of MVA by branch of manufacturing, 1984

	Employment		Value Added		Value Added/ Employee
	No.	Percent	VT'000	Percent	VT
Food, beverage & tobacco	330	37.8	357,993	51.52	1,085
Textile, clothing & leather	36	4.1	12,869	1.85	357
Wood and wood products	100	11.4	95,952	13.81	960
Paper and paper products	38	4.3	48,777	7.02	1,284
Chemicals, rubber and plastic products	4	0.5	5,400	0.01	1,350
Non-metallic products	70	8.0	24,554	3.53	351
Basic metals	8	0.9	10,700	1.53	1,338
Fabricated metal products	40	4.6	60,000	8.63	1,500
Handicrafts	128	14.6	14,621	2.10	1,142
Other	121	13.8	68,817	10.00	569
TOTAL	875	100.0	694,823	100.00	794

Source: Republic of Vanuatu, Department of Industry.

productivity ratios. Both the food and the wood product branches have higher than average labour productivity ratios. Differences in capital intensity, as measured by the value added to employment ratio, among the industrial branches are substantial.

Table 6.2 compares the intra branch distribution of MVA and employment over the period 1980-83. Despite the very short period covered in the Table, there has been considerable structural change. The share of the food branch

Table 6.2. Structural change in manufacturing, 1980 and 1983
(percentage)

	<u>Value Added</u>		<u>Employment</u>	
	1980	1983	1980	1983
Food	53.1	33.5	42.5	32.3
Textiles	4.9	2.7	6.3	12.1
Wood	16.0	15.0	16.4	12.1
Paper	9.8	9.0	8.3	6.4
Chemical	4.4		4.1	
Non-metallics	4.3	18.1	10.2	8.6
Basic metals	-	1.7	-	1.0
Metal products	6.9	7.3	7.7	3.5
Other	1.5	12.7	4.3	24.0

Source: Department of Industry.

fell by almost 20 per cent over this period in terms of MVA and by 10 percentage points in terms of employment. The share of non-metallic mineral products more than tripled in terms of MVA but its share of employment actually declined. The share of textiles in MVA was halved over 1980-83 while its share in manufacturing employment almost doubled. The share of other (i.e. small) industries in manufacturing employment also doubled over 1980-83. It is thus clear that productivity differentials among manufacturing branches widened significantly.

Table 6.3 presents evidence on the planned distribution of investment among the major industrial projects over the period 1983-86. Over 50 per cent of the total investment is allocated to two projects, the brewery and the industrial alcohol units. It might therefore be expected that if investment is undertaken according to plan, capital intensity is likely to increase significantly within the manufacturing sector and manufacturing employment is unlikely to grow rapidly - no new investment is envisaged for the textile sector which constitutes the most labour intensive branch in Vanuatuan manufacturing. Similarly the investment share of small projects is only 0.9 per cent.

Table 6.3. Development finance, 1983-86
(in m VT, current prices)

Project Title	1983	1984	1985	1986	Total	As per cent of total	Gvt. funding
Vanuatu Cement Ind.	80	80	-	-	160	5.9	52
Tannery & leather goods	-	20	100	-	120	4.5	53
Papaine production	-	5	320	25	350	13.3	75
Distillery & marmalade	-	5	60	35	100	3.7	25
Brewery	-	-	200	400	600	22.3	-
Charcoal	-	2	2	2	6	0.2	6
Confectionery	-	-	50	200	250	-	-
Low income housing	-	5	50	50	105	9.3	105
Roofing material	-	1	1	1	3	0.1	3
Alcohol - Power	-	10	400	500	910	33.8	-
Soap manufacture	-	15	15	-	30	1.1	-
Printery	-	22	-	-	22	0.8	3
Small projects	-	5	10	10	25	0.9	20
Training centre	-	2.6	0.4	0.4	3.4	0.1	3.4
T O T A L	80	172	1,208.4	1,223.4	2,684.4		345.4

Source: National Planning and Statistics Office, Republic of Vanuatu.

It is of course not certain that investment targets will be met. There is a heavy dependence on foreign capital, although the plan documents do not specify the exact expected share of foreign to domestic capital in manufacturing investment over the plan period. However, as noted before, foreign aid levels have in recent years been lower than expected. It is thus entirely possible that some of the projects are subject to investment rescheduling or are deferred. One encouraging sign however is that two major projects - one in cement and the other in soap manufacturing - have been completed as planned.

It is clear that the major partners in the manufacturing sector are expected to be the government and foreign investors. The government share of the manufacturing investment is expected to be 13.2 per cent over 1983-86. Around 30 per cent of total government investment is concentrated in low income housing construction. The Government also has a relatively high share of investment in cement and papaine production and in small industrial projects. Foreign investment is expected to play a major role in the other manufacturing branches.

Emphasis is being laid on the growth of export-oriented industry. Two major projects - soap and papaine - have been developed to serve export markets. At present, the share of manufactures in total exports is very small. This share must increase substantially if the vulnerability to changes in copra prices is to be reduced. The value-added content in the copra industry can be raised by expanding the range of copra products with export perspectives.

6.3 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

6.3.1 Goals of industrial policy

During the period of the Condominium there was no comprehensive public development expenditure programme. Each metropolitan power independently financed and administered its own projects according to its priorities and special interests. The First National Development Plan 1982-86, issued in September 1982, set out development needs, priorities and the means of attaining them.

The major development objectives of the First Plan were:

- a better utilization of the country's natural and human resources in order to achieve higher rates of economic growth and national control of the economy;
- a more balanced regional and rural growth with decentralized political and economic decision-making;
- the enhancement of the foreign and domestic private sector's contribution to national development;
- a gradual achievement of the long term goal of economic self-reliance; and
- the preservation of the cultural and environmental heritage of the nation through balanced development programmes.

The Government's regional planning exercise was designed to emphasize local participation in project selection and implementation involving local community leaders and local government councils in decisions on priorities.

In the absence of investible surpluses generated from natural resources and in view of the low level of domestic saving the Plan relied on external grants, concessional borrowing and foreign investment in 'regional economic centres' specializing in particular crops with the aim of establishing additional income-generating projects in the primary sector and associated infrastructure. Livestock and major established crops (coconut, cocoa, coffee and pepper) figured in these plans together with some attempts at diversification into fisheries, minerals and tourism. The industrial development strategy envisaged development of selected resources-based industries for export, some import substitution industries and expanded cottage or household industries.

The critical factor in determining the size of the development expenditure programme in Vanuatu was the level of funding available from major aid donors as well as the need to complete a number of ongoing projects, particularly in the social service sector. Out of total estimated investment requirements in the Plan 59 per cent were devoted to directly productive activities, out of which agriculture, fisheries and forestry accounted for 65 per cent. Transport infrastructure accounted for 20 per cent and social

services, mainly education and health for the remaining 15 per cent. A sectoral breakdown of planned expenditure is given in Table 6.4.

Table 6.4. Capital expenditure requirements of the First Plan, 1982-86
(million Vatu)

Economic services	6,831	59 per cent
of which - Agriculture	3,345	
Fisheries	449	
Forestry	814	
Mining	297	
Manufacturing	680	
Trade/co-operatives	263	
Finance	660	
Tourism	323	
Infrastructure	2,607	23 per cent
of which - Transportation	2,089	
- Land	1,210	
- Sea	272	
- Air	607	
Communication	229	
Energy	56	
Water supply	233	
Social services	1,758	15 per cent
Government services	304	3 per cent
Total	11,500	

Source: National Planning & Statistics Office, Port Vila, First National Development Plan, 1982-86.

The First Plan called for a doubling of development expenditure from 10-12 per cent of GDP in 1980 to 20-25 per cent in 1982-83. This high level of development expenditure may well have been constrained by Vanuatu's factor resources and institutional limitations, e.g. the traditional land tenure system, scarcity of labour in the rural economy, and shortages of trained manpower together with limited organizational capabilities in government development agencies. Increased participation in joint venture development projects was envisaged in the Plan with government participation financed externally by grants and concessional loans.

The mid-term review of the First Plan noted that a revision of industrial priorities had taken place since 1982 in the light of new development experience. The Government now emphasizes the need to rapidly increase local participation in the management of the economy. The changes in the sector objectives are as follows:^{1/}

Regarding local control:

- To encourage the increased local (indigenous) participation and control of the economy. To assist in achieving this goal, emphasis is placed on six target projects aimed not only at the development of production facilities under joint-venture arrangements, but also at the establishment and training of industrial skills within the labour community. This will not only help establish the basic industrial environment but will help generate a dynamic urban informal sector. The establishment of basic maintenance and supply services will present a sound base for endogenous industrial development.

Regarding foreign exchange:

- The local manufacture of goods and the introduction of services will be encouraged whenever viable to assist in the saving of foreign exchange. However, this will not be achieved behind high tariff barriers. Given the scarcity of capital funds in Vanuatu, uneconomic ventures which can only operate under protection will lead ultimately to a higher product price and a misallocation of resources.

Regarding a sound industrial infrastructure:

- A core of readily-available skilled and semi-skilled labour is a major attraction to investors and can sometimes be a prerequisite. For this reason the Government plans to introduce a centralized industrial training and common facility centre; the first skills to be taught will relate to leather and textiles.

6.3.2 Institutional infrastructure

Since 1982 there has been considerable organizational realignment and innovation. In January 1984 the Department of Industry was created within the Ministry of Finance, Commerce, Industry and Tourism. The Department evolved from the previous Office for the Development of Enterprise (ODE), which

^{1/} The following three paragraphs are quoted from Republic of Vanuatu, National Planning and Statistics Office: The Mid-Term Review of Vanuatu's First National Development Plan, 1984, p. 140-141.

subsequently became one of its units, along with the Office for Extension Services (OES) and the Audit and Quality Section. The recurrent budget estimates for the operations of the Department of Industry are VT 6 million, VT 6.3 million and VT 6.7 million for 1984, 1985 and 1986, respectively. ODE supplies direct pre-investment assistance to enterprises, OES is responsible for technical back-up and extension to existing enterprises upon specific request. The Audit and Quality Section will ensure proper application of acceptable industrial standards. This structure has resulted in significant improvement in the quality of services and management advice available to ni-Vanuatu entrepreneurs.

A major step forward was taken in 1983 with the publication of "Vanuatu's Investment Incentives", produced with the assistance of the Commonwealth Fund for Technical Cooperation. The guidelines clearly indicate Government policy towards local and foreign investments, joint ventures, sector priorities and local participation and also clarify what assistance and incentives are available from Government. An attempt is also being made to establish an industrial training centre. A sum of Vt 3.4 million has been allocated for this purpose.

The scarcity of skilled and semi-skilled workers and only a newly emerging entrepreneurial class have already been mentioned. Although industrial manpower needs are usually associated with mechanical, electrical and other production or maintenance skills, many other skills are required, not least in the management of enterprises. Marketing has evolved as a problem in its own right; there is a lack of knowledge of the size and structure of target markets and a lack of knowledge of sales techniques. These latter problems are being addressed by the Government's Industrial Services and the offices of the South Pacific Trade Commissioner. With OES now operating and plans under preparation for a training centre, the skills problem is also being tackled, and in the course of time the growth of the industrial sector will help to raise the number of experienced, skilled workers in the labour force. Continuous government attention will be given to this problem.

6.4 RESOURCES FOR INDUSTRIAL DEVELOPMENT

6.4.1 Labour

In 1979 the labour force (aged 15-55) was 56,330 and the anticipated growth rate was 2,640 per annum over the period 1982-86. 18 per cent of the economically active were expatriates. Of the indigenous work force only 13.5 per cent have had any formal education and 5 per cent have professional, technical or managerial posts (chiefly in the public sector).

75 per cent of the labour force work in agriculture, some 10 per cent in the service sector. Less than 20 per cent of the labour force are wage earners, two-fifths of whom work in public administration. Wage-earning employment is concentrated in Port Vila and Luganville.

Most professional and middle management positions are held by expatriates who have a disproportionate influence on planning and decision-making. For industrial development there is a great need to strengthen vocational education and training. In particular, organizational and technical skills in the indigenous labour force must be developed to increase participation rates. Some progress has been made to this end in the public sector, plantations, forest, fisheries and tourism industries.

