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INDUSTRIAL DEVELOPMENT REVIEW SERIES

NIGERIA

Prepared by the
Regional and Country Studies Branch
Division for Industrial Studies

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Preface

Within the framework of UNIDO country surveys and studies, a series of industrial development reviews on developing countries is prepared by the Regional and Country Studies Branch of the Division for Industrial Studies.

The reviews provide a general survey and brief analysis of each country's industrial development, both as a service to those within UNIDO and other international agencies concerned with industrial policy, planning, project development and implementation, and as a ready source of information for Governments. It is hoped that the reviews will prove useful as well to financial and industrial enterprises, both public and private, to research institutes and to aid agencies in developed countries. The reviews also aim at providing a basis for undertaking in-depth studies of specific aspects of industrial policies, strategies and programmes in the developing countries and at providing a basis for informed dicussion and analyses of industrial development trends and policies.

The reviews draw on information provided by the UNIDO data base, material available from national and international statistical publications, and other sources. While up-to-date national statistics are not always available on every aspect of industrial development, the reviews will be updated periodically and efforts are being made to improve the UNIDO data base and to monitor industrial progress and changes in industrial policy on a regular basis.

The present review was prepared towards the end of April 1985 on the basis of information available at UNIDO headquarters. It is divided into three rather distinct parts. Chapter 1 presents a brief overview of the country's economy and its manufacturing sector. A more detailed review of the structure and development of manufacturing industries is contained in chapter 2. Chapter 3 provides details on national plans and policy statements relevant to industrial development, and on the more important governmental

and other institutions involved in industrial development as well as analyses of problems and prospects for engineering and textile industries. The review also contains relevant basic indicators, graphical presentation of manufacturing trends as well as statistical and other appendices.

It should be noted that the reviews are not official statements of intention or policy by Governments or by UNIDO, nor do they represent an official assessment by UNIDO of industrial development in the countries concerned. Readers are invited to comment on the findings and analyses and thereby assist UNIDO in improving and updating the reviews.

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EXPLANATORY NOTES

Regional classifications, industrial classifications, trade classifications and symbols used in the statistical tables of this report, unless otherwise indicated, follow those adopted in the United Nations Statistical Yearbook.

Dates divided by a slash (1970/71) indicate a crop year or a financial year. Dates divided by a hyphen (1970-71) indicate the full period, including the beginning and end years.

References to dollars ($) are to United States dollars, unless otherwise stated.

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.

The following abbreviations and acronyms are used in this document:

b/d	barrels per day
CPDCs	Centrally Planned Developed Countries
ECOWAS	Economic Community of West African States
EEC	European Economic Community
ERPn	effective rate of protection (net)
FLB	Federal Loans Board

FNDP	Fourth National Development Plan
GDP	gross domestic product
IBRD	International Bank for Reconstruction and Development (World Bank)
ILO	International Labour Organization
IMF	International Monetary Fund
ISIC	International Standard Industrial Classification
LNG	liquified natural gas
MAN	Manufacturers' Association of Nigeria
MVA	manufacturing value added
NBCI	Nigerian Bank for Commerce and Industry
NECA	Nigerian Employers Consultative Association
NIDB	Nigerian Industrial Development bank
OPEC	Organization of Petroleum Exporting Countries
TNDP	Third National Development Plan
UAC	United Africa Company
UNDP	United Nations Development Programme

THIS REVIEW IS BASED UPON INFORMATION AVAILABLE AS AT JULY 1985.

BASIC INDICATORS 1

The Economy

GDP (1984):	$61.4 billion
Population (mid-1983):	93.6 million
Labour force (1981):	32.24 million
GDP per capita (1983):	$670

Annual growth rate of GDP (per cent):	1960-70	1970-75	1975-80	1981	1982	1983	1984
	4.4	7.4	6.6	-5.3	-1.7	-6.6	-0.7

GDP by sector of origin (per cent)	1963	1981
Agriculture :	49.5	23.3
Industry :	9.9	36.0
Manufacturing :	3.7	6.1
Services :	40.3	40.1

Average annual rate of inflation (per cent):	1960-70	1970-81	1983	1984
	4.0	14.4	14.2	33.0

Currency exchange rate: (Naira equivalents to $1)	1980	1981	1982	1983	Nov.1984
	0.55	0.61	0.67	0.67	0.79