6.4.2 Raw materials

Copra is the most important cash-earning economic activity with 69,000 ha under coconut plantation producing 50,000 tons of smoke-dried copra per annum (75 per cent from small holders and 25 per cent from plantations). There is an urgent need to revitalize this most important export industry by improving copra productivity and production through replanting, improved husbandry, etc.

Coffee and cocoa are the other major cash crops with 500 ha and 4,000 ha respectively producing 100 tons of coffee and 1,000 tons of cocoa.

Natural forests in Vanuatu are widespread but commercial woods are scattered, making logging expensive. Current exploitation is approximately 2,000 cu.m. per annum. Coconut replanting offers possibilities for processing

old coconut trees. Another possibility is the exploitation of hardwood stands on some of the smaller, more remote islands.

A wide range of vegetable and fruit crops are grown for subsistence or else on a market garden basis for local towns. Processing opportunities are uncertain because of fluctuating quantities and qualities.

The cattle herds raised in the 1970s, which amounted to 130,000 head in 1979, have since fallen to 80,000; these have brought self-sufficiency in beef with the opening of two abattoirs. Export prospects of live, frozen and canned meats are significant.

Up to 10,000 tons per annum of fish are already exported through a Japanese venture based on Palekula where cold storage and packaging facilities exist. Potential for skipjack tuna and other deep sea fisheries within the 200 mile economic zone as well as for coastal fisheries are significant, requiring large investments in frastructure and joint venture organizations for planned exploitation.

Mineral resources of Vanuatu are largely unexplored and unassessed. Manganese has been mined spasmodically and pozzelanes (used in cement production) are known to exist on Efate.

6.4.3 Technical assistance to industry

Manufacturing is a small sector in Vanuatu in terms of its contribution to GDP but the scope for its development could be systematically explored. There is a need to study the options available for increasing the linkages between manufacturing and the fishing, forestry, agricultural and mineral sectors and identifying the scope for resource-based industrialization in Vanuatu. This can be the subject of a comprehensive study on industrial strategy, the preparation of which can be facilitated by the provision of international technical assistance.

Technical assistance can also contribute towards increasing localization of the manufacturing sector. The Government is committed to the rapid development of a local (ni-Vanuatu) entrepreneurial class. This requires the

establishment of an institutional infrastructure for the effective servicing of small industry in which local artisans and craftsmen gradually acquire experience. There is also a need to train both private and public sector entrepreneurs in a wide range of subjects - engineering, accountancy, management, finance, marketing, etc.

Finally the development of Vanuatu's manufacturing sector depends crucially upon the availability of foreign capital. In recent years, foreign finance has displayed a declining trend. International assistance may therefore be provided for attracting foreign capital to Vanuatu. This could involve a wider dissemination of opportunities for manufacturing investment in Vanuatu, the provision of facilities for conducting feasibility and prefeasibility studies. Also, institutional channels could be established through which negotiations for the financing and operation of joint ventures in the manufacturing sector can take place on a regular basis.

Vanuatu has placed some emphasis on expanding manufactured exports in recent years. International assistance can therefore also be provided for identifying export opportunities and for developing an effective international marketing strategy for Vanuatu's major export products.

Appendix 6.A: Investing in Vanuatu

The Government has designated a number of industries as "priority industries". The most important of these are:

- processing of coconut products
- meat processing and canning
- feedstocks for animal husbandry
- fruit juice manufacture
- biscuits and snack foods manufacture
- beer brewing
- leather and leather products
- trochus shell products.

Priority status has also been given to timber industries such as sawmilling, manufacture of wooden furniture and flooring, to boat-building and boat repair, and to the manufacture of pozzolana, lime and cement.

Foreign investment

The Government welcomes proposals from foreign investors which will bring capital, employment, improved technologies, managerial skills and access to overseas markets, particularly in the key development sectors. It will therefore be willing to give sympathetic consideration to such proposals, provided they conform to the policy objectives enumerated above. Vanuatu has a number of tax and other advantages to offer the foreign investor, in addition to a willing and capable work force, a pleasant climate and excellent recreational amenities for expatriates.

Taxes

Vanuatu has no income or profits taxes; Government revenue is derived mainly from indirect sources such as import and export duties, port and airport dues, business licences and work permits.

Appendix 6.A (continued)

Customs duties

Approved projects are eligible for exemption from customs duties on capital goods (including spare parts and maintenance equipment) imported during the start-up period. Exemption from duty can also be obtained on raw materials and semi-manufactures used in products destined for export.

Repatriation of funds

In keeping with Vanuatu's status as a tax-haven, there are no restrictions of any kind on transfers of funds into and out of the country. However, the Government desires to see the funds earned by entrepreneurs re-invested in Vanuatu rather than entirely repatriated overseas. New ventures which follow this sentiment of re-investment will accordingly be viewed favourably and given support through the various incentives available.

Financial services

Vanuatu has a sound financial infrastructure which, in addition to the offshore banking centre, includes five branches of international commercial banks and the Vanuatu Development Bank, which can grant loans of up to approximately US\$ 300,000 for approved industrial projects.

A number of international firms of public accountants are also represented in Port Vila, the capital.

Availability of land

In Vanuatu land can only be leased, not purchased, by foreign nationals. In Port Vila and Luganville, the two main urban centres, prospective lessees normally deal with the statutory Land Corporations, which are authorized to conclude leases (up to 75 years) on behalf of the owners.

If the land is required for industrial purposes, evidence of approval by the Department of Industry must be provided when the application is made (see

also under "Institutional Arrangements" below). In rural areas, negotiations are conducted with the owners directly; however officers of the Lands Department are available to help expedite the procedure.

Employment of expatriate personnel

As a general rule, foreign personnel can only be employed in positions for which no suitably qualified Vanuatu citizen is available. Work permits are normally issued for two years, although a longer validity is possible if necessary to match the duration of the employment contract.

Institutional arrangements

Before commencing any kind of business activity, a business licence must be obtained from the Accountant-General of Vanuatu. The licence can be taken out for any period and is subject to certain conditions, including payment of an annual fee.

Where the intention is to engage in some form of manufacturing or industrial processing, investors are asked to contact the Department of Industry in the Ministry of Finance. The Department can assist in evaluating the viability of an industrial project and can give full information on incentives and facilities available to prospective entrepreneurs, on the types of investment favoured by the Government and on industrial training programmes.

If a joint venture with Vanuatu citizens is planned, the Department of Industry can assist in carrying out a pre-feasibility or feasibility study. If the Department evaluates the project positively, an application may be made to it for registration.

Source: UNIDO, Basic Information for Participants in the Investors' Forum for the South Pacific Region, November 1984.

Appendix 6.B: Industrial investment project proposals,^{a/} 1984

ISIC	Project Number	Project Title
3121	001/V/84-04	Cultivation, harvesting and processing of kava root
3115	002/V/84-05	Copra crushing mill
3115	003/V/84-06	Peanut oil extraction
3320	004/V/84-04	Rattan furniture
3122	005/V/84-08	Stockfeed production

a/ This list includes industrial projects in Vanuatu for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 6.C: The technical co-operation projects of UNIDO

Republic of VANUATU

1. The completed projects since February 1979

<u>Division/Section (Spec.Act.Code)</u>	<u>Project Number</u>	<u>Project Title</u>
IO/INFR (31.3.L)	DP/VAN/79/001	Small and medium-scale enterprise promotion and development (phase I of DP/VAN/85/002)
IO/INFR (31.3.L)	TF/VAN/80/001	Associate expert in Port Vila, Vanuatu
IO/INFR (31.3.L)	TF/VAN/81/001	Associate expert in Port Vila (multifund to DP/VAN/79/001)
IO/INFR (31.3.L)	TF/VAN/82/004	Associate expert (multifund to DP/VAN/79/001)
IO/INFR (31.3.L)	TF/VAN/82/005	Associate expert
IO/INFR (31.3.L)	TF/VAN/83/001	Associate expert (multifund to DP/VAN/79/001)
IO/CHEM (32.1.B)	DP/VAN/79/007	Mother-of-pearl work consultant

2. The ongoing projects

IO/PLAN (31.2.A)	SI/VAN/86/801	Assistance in preparation of a white paper on industrialization policies
IO/INFR (31.3.L)	DP/VAN/85/002*	Small and medium-scale enterprises promotion and development (phase II of DP/VAN/79/001)
IO/AGRO (31.7.B)	SI/VAN/86/045	Improvement of garment designing and manufacturing activity
IO/AGRO (31.7.C)	SI/VAN/86/802	Assistance in the development of the food processing industry
IO/CHEM (32.1.C)	UC/VAN/86/024	Fact-finding mission on sea-salt production possibilities by women in Vanuatu

* Large-scale project (= total allotment \$150,000 or above).

** Total allotment \$1 million or above.

Appendix 6.C (continued)

3. Projects in the pipe-line, 1986

(1) Promotion and development of small- and medium-scale enterprises.

The object of the project is to identify viable projects and promote them in Vanuatu, and to assist the Ministry of Finance, Commerce and Industry and Tourism in the development of policies and plans for the industrial sector.

(2) Assistance in the development of the wood processing industry.

The object of the project is to advise the Government on processing indigenous resources for building materials and other wood products (toys, handicrafts, etc.) and the policies and strategies that should be adopted by the Government in the development of the wood processing industry.

(3) Assistance in the development of the food processing industry.

The object of the project is to advise the Government on the formulation of a plan and policy for the development of food processing, taking into account the variety of fruits, vegetables and root crops available in the country.

(4) Assistance in the development of an industrial estate.

The object of the project is to examine the establishment of an industrial estate on a pilot basis in Vila-Efata and to advise the Government on the appropriateness of setting up an extension service unit as part of the industrial estate.

(5) Assistance in the preparation of a white paper.

The object of the project is to assist the Government in the preparation of a white paper on industrialization policy for the First National Development Plan.

The Government wishes to obtain the following assistance under the regional project in order to supplement the national project - Small- and medium-scale promotion and development, Phase II.

(6) Supplementing national project VAN/85/002 in the training of extension service officers by providing the necessary inputs.

(7) Provision of technical assistance in the manufacture of agricultural hand tools at the small-scale level.

(8) Provision of technical assistance in the design and manufacture of knocked-down furniture and to improve their quality of design and finish.

(9) Provision of the services of an agronomist, to advise on ways and means of improving the quality of the locally available rattan.

Appendix 6.C (continued)

- (10) Provision of assistance in advising and establishing a central purchasing authority for public sector purchasing with an indirect approach, to promote local industries.
- (11) Exposure visits for small-scale enterprises within the region, as well as for government officials and small businessmen.
- (12) Development of pilot plant for charcoal production exclusively for women.
- (13) Development of pilot plant in salt production exclusively for women.
- (14) Development of garment industry exclusively for women.
- (15) Development of standardization infrastructure.

7

TONGA

7. TONGA

7.1 THE ECONOMY OF TONGA

7.1.1 Recent economic trends

During the last decade economic growth accelerated somewhat, though it remained at a modest level, and with some unevenness of progress. This growth has largely, but not entirely, come from increased foreign aid. Growth was interrupted in 1978 and 1980 with the onset of recession, affecting commodity prices and hence export receipts, and inflated oil prices, which affected transport costs. Domestic inflation climbed to over 25 per cent before moderating in 1981 and reaching a 9.2 per cent level in 1983. During this period there have been some small but significant changes in the structure of the economy. Primary production has remained dominant but fell below half of GDP while secondary activities (including manufacturing) have doubled their contribution to GDP. Tourism has grown also over the past decade with greatly improved air services and the growth of 'cruising' in the Pacific. Thus while Tonga still shows considerable trade deficits (far exceeding the value of exports during the early 1980s) the balance of payments position has in fact been strengthened significantly with the help of increased foreign aid flows, tourism and remittances from Tongans working overseas. The economy remains highly vulnerable, however receipts from coconut products fluctuated strongly as a consequence of unstable raw material prices and extensive damage to plantations through cyclones.

7.1.2 Economic structure

Tonga's population was around 99,000 in mid-1984. The country encompasses three main groups of islands, Tongatapu/Ena, Ha'apai, and Vava'u. Only 36 of the Kingdom's 170 islands are inhabited thus the density of population is rather higher than the average of 146 per sq.km. On Tongatapu, where 60 per cent of the population reside, population density is almost double that figure. A unique land tenure system vests the right to all land in the Crown with every male over 16 having the right to an allotment of land of 3.4 ha.

The IBRD classifies Tonga as a middle-income country, with a per capita GDP of US\$ 461 in 1979. Its GNP per capita was estimated at US\$ 904 in 1983. Tonga, like many Pacific island countries, is very dependent on exports and imports and has a considerable negative trade balance compensated only by official aid flows and remittances from nationals working overseas.

The Tongan economy is predominantly based on agriculture which sustains 70 per cent of the population. Food imports mainly consist of meat and fish. In 1981 some 80 per cent of total crop production (mainly fruits and vegetables) was consumed locally and the remainder exported. The export sector is heavily dependent on agriculture and agro-based industries in which coconut products predominate, but exports of manufactures are steadily increasing. Tonga enjoys assured markets for coconut oil, coconut meal, desiccated coconut, bananas, vanilla, kava, water melons and root crops in New Zealand. Market access for tomatoes and capsicums is also normally assured.

Although Tonga has very substantial fisheries resources, thus far these have not been systematically exploited. Increased population and changes in lifestyle have begun to exhaust inshore fishing grounds and have led to a corresponding increase in imports of canned fish. Fisheries contribute 5 per cent of GDP, with 80 per cent of the catch in the inner reef.

The forestry sector on Tonga is small although its output is being expanded with plantings with a view to achieving self-sufficiency in the medium to long term. The manufacturing sector has grown rapidly in recent years. Its contribution to GDP rose from 5 in the 1970s to 9.5 per cent in 1983/84 and declined marginally in 1984/85. Half of manufacturing activity involves food and beverages, wood and wood products. Government has invested in both producing enterprises and in supporting infrastructure. Construction activity has also grown in response to both public and private sector building and contributes over 6 per cent of GDP. As in all small island economies, service activities remain important with transport and communications, trade and commerce, finance and government, community and personnel services together being second to agriculture in GDP contribution.

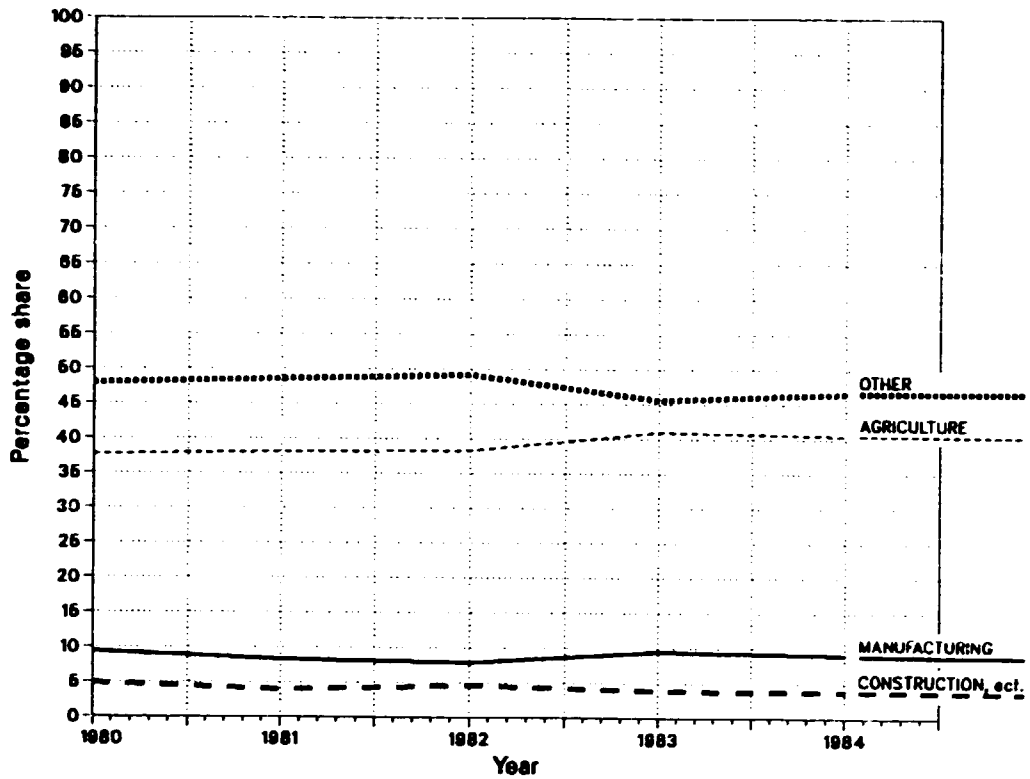
Table 7.1. Distribution of GDP by sector of origin, 1980/81 - 1984/85
(percentage)

Sector	1980/81	1981/82	1982/83	1983/84	1984/85
Agriculture, forestry and fishing	37.7	38.1	38.3	41.0	40.5
Manufacturing	9.4	9.3	7.9	9.5	9.1
Construction, electricity and water	4.9	4.0	4.6	3.9	3.8
Services and other	48.0	48.6	49.2	45.6	46.6

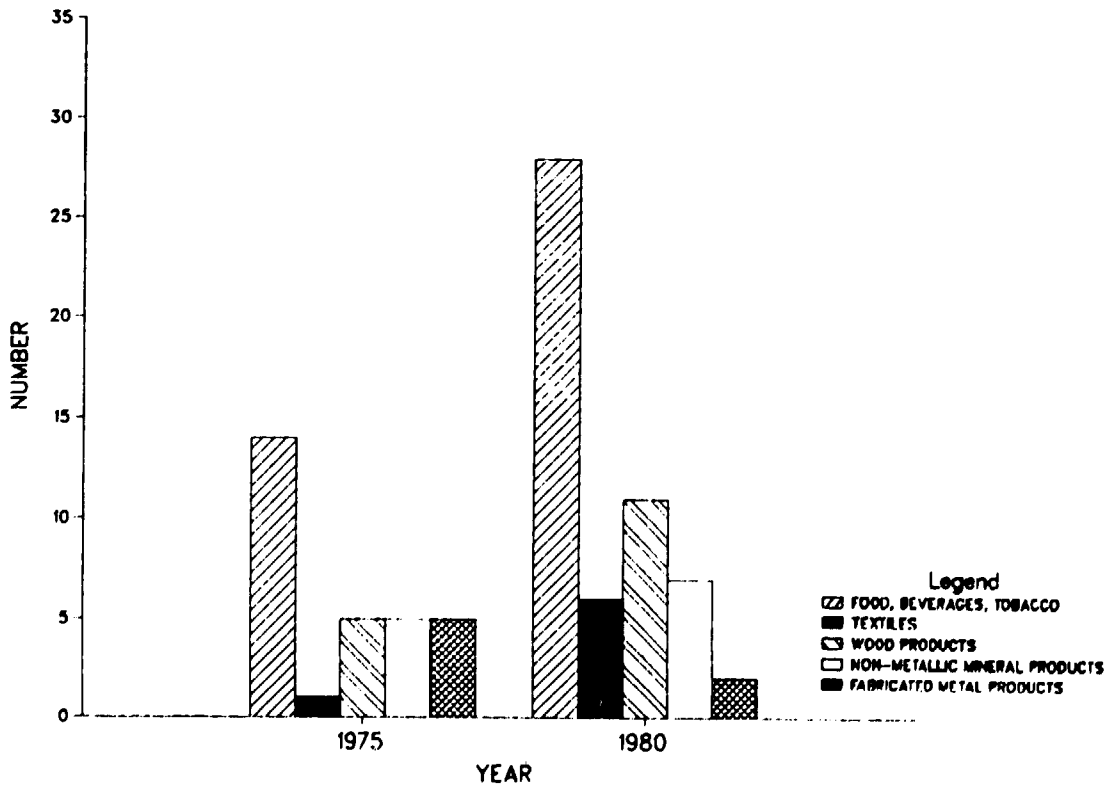
Source: IMF Survey, March 17, 1986, p. 82.

MANUFACTURING TRENDS

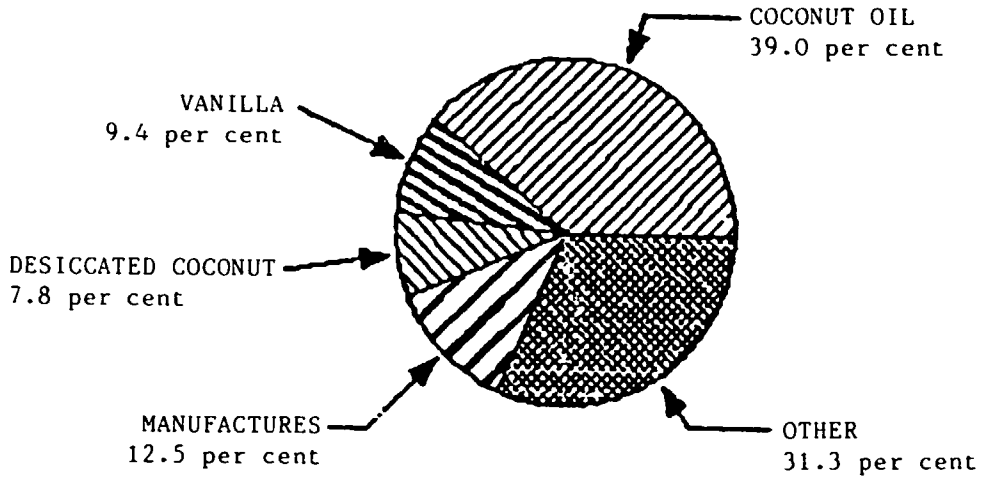
DISTRIBUTION OF GDP BY SECTOR OF ORIGIN, 1980-1984



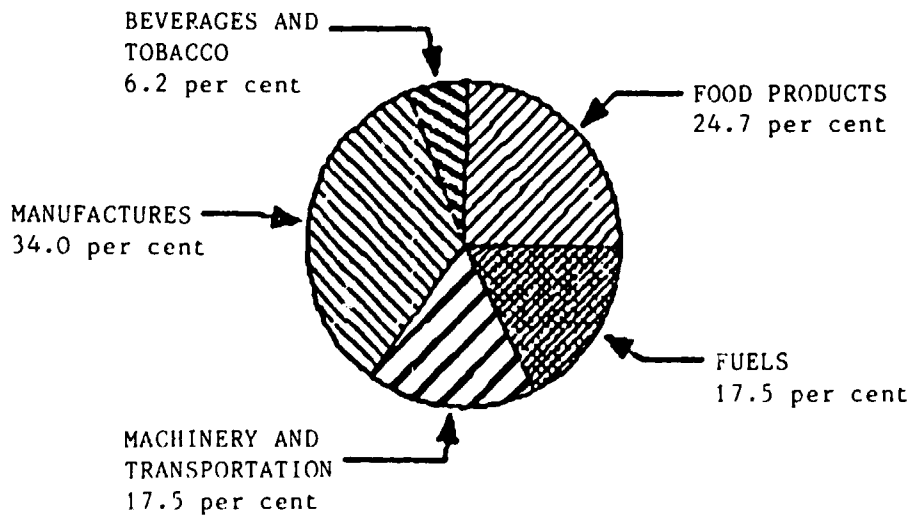
NUMBER OF MANUFACTURING ENTERPRISES IN OPERATION, 1975 AND 1980



MAJOR COMPONENTS OF MERCHANDISE EXPORT EARNINGS, 1983



MAJOR COMPONENTS OF MERCHANDISE IMPORTS, 1983



7.2 STRUCTURE AND PERFORMANCE OF THE MANUFACTURING SECTOR

The manufacturing sector is dominated by the operations of the Tonga Commodities Board which operates the Desiccated Coconut Factory and the Oil Mills of Tonga Ltd. Together these two enterprises accounted for 61 per cent of manufactured exports. Collectively the 13 public sector enterprises account for some 28 per cent of total manufactured output by value T\$ 1.6 million in 1980. The 30 private sector incorporated enterprises produced 65 per cent, and the 29 non-incorporated enterprises 7 per cent. The manufacturing sector is thus predominantly privately owned, although the local churches and some farmers' groups also have limited interests. Altogether, the manufacturing sector consisted of 97 enterprises in 1981, employing 1,630 persons.