BASIC INDICATORS 2

Resource and transport infrastructure

Agricultural resources:	
Food crops (1983): (in thousands of tons)	Cereals (7,642), sorghum (2,660), millet (2,300), maize (1,600), rice (1,000), roots and tubers (28,477), cassava (9,950), sweet potatoes (260), sugarcane (1,150)
Cash crops (1982): a/ (in tons)	Palm kernels (171,821), cotton seed (35,890), cocoa (106,503), rubber (20,521), groundnuts (457)
Fisheries (1981):	496.2 thousand tons (total catch) - insufficient to satisfy local demand.
Forestry:	17 per cent of the land area is forested.
Timber production (1980):	4 million cubic metres
Livestock (1982): (in millions)	Cattle (12.6), pigs (1.2), sheep (12.4), goats (25.6), chicken (140.0)
Mineral resources:	
Oil reserves (1983):	15-20 billion barrels
Natural gas (1984):	Reserves estimated at 88,000 billion cubic feet
Coal (1981):	3 to 5 billion tons
Tin:	The only major non-hydrocarbon mineral extracted - production averages 3,000 tons a year (1984)
Iron ore reserves (1982):	800 million tons
Transport:	
Roads (1984):	124,000 km; 48 per cent paved
Railways (1984):	3,500 km
Seaports (1984):	Apapa and Tin Can Island (which serve Lagos), Port Harcourt, Warri, Sapele and Calabar.
Airports (1984):	Ikeja (Lagos), Port Harcourt and Kano are the main international airports, and eleven airports are served by domestic flights.

a/ Purchases by marketing board.

BASIC INDICATORS 3
Foreign trade and balance of payments

Exports:	$11,654 million (1983)			
Products:	Petroleum $10,768 million (92.4 per cent), cocoa, palm kernels, rubber			
Main destinations:	USA, EEC			
Imports:	$16,753 million (1982)			
Products:	Machinery and transport (46 per cent), manufactured goods (26 per cent), chemicals (8 per cent), food (8 per cent)			
Main Suppliers:	UK, West Germany, USA, Japan, France			
Balance of payments (current account deficit):	$4.7 billion (1983) $10.2 billion (1979-83, cumulative)			
Official reserves (excluding gold):	$1.0 billion (1983)			
External debt (1983) (public medium- and long-term debt):	$18.5 billion			
Debt-service ratio (as per cent of goods and services exported)	1974 1.7	1982 10.3	1983 18.6	1984 28.4

BASIC INDICATORS 4

The manufacturing sector

Manufacturing value added: $3.87 billion (1981)
(in constant 1975 prices)

Average annual growth of MVA (per cent):	1969-70	1970-75	1975-80	1981	1982	1983
	9.2	9.2	13.0	4.1	2.7	-12.9

MVA per capita (1981): $48 (at constant 1975 prices)

Structure of MVA: (per cent)	1973	1978
Mainly consumer goods	48.9	46.6
Mainly intermediate goods	39.4	31.1
Mainly capital goods	11.7	22.3

Employment in manufacturing: 3.05 million (1978)

As per cent of total gainful employment: 14.1 per cent

Trade in manufactures (SITC 5-8 less 68):
- Exports: $48.73 million (1979)
- Imports: $7.949 billion (1979)

Share of manufactures (SITC 5-8 less 68):
- in total exports: 0.2 per cent (1979)
- in total imports: 77.35 per cent (1979)

BASIC INDICATORS 5

Trade in manufactured goods

In 1979

Total manufactured exports: (SITC 5-8 less 68) — Total value $48.7 million

Principal manufactured exports	Per cent of total[a/]	Destination (in per cent)				
		Developing countries	Developed market countries			Centrally planned developed countries
			EEC	USA	Japan	
Petroleum products	(17.6)	6.3	2.5	85.0	0.0	0.00
Cotton	(14.1)	14.6	43.4	0.0	22.3	0.00
Cocoa butter and cocoa paste	(12.3)	0.0	86.7	13.3	0.0	0.00
Animal and vegetable oils and fats	(11.2)	1.8	98.1	0.0	0.0	0.00
Leather manufactures and dressed fur skins	(11.3)	2.7	79.2	9.4	0.25	0.06

Total manufactured imports: (SITC 5-8 less 68) — Total value $7,949.7 million

Principal manufactured imports	Per cent of total[a/]	Origin (in per cent)				
		Developing countries	Developed market countries			Centrally planned developed countries
			EEC	USA	Japan	
Machinery and transport equipment	(42.6)	6.7	60.3	9.4	16.6	0.90
Chemicals	(11.5)	5.9	76.7	3.2	2.5	1.45
Iron and steel	(6.3)	5.8	49.6	5.9	30.3	2.40
Non-metallic mineral manufactures	(4.8)	8.3	43.1	4.2	0.9	16.81

a/ All products classified as manufactures by UNIDO in SITC 0-8.