Table 7.2. Growth trends in manufacturing activities, 1975-81

	UNIT	1975	1976	1977	1978	1979	1980	1981
1. No. of establishments in operation at end of the year	No.	36	43	48	58	70	69	97
2. No. of persons employed	No.	611	678	788	898	1,042	1,116	1,630
	Males	474	537	641	679	734	747	...
	Females	137	141	147	219	308	369	...
3. Wages and salaries paid	T\$('000)	...	...	...	751.5	868.2	968.6	1,281
4. Weekly hours worked	No.	...	...	...	898	997	1,061	...
5. Value of gross output	T\$('000)	2,052	2,128	3,724	4,298	5,685	8,086	...
6. Value added	T\$('000)	...	...	...	...	...	1,500	3,600

Source: Department of Statistics.

The majority of manufacturing activities are located on Tongatapu (60 in 1980). These enterprises are concentrated in and around Nuku'alofa. By the end of 1982 14 enterprises employing 230 were located at the Small Industries Centre where there was space for a further 12. These small-scale enterprises are labour intensive, low in energy inputs and generally apply simple technologies. Many are export-oriented enterprises producing relatively high-value products for the Australian and New Zealand markets where they

enjoy preferential access. Export products include rugby and soccer balls, woollen knitwear, black coral jewellery and saddlery. Other enterprises cater to local demand producing import substitution products. These include food and beverages, paper products, soap products and toiletries, furniture, wire products and building materials, aluminium products and windows, corrugated iron sheeting. The lack of infrastructure and utilities inhibit the dispersal of manufacturing activities although there are some agro-based enterprises outside the major centres of population including eight on the island of Vava'u, and two each on 'Ena and Ha'apai.

Table 7.3. Number of manufacturing establishments in operation, 1975-80

ISIC	Industry	1975	1976	1977	1978	1979	1980
31	Food/beverages/tobacco	14	15	17	17	24	28
32	Textile/wearing apparel/ leather	1	1	2	7	7	6
33	Wood/wood products	5	6	6	8	10	11
34	Paper products/publishing/ printing	.	.	.	.	5	
35	Chemicals/petroleum/coal/ plastics/rubber products	.	.	.	.	5	3
36	Non-metallic mineral products	5	7	7	8	8	7
37	Basic metal products	-	-	-	-	-	-
38	Fabricated metal products	6	9	11	11	7	7
39	Other manufacturing establishments	5	5	5	7	4	2
	Total	36	43	48	58	70	69

Source: Department of Statistics.

Table 7.4. Contribution of manufacturing sector to GDP by major branches of manufacturing, 1979/80 and 1983/84
(in current T\$ '000)

	1979/80	1983/84 (p)	Average Annual Growth (per cent)
A. Manufacturing	<u>1651.0</u>	<u>4273.1</u>	<u>26.8</u>
Non-copra-based industries	1175.2	...	
Copra-based industries	475.5	...	
B. Household type of Mfs. Units	<u>1192.0</u>	<u>3165.9</u>	<u>27.7</u>
Monetary	315.7	2444.9	31.6
Non-Monetary	376.3	721.0	17.7
C. Total Contribution to GDP (A+B)	<u>2843.0</u>	<u>7439.0</u>	<u>27.2</u>
Monetary	2466.7	6718.0	28.5
Non-monetary	376.3	721.0	17.7
Copra-based	475.5	...	
Non-copra-based	1991.2	...	
D. Mfg. as percentage GDP	<u>6.1</u>	<u>9.5</u>	

Source: Department of Statistics, Nuku'alofa. 1983/84 figures provisional.

7.3 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

7.3.1 Goals of industrial policy

As described in the Fourth Development Plan 1980-85 the government objectives for the development of the manufacturing sector are to:

- maintain and foster the growth of the manufacturing sector;
- increase the utilization of available manpower through the creation of appropriate job opportunities;
- establish compatible agro-based industries to increase the domestic value added derived from agricultural produce;
- diversify and expand production to reduce dependence on various manufactured imports and to take advantage of competitive export opportunities;

- encourage selected cottage industries to utilize available materials and manpower in economically productive activities in regional and rural areas;
- ensure a fair distribution of manufacturing industry between the different regions of the Kingdom;
- foster domestic entrepreneurship.

7.3.2 Policy measures and instruments

Five-Year Plans during 1965-75 devoted little attention to industrial development. Until the mid-1970s, Tonga's industries, with the exception of the coconut industry and handicrafts, were all oriented to local market requirements. The larger enterprises were government owned or quasi-government and most of the enterprises were agro-based, e.g. vanilla processing, banana packing, animal foods. A second group was food and beverages, a third consumer items and construction materials.

The Third Plan 1975-80 was ambitious in its attempt to accelerate growth of GDP, raise the gross investment rate and restrain real consumption. However, the real rate of growth of GDP per head of population was 2.1 per cent against a planned 3.7 per cent. Greater interest in manufacturing growth focused on the construction and launching of the Small Industries Centre for small-scale and light manufacturing activities, especially those oriented to export markets. In the Third Plan period the manufacturing sector accounted for 1.8 per cent of development expenditure, and the Government adopted a policy of encouraging greater participation by the private sector in the process of industrial development. Foreign entrepreneurs were encouraged with a package of incentives, tax holidays and exemptions, with favourable treatment of dividend and repatriation of capital. The Third Plan also sought a more balanced pattern of development of the three main island groups within the Kingdom.

The Fourth Plan 1980-85 encapsulated a more systematic and co-ordinated planning process by a Central Planning Department and the Development Co-ordinating Committee. This Plan put forward specific policies, strategies and programmes for development-building on the broad lines of the Third Plan.

The Government expected about 75 per cent of investment with the manufacturing sector to come from private sources. The public sector share mainly took the form of support infrastructure. Where justified the Government would enter into joint ventures, and would encourage the establishment of manufacturing assembly and processing industries by local and foreign entrepreneurs through the Industrial Development Incentives Act administered by the Ministry of Labour, Commerce and Industries. Under this act an industrial development license is required before starting any manufacturing, assembly or processing activity. In evaluating requests for such licenses, the contribution of a manufacturing enterprise to the domestic economy (in the form of linkages, technology transfer, employment effects and local resource utilization) serves as a main criterion. The aim is to take advantage of the favoured market opportunities and other incentives open to the Kingdom through various trade agreements with Japan, USA, Australia, New Zealand and the EEC. To this end the Government was to provide additional support infrastructure programmes and serviced sites for industry. Fiscal incentives such as tax holidays were also made available to investors.

The targets of the Fourth Plan for the manufacturing sector were a 34 per cent increase in contribution to GDP in real terms to take the sector's share of GDP to 9.6 per cent; output to rise to T\$ 10.2 million (in constant prices) by 1984/85; employment to rise by 600 to 1,600; gross capital formation T\$ 8.0 million. Although exact data on the actual achievements are not available yet, it would seem as if the GDP share and employment goals have been reached.

7.3.3 Institutional framework

Ministry of Labour, Commerce and Industries

This Ministry has overall responsibility for the regulation, promotion and development of the manufacturing sector and for implementing the Industrial Development Incentives Act. Within the Ministry an Industrial Evaluation and Marketing and Promotional Services Unit is responsible for helping potential investors to identify industrial opportunities, assess feasibility studies and facilitate contract development.

Tongan Commodities Board

This government agency runs six enterprises associated with the processing of coconut products, including a desiccated coconut plant and a coconut oil mill. It also has a construction division for the import and supply of building materials, and a product division to market fresh produce, e.g. bananas, pineapples and coconuts. The Board also manufactures toilet paper and laundry soap.

Tonga Development Bank

This bank is the prime financial institution for promoting economic activity and has the Asian Development Bank as a major subscriber. Since 1979 the Bank has approved loans totalling T\$ 5.1 million including some loans to the manufacturing sector. The majority of loans are small, short-term loans with a maturity of less than two years.

7.4 RESOURCES FOR INDUSTRIAL DEVELOPMENT

7.4.1 Labour

According to 1984 estimates the economically active labour force was about 29,500. In 1980, agriculture employed 9,000; government 3,300; manufacturing 1,116 and the remainder in commerce, trade and services. Unemployment was estimated at 17.8 per cent. Despite high levels of unemployment there is an acute shortage of skilled or trained workers; skill acquisition is however discouraged by low wages and a lack of job opportunities. These problems have contributed to migration in search of work or better terms. There are few training facilities outside of Tonga College and Government apprenticeship schemes.

7.4.2 Raw materials

Since agriculture accounts for almost half of GDP it remains the most important basis for secondary activities. Prospects for industrial development are largely dependent on agro-based or agro-processing activities. Export of copra has already been largely replaced by desiccated

coconut and coconut oil with their higher value added. Further prospects include processing coconut shells for charcoal and utilizing coconut steams.

Bananas are Tonga's second most important crop. The serious problem of wastage could be partly solved by the production of banana chips. Production and exports of taro, fruits and vegetables have increased, but considerable further expansion (for which the potential exists) under systematic development and extension programmes would be necessary to provide any surplus for processing.

Tonga's marine resources offer considerable prospects for further expansion, not only to substitute for the annual T\$ 1.1 million of preserved fish imports. A potential exists for increased catches of pelagic species, bottom fish and seasonal species in the deep water slope areas. There is also a large potential for deep sea fishing of albacore and yellow fin tuna, plus an unknown potential for skipjack tuna. Commercial exploitation of offshore and deep sea resources however require investment and training to establish profitable exploitation systems. This could possibly take place on a joint venture basis. The further development of marine resources would enable dispersal of industry/employment to some of the outer islands, thus meeting one of the goals of the Fourth Development Plan. Mineral resources in Tonga are limited to sands and precious corals, although there has been some exploration for petroleum offshore.

Appendix 7.A: Investing in Tonga

Basic principles

The Government of Tonga aims to create an economic environment which will enable the country's agriculture, industry and commerce to flourish. To achieve this goal, priority is being given to promoting a strong and expanding private sector in which local firms are encouraged to participate. Foreign investment in Tonga is also welcomed in sectors where it will contribute to employment, technological advance, improving managerial skills and opening up overseas markets.

An attractive package of tax holidays, customs duty exemptions and export incentives is available to investors. The formalities for obtaining a business licence are simple and straightforward and their completion is the responsibility of a single authority: the Ministry of Labour, Commerce and Industries. For new industries there is an attractive, efficiently run Small Industries Centre close to Nuku'alofa, the capital, with both land and factory buildings available at a modest rental.

Incentives for industrial enterprises

Low tax rates: resident companies pay a maximum 35 per cent of taxable income; the maximum rate for non-resident companies is 42.5 per cent.

Tax holidays: any new industrial enterprise can qualify for exemption from income tax for up to five years. This exemption also applies to additional investments made for the expansion of existing industrial enterprises. Income tax exemptions of up to ten years can be obtained by companies which are "approved industrial enterprises".

Tax exemptions: during the tax holiday period, dividends paid to shareholders of "approved industrial enterprises" are exempt from the 15 per cent withholding tax.

Extension of tax holiday: the Government has taken discretionary powers to extend the tax holiday period, if this would result in long-term economic benefits to the Kingdom.

Appendix 7.A (continued)

Customs duty exemptions: imports of plant and machinery by "approved industrial enterprises" for the purposes of their business are exempt from customs duty during the first two years of operation. Where the resulting finished product is exported, raw materials and semi-finished goods imported by "an approved industrial enterprise" are also exempt without time limit.

Other benefits: in addition to normal depreciation based on the estimated useful life of assets, accelerated depreciation is available to "approved industrial enterprises" during the first five years of operation. Losses may be carried forward without time limit.

Foreign investment

The Government of Tonga views foreign investment as one aspect of a constructive and mutually beneficial partnership, which deserves full encouragement. Projects with the following characteristics will be particularly welcomed:

- processing of local raw materials;
- import substitution;
- high local value added;
- export potential;
- introducing managerial and marketing skills, modern technology and technical expertise;
- employment creation.

Basically, no distinction is made between local and foreign enterprises in awarding incentives. There are however some additional provisions which are of special interest to foreign investors:

Repatriation of funds

Dividends, profits, capital gains, interest payments, and loan repayments may be remitted to the home country of the designated recipient, together with the savings of expatriate employees.

Appendix 7.A (continued)

Local participation

While the Government encourages Tongans to participate in joint ventures with foreign investors, the proportion of foreign equity in an industrial enterprise is not subject to any particular limit.

Development finance

Foreign investors in Tonga are entitled to raise funds in local currency, for example by a loan from the Development Bank of Tonga; it is however expected that the funds required to finance the fixed portion of the investment be brought in from overseas.

Premises

Developed land and factory shells are available on a rental basis in the Small Industries Centre on the main island of Tongatapu; proposals for the leasing of land for industrial purposes at other locations will be given favourable consideration.

Immigration policy

Approved industrial enterprises should experience no difficulty in obtaining residence and work permits for expatriate staff; foreign entrepreneurs establishing "approved industrial enterprise" will be granted permits entitling them to reside in the Kingdom as long as they continue to be in business.

Institutional arrangements

The Ministry of Labour, Commerce and Industries is responsible for issuing business licences, and should be contacted for an application form. Once approved, the licence will contain full details of the project and a list of the incentives granted.

Source: UNIDO, Basic Information for Participants in the Investors' Forum for the South Pacific Region, November 1984.

Appendix 7.B: Industrial investment project proposals,^{a/} 1984

ISIC	Project Number	Project Title
3122	002/V/84-04	Cassava pellets for animal feed
3311	003/V/84-06	Timber treatment
3511	004/V/84-04	Ethenol from cassava
3113	005/V/84-04	Paw-paw fruit processing
3511	006/V/84-08	Compressed oxygen
3819	007/V/84-08	Tin containers
3824	008/V/84-04	Mini excavators
3839	009/V/84-04	Light fittings assembly
3841	010/V/84-10	Aluminium boats

^{a/} This list includes industrial projects in Tonga for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 7.C: The technical co-operation projects of UNIDO

Kingdom of TONGA

1. The completed projects since 1973

<u>Division/Section (Spec.Act.Code)</u>	<u>Project Number</u>	<u>Project Title</u>
IO/INFR (31.3.L)	DP/TON/80/002	Secretary for Ministry of Labour, Commerce and Industry
IO/INFR (31.3.L)	UC/TON/84/140	Secretary for Labour, Commerce and Industries (OPAS)
IO/INFR (31.3.M)	DP/TON/79/004	Industrial promotion
IO/TRNG (31.5.B)	SI/TON/79/801	Handicraft study tour to the Philippines
IO/CHEM (30.4.01)	TS/TON/73/005	Feasibility of solar salt industry

2. The ongoing projects

IO/AGRO (31.7.A)	SI/TON/86/073	Assistance to the furniture and joinery industry
IO/AGRO (31.7.B)	SI/TON/86/072	Rehabilitation of garment industry
REL (70.3.Z)	XP/TON/86/062	Visit to UNIDO Headquarters of the Secretary for Labour, Commerce and Industry to Tonga

* Large-scale project (= total allotment \$150,000 or above).

** Total allotment \$1 million or above.

3. Projects in the pipe-line, 1986

(1) Promotion and development of small- and medium-scale enterprises.

The object of the project is to establish within the Ministry of Labour, Commerce and Industries the capability to identify and evaluate small-scale industrial projects, to provide extension services and training to entrepreneurs in the country and to assist the Ministry in the development of policies and plans for the sector of industry. The

Appendix 7.C (continued)

project proposal will be prepared by the SIDFA and the Government authorities.

(2) Assistance in the development of the wood-processing industry.

The object of the project is to advise the Government on the preparation and adoption of a practical strategy for the development of the wood-processing industry taking into account the types of resources available in the country.

(3) Assistance in the development of the food-processing industry.

The object of the project is to advise the Government on the development of policy for the food-processing industry, in particular for vanilla extrusion and for the production of papain from pawpaw.

(4) Assistance in the preparation of a white paper.

The object of the project is to advise and assist the Ministry of Industry in the preparation of a white paper for the industrial sector as part of the National Development Plan.

(5) Development of a garment manufacturing industry exclusively for women.

(6) Assistance in training of manpower for welding and fabrication of steel and machine shop.

(7) Assistance in the training of manpower for the repair and maintenance of cars, refrigeration, air-conditioning, electronics equipment, office equipment, etc.

8

KIRIBATI

8. KIRIBATI

8.1 THE ECONOMY OF KIRIBATI

8.1.1 Recent economic trends

Prior to 1979 the mainstay of the Kiribati economy was the production of phosphate on Banaba for export. However, just three months after independence reserves were exhausted. The end to phosphate extraction meant the loss of a major source of foreign exchange and significant employment opportunities (some 6 per cent of total). GDP was reduced by almost 50 per cent, and the healthy trading surplus was replaced by an unfavourable trade balance and caused a large and growing public sector deficit.

Prior to 1956 no direct compensation for the phosphate concession was received. However, in 1981 the Banabans received Fiji \$14.6 million as compensation from the British and Australian Governments for the years of exploitation prior to 1956. In the period 1972-78 phosphate revenues amounted to 85 per cent of export revenues, 50 per cent of total government revenues, and 45 per cent of GDP. In anticipation of the exhaustion of the phosphate reserves, substantial proportions of revenues had been invested in special reserve funds overseas with a view to cushioning the transformation of the economy. During the period of dominance of phosphate mining, the remainder of the economy had remained relatively undeveloped, especially on the outer islands, where average incomes (at under Aus. \$100 in 1978) were one-third of those to be found on Tarawa.

Since 1979 copra has been the main export commodity, with export volumes ranging between 6,764 tons and 11,957 tons (these figures are based on the surplus over domestic consumption). Exports of fish, mainly tuna and milk fish for bait, have increased 11-fold since 1979 with the development of commercial fishing. Payments for fishing licences by foreign companies from Japan, Republic of Korea and USSR have also become a significant and increasing proportion of foreign recurrent revenue. Exports of handicrafts have also increased, and though these do not amount to any great value (Aus. \$200,000), they are of significance as a source of cash income for the outer islands.

Kiribati became a member of the IMF on June 3, 1986. With the admission of Kiribati as the 150th member, the total members' quotas in the Fund is SDR 89,307.6 million, including Kiribati's quota of SDR 2.5 million.

8.1.2 Economic structure

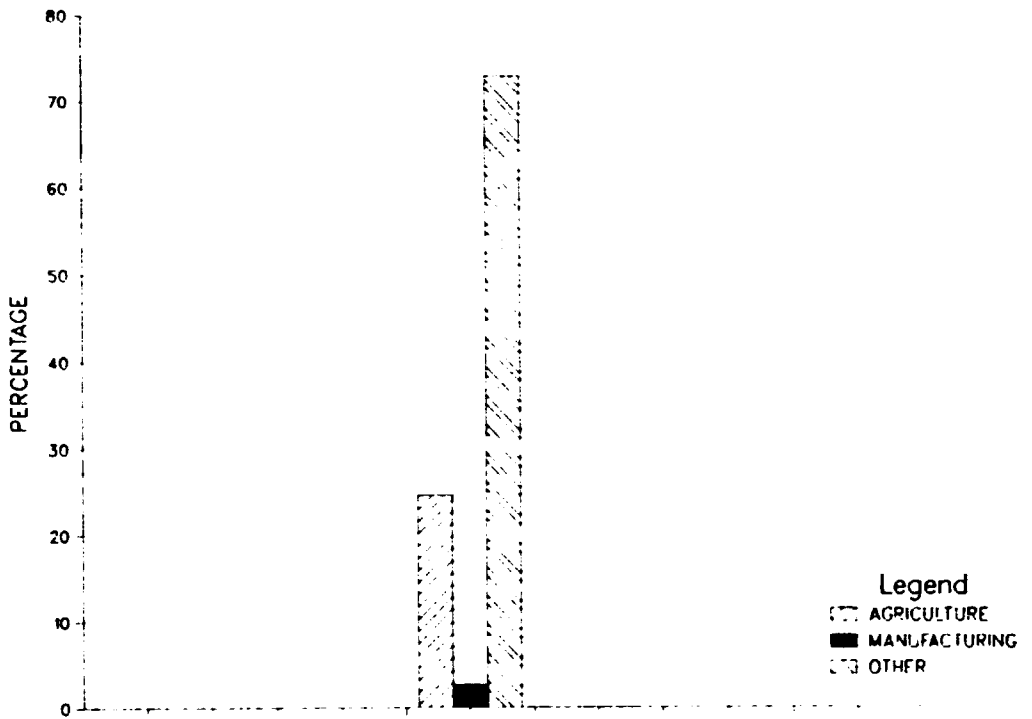
In 1978 the population of Kiribati, a small chain of atolls in the central Pacific, numbered 56,213; by 1985 this had increased to 63,848. In 1985 the annual rate of increase was 2.24 per cent per annum, and 41 per cent of the population were under the age of 15; the population density was 89 per sq. km. One-third of the total population lived on Tarawa, where population grew at a rate of 6 per cent per annum. The total land area amounts to just over 717 sq. km

Estimated GDP in 1982 was Aus. \$27.4 million, some 17 per cent above the level achieved in 1980 but 28 per cent below the level achieved in 1979. In 1978, 56 per cent of monetary GDP was accounted for by the public sector; this figure is now much higher. Between 1979 and 1982 there was a 40 per cent reduction in recurrent revenues which changed a small budgetary surplus of Aus. \$0.5 million into a deficit of Aus. \$6 million. However, the ability of the Government to raise tax revenues is severely limited by the nature of the economy and the likely adverse impact on development initiatives. Furthermore the geographic isolation of Kiribati, and its small and widely scattered domestic market impose considerable and severe constraints on the pattern and nature of development options available to Government. Yet there is a pressing need for alternative sources of foreign exchange to meet the cost of food and fuel imports. Even with rapid agricultural development, it is not likely that Kiribati will achieve or even approach self-sufficiency in the foreseeable future.

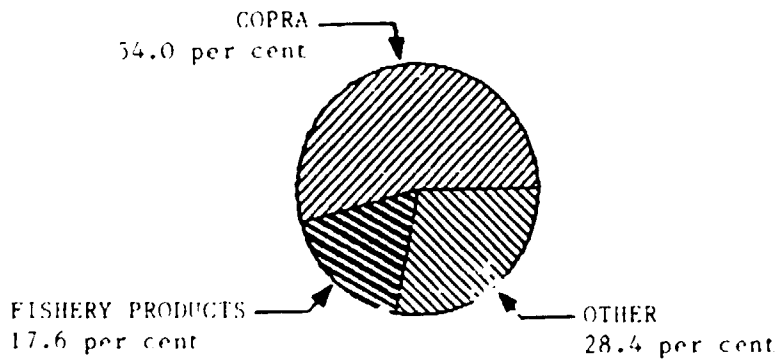
The majority of the population depends on subsistence agriculture and fishing, but most have supplementary cash incomes from the sale of copra or from overseas remittances. The major subsistence activities include fishing, coconuts, housing and canoe building, and handicrafts. However on Tarawa there is much greater opportunity for income earning employment than elsewhere, with 64 per cent of all cash employment to be found on the most urbanized atoll. There is a potential for tourism which could be exploited by improving international transportation and accommodations.