BASIC INDICATORS a

Inter-country comparison of selected indicators

	Unit	Algeria	Brazil	Egypt	Ghana	Nigeria	Pakistan	Zimbabwe
I. Demographic indicators								
Population (mid-1983)	million	20.6	129.7	45.2	12.8	93.6	89.7	7.9
Population growth (1973-83)	per cent per annum	3.1	2.3	2.5	3.1	2.7	3.0	3.2
Infant mortality (1983)	per thousand	107	70	102	97	113	119	69
Area	thousand km^2	2,382	8,512	1,001	239	924	804	391
Density (1982)	persons per km^2	9	15	45	54	101	111	20
II. Economic indicators								
GDP (1983)	$ million	47,200	254,660	27,920	3,720	64,570	25,880	4,730
GNP per capita (1983)	$	2,320	1,880	700	310	770	390	740
GDP growth (1973-83)	per cent per annum	6.5	4.8	8.8	-1.3	1.2	5.6	1.8
Agriculture (1983)	per cent of GDP	6	12	20	53	26	27	11
Industry (1983)	per cent of GDP	54	35	33	7	34	27	32
Manufacturing (1983)	per cent of GDP	13	27	...	4	5	19	21
Services (1983)	per cent of GDP	40	53	47	40	40	46	57
Exports of goods and non-factor services (1983)	per cent of GDP	30	9	32	2	19	21	...
Gross domestic investment (1983)	per cent of GDP	37	21	28	8	19	17	22
External public debt (1983)	per cent of GNP	28.0	29.3	49.4	28.3	17.7	31.3	27.9
III. Industrial indicators								
MVA (1982)	million $ at constant 1975 prices	3,643	43,300	4,847	198	4,049	2,967	925
Growth of MVA (1973-83)	average annual per cent	12.6	4.2	...	-1.5[a/]	10.7	7.0	6.0[a/]
MVA share in world manufacturing value added (1981)	per cent	0.09	2.41	0.18	0.03	0.18	0.17	0.05
Share of manufactured exports in total exports (1982)	per cent	0.17[b/]	33.32	7.88	1.2[c/]	2.07[d/]	57.45	12.54[c/]

a/ 1970-81.
b/ 1980.
c/ 1979.
d/ 1981.

EXECUTIVE SUMMARY

Nigeria is Africa's largest national economy with a population approaching 100 million and a wide natural resource base. Nigeria enjoyed high growth rates during much of the 1970s, but the country has experienced serious economic difficulties since the late 1970s, culminating in the foreign exchange crisis of 1983.

Although manufacturing accounts for only about 6 per cent of GDP and less than 1 per cent of Nigerian exports, its share in employment is 14 per cent. Manufacturing doubled its share of GDP during the period 1960-1982. Along with Algeria, Egypt and Morocco, Nigeria is a leading African industrial country - these countries account for roughly 60 per cent of continental MVA; Nigeria alone accounts for 18 per cent of African MVA.

In 1985 Nigeria is beginning to recover from an economic recession that began in the late 1970s. During 1984 the Government has succeeded in substantially reducing the deficit in the federal budget and the balance of payments. No progress has been made towards the conclusion of a standby agreement with the IMF. The IMF is pressing for a 60 per cent devaluation of the naira, a substantial reduction in Government subsidies on essential commodities and a dismantling of the system of import controls. This has been unacceptable to the Nigerian Government which has argued that devaluation will not increase export earnings (because of low price and supply elasticities of agricultural exports) and a reduction in subsidies will lead to an unbearable increase in the cost of living.

Despite this lack of accommodation between Nigeria and the IMF, the Government has succeeded in arranging the rescheduling of the major portion of its external trade debts with its uninsured creditors. This is a major achievement as such agreements usually depend on the prior conclusion of an IMF standby arrangement. The willingness of international creditors to

accommodate Nigeria reflects rising international confidence in Nigeria's medium-term prospects. Countertrade between Nigeria and its trading partners may well be the area of greatest expansion in coming years.

Although long-term prospects for the Nigerian economy are good, the manufacturing sector will continue to face severe difficulties during 1985. While growth in the manufacturing sector has been substantial during the 1970s, relatively little structural change has taken place. Industrial activity remains concentrated in units producing relatively simple import substitutes. The import-substitution strategy pursued by the Government during the 1960s and 1970s has - paradoxically - increased the import dependence of the economy. Sixty per cent of raw materials needed by the manufacturing sector are imported. The country has a very weak capital goods sector and the reliance on expatriate technical and managerial expertise is also substantial. Capacity-utilization rates remain low in a wide range of industrial enterprises.