MANUFACTURING TRENDS

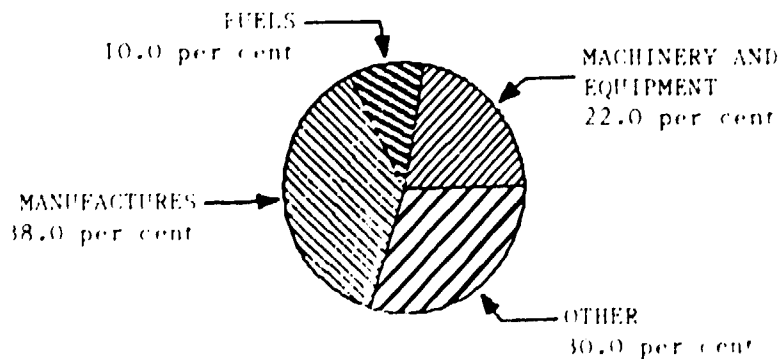
DISTRIBUTION OF GDP BY SECTOR OF ORIGIN, 1982



MAJOR COMPONENTS OF MERCHANDISE EXPORT EARNINGS, 1984



MAJOR COMPONENTS OF MERCHANDISE IMPORTS, 1984



8.2 INDUSTRIAL DEVELOPMENT STRATEGIES, POLICIES, PLANS AND INSTITUTIONS

8.2.1 Overview of the manufacturing sector

Manufacturing activities are very limited in scale and content in Kiribati; in 1978 manufacturing contributed 0.7 per cent of GDP and accounted for approximately 3 per cent of total employment. Small-scale industrial activities are to be found in the main on Tarawa, the most 'urban' of the islands, where 66 per cent of all retail sales occur and where there are a small number of enterprises, including public sector workshops, producing tools, bread and other food products. Handicrafts are produced predominantly in the outer island villages. Half of the registered businesses in Kiribati are small traders; there are also a number of small construction enterprises, retail outlets, and co-operatives.

8.2.2 Goals of industrial policy

The overall development aim of the Government of Kiribati is to secure economic independence, bearing in mind its underlying concern to maintain a balance between population and resources (both available and potential). The Government's priorities have been influenced by resource constraints, by the need to generate foreign exchange through productive development, and the need to finance government expenditure and provide additional employment opportunities. One of these priorities - the need for good communications - flows directly from the dispersed nature of the country. Other related priorities - the development of the outer islands and the decentralization of development services from the urban centre - flow from the need to avoid an excessive concentration of wealth and development. Expenditure for the manufacturing and service industries category amounted to less than 2 per cent of the Development Fund estimates for 1985, public utilities and communications being by far the most important category.

The Government's strategies for greater economic independence include:

- development of new and existing industries based on marine and other natural resources;

- encouragement of foreign investment, particularly for exploitation of natural resources and in the commercial and industrial sub-sectors;
- restraining government expenditure at levels which can be maintained for the foreseeable future; and
- encouraging domestic export-oriented entrepreneurship.

Strategies for decentralization are focussed on:

- encouragement of improvements in subsistence income;
- increased opportunities for cash earning; and
- maintaining and improving rural services.

8.2.3 Institutional framework

In Kiribati the Ministry of Natural Resource Development is responsible for the development of agriculture, tourism, fisheries, etc. The Ministry of Trade, Industry and Labour handles the export of copra.

Public services in Kiribati are concentrated in the Bairiki and Betio, urban centres, South Tarawa, which account for 70 per cent of all employment in the public sector. The Government has placed increasing emphasis in recent years on the devolution of responsibility from central to local government in matters ranging from administration to production. The policy of decentralization has been implemented through the strengthening of local government machineries, improved community development initiatives towards increased self-reliance in the rural areas, as well as through stricter controls on urban development on Tarawa.

Local government in Kiribati is based on a system of elected local island councils, of which there are 19 in all including two urban councils. These local councils are active in identifying and formulating development projects. Their effectiveness however has been limited by geographic isolation, lack of plant and tools, and limited staff, training and professional skills, especially in financial management. Local development priorities include water supplies and sanitation, hospitals and clinics, dispensaries, government and private housing, causeway construction and maintenance, and sports facilities.

8.3 RESOURCES FOR INDUSTRIAL DEVELOPMENT

8.3.1 Labour

According to the 1973 census the labour force numbered 24,059, of which 21 per cent were in wage employment. By 1988 the work force is expected to number 31,200. In the past, population pressures have been relieved by outmigration and resettlement. However this is no longer an option save perhaps in the northern Line Islands, two of which were recently purchased by the Government to further their planned development. Agriculture provides employment for some 7 per cent; manufacturing 3 per cent; construction 15 per cent. Half of the existing employment opportunities are in the public sector but some I-Kiribati do migrate to find work overseas or else on ocean going vessels.

8.3.2 Raw materials

The atolls of Kiribati comprise coral sand and rock with little or no soil. Rainfall is very variable save in the northern islands resulting in limited agricultural development. Copra is the major source of cash income for 70 per cent of the rural population. Smallholders produce 80 per cent of the total crop, although their productivity varies considerably despite fairly stable prices. Major plantations are to be found in the northern Line Islands, Tabuaeran, Teraina and Kiritimati. There has been some coconut replanting in recent years with UK aid. Coconuts offer some potential for processing (coconut oil, coir and related products). There are also some limited possibilities for the milling of coconut timber for the local market, although the land tenure system impedes systematic development.

Marine resources within the 200 mile EEZ offer the best potential for development on both commercial and subsistence bases. The establishment of commercial fishing for skipjack tuna has contributed to a recent significant increase in exports of marine products, including crayfish, crabs, milkfish and mullet. Fisheries licences for foreign off-shore fleets are becoming an increasingly important source of foreign exchange.

While some small deposits of phosphates remain on Banaba, these are not economic for further exploitation. Manganese nodules have been discovered on the seabed in the Line Islands but exploitation is unlikely in the short term. On Kiritimati Island salt production by evaporation is shortly to commence.

The economy of Kiribati since 1979 has been aid dependent; in 1984, for example, just over 50 per cent of total government revenues came from external sources. In the immediate post-independence period, between 1979 and 1982, UK aid amounted to Aus. \$31 million. Australia contributed Aus. \$7 million between 1980 and 1983, and in 1981 Japan gave Aus. \$2 million and New Zealand Aus. \$0.6 million. Overseas remittances from migrant workers are another significant source of foreign exchange, normally totalling over Aus. \$1 million per annum.

Appendix 8.A: Investing in Kiribati

Industrial policy

The objectives of Kiribati's industrial policy are:

- to expand manufacturing and industrial activity by local people;
- to encourage foreign investment in manufacturing industry which meets the criteria laid down for foreign participation.

Foreign investment will be particularly sought for projects which

- create employment;
- expand exports;
- reduce dependence on imports;
- require substantial investment;
- require foreign technological and management skills;
- promote access to new export markets.

The Government of Kiribati encourages local participation in joint ventures with foreign investors.

Remittances of funds

Subject to fulfilling exchange control requirements, foreign investors are entitled to repatriate profits and capital invested. They may also remit amounts necessary to meet loan repayments and service charges and the costs of other foreign obligations approved by the Government.

Kiribati treats all investors alike: there can be no discrimination against an enterprise or an investment on the grounds of its origin.

Appendix 8.A (continued)

Incentives

Applications for the fiscal and other investment incentives available in Kiribati are dealt with on a case-by-case basis, so that the benefits offered can be adapted to the circumstances of the enterprise.

Pioneer status: firms qualifying for pioneer status are entitled to a five-year income tax holiday, including income distributions to shareholders and/or proprietors.

Protected status: an industry may be given protection from competition during the "infant industry" stage, if this is considered to be in the public interest.

Low rates of taxation: public and private companies pay a low 25 per cent on their profits, and there are no capital gains or sales taxes.

Import duties: concessionary rates of duty may be given in appropriate circumstances.

Development finance: help with financing new industrial ventures can be given in certain circumstances; it may take the form of equity participation by the Government.

Other benefits: Kiribati offers generous depreciation allowances on capital assets. Interest payable on foreign loans may be remitted 75 per cent free of withholding tax; there is no withholding tax on dividends paid to overseas shareholders.

Sites and services

The Government can assist in locating suitable sites for industrial processing activities and in drawing up leases. Plans exist for an industrial estate to be set up in the near future.

Appendix 8.A (continued)

Labour resources

Recruiting local staff: there is a Government employment service which can offer advice on the availability of skilled, semi-skilled and unskilled labour.

Employment of foreign labour: expatriates may be employed for posts for which no suitably qualified nationals are available.

Institutional arrangements

The Ministry of Industry, Trade and Labour is responsible for the industrial development of the country and all enquiries and applications should, in the first instance, be addressed to the Ministry.

Source: UNIDO, Basic Information for Participants in the Investors' Forum for the South Pacific Region, November 1984.

Appendix 8.B: Industrial investment project proposals,^{a/} 1984

ISIC	Project Number	Project Title
3115 3523	001/V/84-06	Coconut oil and soap
3420	002/V/84-06	Exercise books production
3813 3819	003/V/84-06	Sheet metal fabrication

a/ This list includes industrial projects in Kiribati for which foreign co-operation, such as joint venture or other partnerships, acquisition of technology, management expertise and marketing assistance, is sought. Enterprises interested in the possibility of participating in any of these projects can obtain more detailed information, including the name and address of the sponsor, from UNIDO Investment Promotion Service. This information usually takes the form of a standard industrial investment project questionnaire. Copies of studies, when these are available, may then be obtained from the project sponsor. UNIDO does not accept responsibility for accuracy or completeness.

Appendix 8.C: The technical co-operation projects of UNIDO

KIRIBATI

1. The completed projects

<u>Backstopping Responsibility (Spec.Act. Code)</u>	<u>Project Number</u>	<u>Project Title</u>
IO/INFR (31.3.L)	DP/KIR/80/004	Coir industry feasibility study
IO/CHEM (32.1.C)	SI/KIR/79/801	Assistance in salt production

2. The ongoing projects

IO/CHEM (32.1.C)	DP/KIR/80/002*	Solar salt pilot plant
------------------	----------------	------------------------

* Large-scale project (= total allotment \$150,000 or above).

** Total allotment \$1 million or above.

9. THE FEDERATED STATES OF MICRONESIA

Adjoining the South Pacific area, and with a total population of 91,240 (1985) which lives scattered over hundreds of islands, the Federated States of Micronesia (FSM) exhibit many of the development problems of micro States.

The Federated States of Micronesia are Kosrae, Pohnpei, Truk and Yap. These States seem to have chosen a status described as "autonomous in free association with the United States". Half of the total population lives in Truk. GDP of FSM was US\$ 106.5 million in 1983, with a subsistence component of 40 per cent. Exports in the same year amounted to US\$ 3.59 million and were dwarfed by imports worth US\$ 58.53 million.

An overview of economic activity in the monetized sector is given in Table 9.1. It shows that trade was the most important activity in terms of employment and number of establishments. The share of manufacturing is very modest, with less than 4 per cent of the surveyed enterprises and less than 6 per cent of total employment. The greater part of activities in the monetized sector is located in the State of Pohnpei, and 20 out of a total of 24 manufacturing establishments are located in Pohnpei as well. So far, little development of national resources has taken place outside the subsistence sector. Mineral resources on the islands are not considered significant (except for the building materials industry) but seabed mineral resources have not been explored yet.

As a prelude to effective industrial development of the FSM, the Governments have for the past several years engaged in certain small-scale industrial activities. These programmes were primarily experimental and are characterized by their smallness in scale of operation, geared in most cases toward meeting the needs of the community in which they operate. Employment creation has been limited, in part due to the choice of technologies employed. Where functioning, production has been unstable; on the other hand, the local market has been surprisingly limited. Costs of imported raw materials are high and efforts at obtaining local substitutes for these raw materials have been slow in yielding results. Table 9.2 gives an overview of manufacturing operations sponsored by the Government, reflecting the country's development efforts up to 1984.

Table 9.1. Distribution of business establishments and employment,^{a/} 1983

Business Category	Irak		Koror		Yas		Pohnpei		Total	
	Establish-ments	Employees	Establish-ments	Employees	Establish-ments	Employees	Establish-ments	Employees	Establish-ments	Employees
Poultry	-	-	-	-	2	3	-	-	2	3
Manufacturing	-	-	3	6	1	2	20	131	24	139
Construction	2	21	3	70	-	-	2	35	7	126
Wholesale trade	13	473	5	52	2	22	23	311	42	839
Retail trade	193	372	46	141	29	51	184	374	452	938
Restaurants & hotels	13	61	2	11	-	-	18	128	33	202
Transportation, storage, communications	1	83	2	36	1	35	15	30	19	184
Finance & insurance, etc.	-	-	-	-	-	-	19	54	19	54
Repairs to motor vehicles	1	1	4	15	4	12	25	41	34	69
Total number in survey	223	1,011	65	331	39	125	306	1,104	633	2,571
Estimated total number	237	na	77	na	47	na	326	na	687	na

Sources: FSM Department of Resources and Development and State Business Establishments Survey, April 1984; Pohnpei State Directory of Business Establishments, April 1984.

a/ The figures in this table cover only those establishments responding to the business establishments surveys; no information is available on employment in other establishments. Employment figures are not directly comparable, since different definitions of "employee" were used.

Table 9.2. Government-sponsored industrial development programmes, 1984

Location	Project	Approximate investment ^{a/}	Employment ^{a/}
Truk	Small industry center	\$138,000	6
	Truk coconut processing plant	\$383,000	10
	Truk boatbuilding plant	\$170,000	na
	Breadfruit-flour processing	\$ 22,000	na
Pohnpei	PATS coconut processing plant	\$250,000	na
	Zori manufacturing plant ^{b/}	\$ 30,000	na
	Ice production plant ^{b/}	\$ 83,000	4
Yap	Cottage industry development programme	...	...
Kosrae	Small industry centre ^{c/}	-	-
	Wood processing facility ^{c/}	-	-
National Gov't. & Pohnpei	Laterite brick manufacturing plant ^{c/}	\$500,000	20

Source: The Federated States of Micronesia, First National Development Plan, 1985-89.

^{a/} To date or expected when operational.

^{b/} To be transferred to interested private entrepreneurs if proven successful.

^{c/} Proposed programmes, but may be operational before the implementation of the Plan.

Responsibility for development lies primarily with the individual states which have formulated 5-year plans. The First National Development Plan of the Federation (1985-89) is in essence a series of separate plans. The National Plan also serves as a guideline for US aid, which is the major component in development finance. There is close co-operation with the US, the former UN Trustee for Micronesia, through the 1983 Compact of Free Association.

An overview of planned development allocations for commerce and industry in The Federated States of Micronesia may be found in Table 9.3.

Table 9.3. Planned development allocations for commerce and industry, 1985-89
(in US\$ '000)

Programme/Project	1985	1986	1987	1988	1989	Total
National Government						
Dev. advisory services	251	250	250	250	251	1,252
Business loan programme	250	250	250	250	250	1,250
Trade promotion programme	70	80	50	50	50	300
Subtotal	571	580	550	550	551	2,802
Yap State						
Technical services center	200	170	100	53	-	523
Feasibility studies project	100	100	100	-	-	300
Cottage and small/medium-scale industries	200	250	350	350	347	1,497
Development loan fund	260	255	250	-	-	765
Handicraft programme	20	25	28	30	30	133
Subtotal	780	800	828	433	377	3,218
Truk State						
Business training	17	20	23	26	30	116
Industrial park development	100	100	40	-	-	240
Development loan fund	1,000	1,200	1,200	1,200	1,200	5,800
Handicraft/other programmes	15	10	45	35	40	145
Wood product industry	30	30	60	80	105	305
Cocunut processing	5	70	45	15	15	150
Garment factory project	15	10	50	85	55	215
Food processing	10	10	10	31	27	88
Subtotal	1,192	1,450	1,473	1,472	1,472	7,059
Koror State						
Research & development fund	20	20	20	20	20	100
Small industries development	55	35	35	50	25	200
Production development loan fund	300	300	300	300	300	1,500
Subtotal	375	355	355	370	345	1,800
Pohnpei State						
Fish cannery (joint venture)	-	-	3,500	-	-	3,500
Arabushi factory (joint venture)	250	-	-	-	-	250
Marine railway/ship repair facility (joint venture)	-	1,250	-	-	-	1,250
Mix feedmill	-	130	130	50	50	360
Lumber treatment plant	-	50	10	10	5	75
Small industries	250	250	250	250	250	1,250
Industrial park	750	750	1,500	1,500	1,500	6,000
Revolving handicraft purchasing fund	10	-	-	-	-	10
Handicraft promotion marketing	7	7	5	5	5	29
Packaging material fund	3	-	-	-	-	3
Handicraft training, skill upgrading and extension	45	45	45	30	30	195
Subtotal	1,315	2,482	5,440	1,845	1,840	12,922
TOTAL	4,233	5,667	8,646	4,670	4,585	27,801

Source: The Federated States of Micronesia, First National Development Plan, 1985-89.

During the Plan period, the States and the National Government will pay special attention to technical assistance, training, export promotion and the development of the construction industry. Attempts will be made to attract foreign investors to take part in joint ventures. These are expected to improve domestic skill and know-how levels and management techniques, to increase the participation of nationals in industry and to establish overseas markets for FSM products. Manufacturing sectors identified as being potentially attractive for foreign investors are agro-industries, wood, wood processing and furniture, fish and meat processing, building materials, textiles and leather and shipping. However, a more coherent and predictable set of development policies will have to be formulated to attract outside investors.

10

**PACIFIC ISLAND MICRO STATES:
COOK ISLANDS, NAURU, NIUE AND TUVALU**

10. PACIFIC ISLAND MICRO STATES

10.1 ECONOMIC STRUCTURE AND RECENT ECONOMIC TRENDS

Within the South Pacific region there are eight micro States and territories, defined as having a population of less than 25,000 and a surface land area of less than 500 sq. km. These are:

Cook Islands, pop. 17,900, area 234 sq. km
Nauru, pop. 7,254, area 213 sq. km
Niue, pop. 3,288, area 258 sq. km
Norfolk Island, pop. 1,900, area 36 sq. km
Tokelau, pop. 1,565, area 10 sq. km
Tuvalu, pop. 7,349, area 26 sq. km
Pitcairn Islands, pop. 64, area 4.5 sq. km
Wallis and Futuna, pop. 10,200, area 255 sq. km

Two of these micro States are fully independent, Nauru and Tuvalu; three, the Cook Islands, Niue and Tokelau, are internally self-governing with differing kinds of association with New Zealand; and three, Norfolk Island, Pitcairn Islands and Wallis and Futuna, are colonies or dependencies. This section of the Review is concerned with the four independent and autonomous micro states which possess some degree of industrial activity.

COOK ISLANDS

The Cook Islands have a total population of 17,900 and cover over 1,000,000 sq. km of ocean. There is a steady decline in population through migration to New Zealand.

The economy is a highly dependent one, heavily biased towards the service sector, especially public administration and social services. These are largely financed by aid. Agriculture is the most productive sector, employing over 20 per cent of the work force and producing (under high levels of subsidy and support) food for local consumption as well as copra, citrus, pineapples, bananas, and other fresh fruit for export. Shifting cultivation is still common and the expansion of more intensive cultivation is limited by lack of labour, lack of effective internal transport, low rates of return,

underutilization of the land through multiple land ownership and absentee landlords.

A high proportion of exports are processed or manufactured prior to shipment, e.g. citrus and pineapples. However, a recent decline in agricultural production, especially in export crops, neglect of subsistence crops, and the elevated status of 'western' foodstuffs have increased the propensity to import. Manufacturing and processing activities employ 7 per cent of the work force, mainly in clothing and citrus processing. Other industrial activities include bread and soft-drink manufacture, sheet metal forming, fibre-glass production, aluminium joinery, sawmilling, milk reconstitution, ballet shoes, sausage-case making, spirit blending, and electronics, as well as handicrafts, joinery, quarrying and building materials and construction. Expansion possibilities exist in fruit processing (guava, pawpaw) and the production of purees and nectars, but in general industrial projects have limited potential through the lack of raw material, the restricted size of the domestic market, import restrictions in foreign markets, the remoteness of the islands, manpower and skill shortages, and the lack of local investment capital. Thus far, fishing in the Cook Islands takes the form of traditional in-shore semi-subsistence activities confined to the lagoons of the northern isles and the reefs of the southern group. In-shore fisheries offer substantial import substitution possibilities with the 12-mile zone now exclusively reserved for local boats. Licensing of commercial fishing in the 200-mile EEZ is under way.

The First Plan, 1982-85, aimed to curb migration, develop resources of the outer islands, raise prosperity, and promote greater economic independence and self-help. The Plan sought to increase income earning opportunities through the encouragement of private sector investment and the improvement of basic support services. Joint ventures were to be encouraged and trade links with French Polynesia and American Samoa strengthened.

NAURU

Nauru, like Banaba and Makatea, is a phosphatic rock island. It will follow Banaba in exhausting its phosphate reserves before the end of this century. Phosphate mining is the predominant economic activity and determines

land use. Agricultural production is limited to small-scale growing of food crops for domestic consumption on the coastal periphery, the majority of top soil having been lost through open cast mining. Out of a total population of 7,354 in 1977, only 57 per cent were Nauruan in origin, with a further 26 per cent from other Pacific islands. The numbers of non-permanent residents on Nauru vary according to the labour requirements of the Government and the mining company. Demand for more highly skilled staff has increased with economic development but the proportion of non-Nauruans declines as local people qualify to participate more fully in economic activities.

The depletion of phosphate reserves has led the Government to pursue a policy of investment in services and overseas activities plus local investment projects designed to provide income and employment opportunities for the period after mining ends circa 1992. Thus far a high income from phosphate royalties, lack of taxes and provision of many free services by Government have maintained an average standard of living which is higher than any of the other Pacific islands. There is some fishing on Nauru both for local consumption and for sport and in 1980 a purse seining operation began to export small quantities of tuna. Commercial activities on Nauru focus mainly on combined import/retail operations, and on catering/entertainment. There are no industrial enterprises. Since the change of ownership of the phosphate mine in 1970, however, there has been an increase in investment in additional processing facilities prior to the export of phosphates - for beneficiation and for removal of carbon and cadmium.

NIUE

Niue is an isolated, upthrust coral atoll with rugged and rocky terrain, little surface water and limited resources. In 1980 Niue had a population of 3,288. The size of population declined to 2,556 in March 1986. GDP was estimated at NZ\$ 6,651,000 in 1983/84. Some 30-40 per cent of the limited land area is unsuitable for cultivation. On the remainder, particularly on the pockets of rich soil, passionfruit, limes and taro are grown as cash crops; there is also some shifting cultivation. Large-scale cropping is hampered by the land tenure system with its absentee smallholders, multiple ownership of land and fragmentation of land titles.

Niue's economy exhibits a low degree of self-reliance with a wide gap between domestic production and demand for goods and services. The resulting trade deficit makes for dependence on aid. There is significant agricultural development potential, but agriculture is vulnerable to cyclones. While most Niueans are active in subsistence cultivation, few people derive their total income from agriculture. Poor returns under difficult conditions make full time cultivation unattractive.

Niue has significant forest resources, some 5,500 ha. of merchantable timber, but the country is not able to produce the high volumes and consistent qualities required for export. Niue's fishery resources are substantial, but handling facilities and local fishing capacity are limited and require further investment in order to be able to exploit the 200-mile EEZ. Livestock is an important part of subsistence production, but economic development of this subsector is hindered by the high cost of imported animal feed.

Niue does possess some small manufacturing operations; these include agro-based activities such as pulping passionfruit, processing lime oil, packaging and marketing honey, garments, leather-ware, vehicle repair, fruit preservation, bakeries and joineries, as well as handicrafts which include wood carving, tapa-making, woven wares from pandanus and coconut palm leaf.

There are 731 persons employed in different economic activities, out of which only 31 (4.2 per cent) are in the manufacturing sector (see Table 10.1).