The industries that have grown up as a consequence of the import-substitution strategy are heavily dependent on Government support and protection. They have large profit margins ensured by high net effective protection rates and employ a relatively capital-intensive production technology. The vehicle assembly branch is a typical example of an 'enclave' industry with little development impact on the domestic economy.

Revitalizing the manufacturing sector requires the institutionalization of a series of structural changes which increase the linkages of the manufacturing sector with the domestic economy and reduce its excessive import dependence. Nigeria could seek to develop a resource-based industrialization strategy which concentrates on meeting the needs of a strong domestic market of 100 million persons. A switch-over to such a new industrialization strategy requires not an abandonment of Government support to the Nigerian industry but a reorientation of the system of industrial incentives. Such a reorientation could facilitate the development of industries producing inputs

for agriculture and capable of generating a rising volume of investible surplus. There is also a need to regulate the flow of repatriated profits and service payments from the manufacturing sector.

Technical assistance could be geared to meeting the objectives of increased integration of the manufacturing sector with the domestic economy and reducing the import needs of this sector. There could also be provision for support in building Nigeria's managerial and administrative capacity to sustain the growth of industrial efficiency, particularly in the public industrial sector.

1. THE NIGERIAN ECONOMY

1.1 Recent economic trends

Nigerian economic performance in the late 1970s had been unimpressive despite the availability of rapidly growing oil revenues. The recession, which began in 1978 and continues to date, must be seen in longer-term perspective. Over the period 1974-1984 GDP has grown at a real rate of about one per cent per annum. Population on the other hand has grown at the annual rate of 2.5 per cent. The oil boom has thus not contributed towards a growth in real per capita income or to a broadening of the national economic structure.

The situation in the 1980s has been particularly serious. During 1984 real GDP fell by 0.7 per cent. Oil export earnings dropped from $22.5 billion in 1980 to $10.5 billion in 1983. Inflation is currently running at the rate of 33 per cent per annum. Foreign exchange shortages continue to impede the restructuring of the manufacturing sector. In 1984 the Nigerian Government adopted a series of policy reforms to revive the national economy and to tackle fundamental structural imbalances.

The Government has sought to deal with these problems by encouraging privatization, promoting industrial efficiency in public enterprises and restricting the growth of public expenditure. The 1984 budget reduced public expenditure in both real and nominal terms. Some of the biggest cuts were in transport and infrastructure sectors. In nominal terms total federal expenditure proposed in the 1985 budget (N 11.27 billion) is set at 12.6 per cent above the 1984 level. This increase is much less than the rate of inflation (around 33 per cent). It represents a cut in real terms. The 1985 budget concentrates its cuts solely on recurrent expenditure while capital expenditure has been allowed to rise by 47 per cent. In the sectoral allocation agriculture is the major beneficiary. The 1985 budget aims at restoring the economy through sharp cuts in imports and rapid repayment of debt. Nigeria is planning to issue some $530 million in promissory notes as part of the protracted rescheduling of several billion dollars of its overdue

trade debts. The squeeze on imported inputs may severely affect the industrial sector as imported raw materials account for 65 per cent of total raw material requirements.

1984 has seen positive developments from Nigeria's point of view. In July OPEC formally agreed to raise Nigeria's quota from 1.3 million b/d to 1.45 million b/d. Nigeria had in fact been producing at about this level since February 1984. In April 1984 the Nigerian Government started negotiations with a group of important creditors including Mitsubishi, Mitsui, United Africa Company (UAC) and Unilever on the rescheduling of the country's trade debts. Although progress has been slow, it seems that a satisfactory solution to this problem will be reached during 1985. Nigeria has asked her trading partners for an 18-month moratorium on paying her trade debts. An agreement has already been concluded with Brazil to barter 40,000 b/d of crude oil for about a year for $500 million-worth of industrial goods and raw materials. Nigeria's increasing involvement in countertrade is indicated by officials of the Ministry of Commerce and Industry who have concluded more than ten countertrade deals. The 1985 budget predicts a debt-service ratio of 44 per cent for the whole of 1985.

The major factor delaying agreement on the rescheduling of Nigeria's debt has been the lack of progress on the negotiations with the IMF. In April 1984 the Nigerian Government presented a detailed structural adjustment programme as a basis for a $2.5 billion-worth extended fund facility. The IMF formally rejected Nigeria's request in July arguing that the adjustment programme should be supplemented by a 25 per cent devaluation of the naira, the dismantling of the entire system of import controls, the reduction of the level of petrol subsidy and the installation of the IMF's own team within the Nigerian Central Bank to monitor the implementation of these measures.[1/]

The naira has been falling in value since the first half of 1983. This has not led to an expansion of exports. Over 90 per cent of export revenues

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1/ The new Government, which assumed office in August 1985, is expected to set as a high priority the conclusion of an early agreement with the IMF. There are indications the new Government might favour a devaluation of the naira which is an important condition of a proposed $2.5 billion loan to Nigeria.

are derived from oil which is priced in dollars. Similarly agricultural exports are also unlikely to be stimulated by devaluation as they have low price and supply elasticities. Manufactured exports are currently less than one per cent of total exports and their growth is unlikely to have a significant impact on the balance-of-payments deficit.