Table 10.1. Employed persons by sector and kind of economic activity, 1985

Kind of economic activity	Public sector	Private sector	Total
Agriculture	92	-	92
Quarrying	15	-	15
Manufacturing	12	19	31
Electricity	25	-	25
Construction & maintenance	65	4	69
Trade, restaurants & hotels	13	85	98
Transport and communication	54	1	55
Finance, business services	-	1	-
Community, social & personal services	337	9	346
Total	613	118	731

Source: Quarterly Abstract of Statistics, December 1985.

Niue has a policy of import substitution, if manpower and land resources permit. The relatively skilled work force is a significant asset but the extreme fragility of a very small economy and diseconomies of scale are major disadvantages. Given the existing levels of development of social services and government employment (86 per cent of total) there is a major difficulty with initiatives to revert to the traditional agricultural economic base. The Government faces further difficulties in financing the existing government structure and activities, since the financial and manpower resources required do not relate to population size. The First Development Plan, 1980/81-1984/85, sought to increase self-reliance and the Government's ability to meet a substantial share of the cost of maintaining existing budget levels. It is accepted that the complete removal of economic dependence is not attainable, but greater utilization of indigenous resources is expected to raise the degree of self-reliance. The major thrust towards developing additional employment opportunities has been to encourage private sector investment in agriculture, in agro-industries, and in light manufacturing.

Table 10.2. Value of exports, 1982-85
(NZ \$)

	1982	1983	1984	1985
Passionfruit products	70,552	24,747	45,376	14,142
Lime products	10,392	12,384	33,629	18,895
Honey products	19,769	7,378	16,463	19,567
Coconut cream	269,125	433,544	20,748	...
Handicrafts	44,013	21,356	23,482	22,544
Football	124,943	114,925	61,387	22,559

Source: Quarterly Abstract of Statistics, December 1985 and March 1986.

It is imperative that the manufacturing sector is developed on a priority basis. The White Paper on Manufacturing Industry (draft subject to approval) broad policies for industrial development have been spelled out. The White Paper also outlines promising product areas in the sphere of industrialization: honey production and packaging; wax candles; furniture making; fish canning industry; fishmeal; animal and poultry feed; handicrafts, conal and semi-precious jewellery; printing of stationery and posters; garment making; batik and other cloth printing; metal working and engineering; herbal

extracts; fruit skin preserves; coir and coir mats, coconut oil and soap; coconut shell charcoal; and canning and processing of lobster coconut crab.

TUVALU

All nine islands which make up Tuvalu are low-lying atolls with little or no soil, no surface water and no forest vegetation. Total population amounts to 7,349 within a total land area of 26 sq. km, giving the second highest population density in the region. Funafuti, the seat of government and centre of commerce attracts a disproportionate share of the population with its better employment prospects, higher incomes per head (almost five times higher than the outer islands) and urban services.

The economy is predominantly subsistence oriented. In 1979, 79 per cent of the economically active population were outside the cash economy; since separation and independence, however, there has been increased participation, mainly through public sector employment. 10 per cent of GDP comes from agriculture, which remains largely subsistence oriented. The harsh environment, fragmented land ownership of land holdings and difficulties in communications and transport, combine to constrain severely agricultural development potential. Consequently, marine resources are likely to present the major opportunities for commercial exploitation in the future. The presence nearby of manganese nodules on the seabed prompted the extension of territorial waters to create a 200-mile EEZ, which covers 800,000 sq. km. Traditionally, fishing has been limited to inshore and reef fishing. Planned developments include tuna fishing for export, the licensing of foreign fishing in territorial waters, and the improvement of subsistence fishing. There are no manufacturing activities in Tuvalu, although there are a number of small family enterprises which produce garments, printing, and process of coconut timber.

Tuvalu's large visible trade deficit is compensated for to some extent by invisibles and remittances from overseas. The economy remains aid dependent. Recent development plans have sought to improve standards of living, preserve Tuvaluan culture, and control the growth of government expenditure to levels sustainable through self-reliance. Major constraints on development include lack of essential infrastructure and services, notably electricity, piped water and sewerage. The country also lacks a deep-water wharf and building

sites. The Government's strategy is to achieve greater progress towards self-sufficiency in food through the introduction of new crops and the expansion of simple, small-scale industries to create employment within the family context and provide inputs and support products for fisheries and agriculture.

10.2 INDUSTRIAL GROWTH PROSPECTS IN MICRO STATES

The resource endowment of micro States is extremely narrow and vulnerable. High population densities and growth rates in relation to their resource endowment make it difficult to maintain existing standards of living. Most micro States suffer from extreme isolation and have an economic structure which is skewed towards one particular resource; consequently, they are vulnerable to external pressures and sudden economic changes as well as to the vagaries of tropical weather and particularly cyclones. Their predominantly subsistence economies lack the revenue raising abilities to maintain unaided minimum levels of government and administration as well as the urban and social services demanded by their populations. Their own planning and implementation capabilities are inadequate to the task of mobilizing their development potential, limited though this is. Technical and production skills are generally lacking even to maintain essential services; this is largely because of emigration to the nearest or most influential regional centre of economic activity in search of employment or improved terms of employment.

Micro States tend to remain dependent on major regional powers for financial resources and technical expertise to carry out their development programmes. Furthermore recurrent expenditures are often supported by bilateral assistance, and policy-making and implementation are inevitably heavily circumscribed. In terms of industrial development, the very limited domestic market opportunities can support only very small-scale, low technology activities using local raw materials. Such small economies possess few comparative advantages vis-à-vis the larger, external or regional markets with which they are inextricably linked. Inevitably the public sector tends to dominate, not only in essential services, but also in trading and distribution; consequently the public sector tends to assume roles and responsibilities which it is not always well-equipped to fulfill. There is

very little in the way of private sector initiative or enterprise with access to sufficient resources to balance the public sector. Industrial enterprise in the micro states faces an overwhelmingly hostile environment unless special circumstances create special market opportunities, and special assistance is available to facilitate the supply of inputs.

SELECTED REFERENCES

Asian Development Bank, Key Indicators of Developing Member Countries of ADB, 1983 and 1985.

Asian Pacific Tax and Investment Bulletin, Vol. 2, No. 2, 1984.

Barclays, Abecor Country Report, Vanuatu, October 1985.

CHOGRM, Investment Guidelines for Manufacturing Industries in CHOGRM Countries, 1984.

Development Bank of Vanuatu, Fifth Annual Report, 1984.

ESCAP, Advisory Services Report for the Ministry of Industry, Commerce and Labour on the Development of Industries in the Kingdom of Tonga, September 1975.

ESCAP, Economic and Social Survey of Asia and the Pacific, 1985, 1986.

ESCAP/UNIDO, An Industrial Development Profile for the Developing Countries of the South Pacific, Bangkok, 1979.

ESCAP, Statistical Indicators for Asia and the Pacific, Vol. XV, Nos. 2 and 3, June 1985.

ESCAP/ADB/SPEC, Industrial Survey of the South Pacific, 1983.

ESCAP/ADB/SPEC, Industrial Survey of the Pacific, Country Report, The Solomon Islands, 1982.

ESCAP/ADB/SPEC, Industrial Survey of the South Pacific, Section II, Industry Profiles, 1983.

The Economist, "Fishy Business in the Pacific", November 16, 1985, p. 47.

The Economist Intelligence Unit, World Outlook, 1986: Forecast of Political and Economic Trends for 1986 in over 165 countries, 1986.

Far Eastern Economic Review, "A Stake in the Action: A Golden Rush is on in the Islands of the South Pacific", 24 April 1986, pp. 44-66.

Far Eastern Economic Review, "Where Less Is More", 19 December 1985.

The Federated States of Micronesia, First National Development Plan, 1985-89.

Fiji, Fiji's Ninth Development Plan 1986-1990, November 1985.

Fiji, Final Report to the Government of Fiji, Parliamentary Paper No. 66 of 1984.

The Hongkong and Shanghai Banking Corporation, Business Profile Series: Papua New Guinea, Solomon Islands and Vanuatu, October 1985.

Selected References (continued)

IMF Survey, March 17, 1986 and June 1986.

Papua New Guinea, National Statistical Office, Secondary Industry Bulletins, Secondary Industries Preliminary Statement for 1981.

Papua New Guinea, National Statistical Office, Statistical Bulletins, Nos. 3, 8 and 15.

Republic of Vanuatu, Estimates of Revenue and Expenditure, 1984.

Republic of Vanuatu, First National Development Plan, 1982-1986.

Republic of Vanuatu, Statistical Bulletin, "Statistical Indicators", 1984.

Republic of Vanuatu, National Planning and Statistics Office, The Mid-term Review of Vanuatu's First National Development Plan, December 1984.

South, June 1985.

South Pacific Islands Business News, "How Fiji Rules the Waves", February 1982.

SPEC, Regional Conference of Senior Development Planners, Suva, 7-11 June 1982.

SPEC, Tonga, A Trade and Investment Guide, 1982.

SPEC, Trade and Industry Scene, January 1986.

Tonga, Report of the Minister of Labour, Commerce and Industries for the Year 1983.

UN, Economic and Social Survey of Asia and the Pacific, 1983.

UN, Economic Bulletin for Asia and the Pacific, "Recent Economic Performance and Policy Issues in Papua New Guinea", Vol. XXXIV, No. 1, June 1983.

UN, Quarterly Bulletin of Statistics for Asia and the Pacific, various issues.

UN, United Nations Conference on the Least Developed Countries, Country Review Meetings, Country Presentation, Samoa, 1981.

UNIDO, Fiji, Agro-Industrial Development, World Bank/UNIDO Co-operative Programme, Report No. 29, March 1983.

UNIDO, Investors' Forum for the South Pacific Region, Suva, Fiji, 26-30 November 1984.

UNIDO, Review and Formulation of Industrial Development Strategy and Policies, January 1985, DP/ID/SEP.A/588.

Western Samoa, Department of Economic Development, Western Samoa's Fifth Development Plan, 1985-1987, December 1984.

Western Samoa, Department of Statistics, Annual Statistical Abstract, 1984.

Selected References (continued)

Western Samoa, The 1985 Budget Statement, October 1984.

World Bank, Country Economic Report, Fiji: Adjustment and Selected Development Issues, August 14, 1985.

World Bank, Fiji: Issues and Options in the Energy Sector, June 1983.

World Bank, Papua New Guinea: Country Economic Memorandum, May 20, 1986.

World Bank, The World Bank Atlas 1985.

World Bank, World Development Report, various issues.

World Development, "Islands", Vol. 8, No. 12, December 1980.

Previously issued in the Industrial Development Review Series:

Indonesia	UNIDO/IS.458	1984
Kenya	UNIDO/IS.459	1984
Argentina	UNIDO/IS.460	1984
Paraguay	UNIDO/IS.461	1984
Uruguay	UNIDO/IS.462	1984
Bangladesh	UNIDO/IS.510	1985
Swaziland	UNIDO/IS.516	1985
Zambia	UNIDO/IS.520	1985
The Philippines	UNIDO/IS.527	1985
Pakistan	UNIDO/IS.535	1985
The Sudan	UNIDO/IS.541	1985
Malaysia	UNIDO/IS.545	1985
India	UNIDO/IS.547	1985
Thailand	UNIDO/IS.548	1985
Peru	UNIDO/IS.552	1985
Nigeria	UNIDO/IS.557	1985
Bolivia	UNIDO/IS.564	1985
Chile	UNIDO/IS.579	1985
The People's Republic of China	UNIDO/IS.582	1985
Bahrain	UNIDO/IS.592	1985
Sri Lanka	UNIDO/IS.613	1986
Cuba	UNIDO/IS.615	1986
Tanzania	UNIDO/IS.628	1986
Egypt	UNIDO/IS.637	1986
Mali	UNIDO/IS.640	1986
Zaire	UNIDO/IS.644	1986

Country Industrial Development Reviews are made available to Member States, intergovernmental and nongovernmental organizations, research institutes, libraries, financial institutions, major public and private sector companies and others. Comments, views, suggestions and enquiries should be directed to:

Regional and Country Studies Branch
United Nations Industrial Development Organization
P.O. Box 300
A-1400 Vienna, Austria