On the other hand, devaluation is likely to fuel inflation. Currently industry imports no less than two-thirds of its material inputs. A 25 per cent increase in the price of these imports can have a very considerable impact on domestic prices which have risen by 33 per cent during 1984.

It seems unlikely therefore that agreement with the IMF will be reached in the near future. This may also delay a settlement of the $3 billion export-related debt. The Government has shown a readiness to meet its foreign debt obligations. The debt-service ratio was expected to be about 28.4 per cent of goods and services exported in 1984. A sum of about $2.5 billion will be required on an annual basis during 1985 and 1986 for debt-servicing purposes. The debt burden has eased due to OPEC's agreement to an 11.5 per cent increase in Nigeria's oil quota. However, falling oil prices during 1985 may create problems. Moreover, the volume of Nigeria's trade debts is as yet not unambiguously determined.

The balance-of-payments situation showed some improvement during 1984. For the first time since 1980 Nigeria generated a surplus (of N 1.5 billion) on the trade account. The overall surplus amounted to N 0.36 billion. Delays on current trade payments were drastically reduced. Promissory notes amounting to $250 million for settling trade debts were issued in 1984 and another issue of notes worth $300 million was planned for February 1985. A very important development has been the conclusion of $1 billion countertrade deal with Brazil. This may be described as a fundamental shift in traditional trading pattern and is likely to make Brazil Nigeria's largest import partner. The decision to reduce imports by 15 per cent during 1984 induced many manufacturers to explore possibilities for accelerated import substitution. Imports are expected to fall by a further 56 per cent during 1985.

Although economic conditions have improved somewhat during 1984, a great deal of ground remains to be covered. The structural imbalances which have developed over the last two decades require sustained policy initiatives and favourable international conditions. The Nigerian economic recovery is of particular importance because of Nigeria's strategic significance within the African region. The next section begins by assessing Nigeria's relative weight within the African economy.

1.2 Economic structure

Nigeria's importance in a regional context can be gauged by a brief glance at Table 1. It must be stressed that data presented in Table 1 are highly tentative and permit few generalizations. Nevertheless it may serve as a rough guide of broad indicative trends. Nigeria accounts for about one-fifth of the total African population. Its share of the region's GDP almost doubled over the last two decades and is currently equal to about one-fourth of the GDP of the continent. Its share of African MVA increased from 11.9 per cent in 1970 to 18 per cent in 1982, second only to the share of Egypt despite the fact that the MVA/GDP ratio in Nigeria was limited to about 8 per cent.

Nigeria also accounts for a quarter of all African imports and exports. Its share of foreign public and private inflows is also high, although the figures here are significantly distorted due to the unavailability of data for 20 countries in the case of private inflows and the wide variations in annual levels. Nigeria's share of Africa's foreign public debt and of net international reserves is relatively small.

During the 1970s Nigeria's economic performance was among the best in Africa, largely due to the growth of oil revenues. During 1970-81 Nigeria's GDP per capita grew at a real rate of 1.81 per cent per annum - the corresponding rate for the whole of Africa was 1.12 per cent. GDP per capita in the group of all developing countries as a whole, however, grew at a much faster rate - 2.67 per cent per annum - during this period. MVA per capita growth in Nigeria was significantly greater (6.7 per cent) than in Africa (2.77 per cent) and the developing world (3.98 per cent) during 1970-81. However, MVA per capita in Nigeria was $48 in 1981 (at constant 1975 prices) as compared with $101 in all developing countries and $46 in Africa.

Table 1. Nigeria and Africa: A comparison, 1960, 1970 and 1982

(In millions of US dollars, unless otherwise stated)

	Year	Africa a/	Nigeria	Nigeria as per cent of Africa
Population (millions of persons)	1982	636.7	90.6	14.2
GDP	1960 b/	25,630	3,150	12.2
	1982 c/	307,450	71,720	23.3
MVA d/	1970 e/	10,036	1,191	11.9
	1982 f/	22,263	4,020	18.0
Exports	1982 g/	73,145	19,484	26.6
Imports	1982 g/	83,863	20,821	24.8
Net direct foreign private investment	1970 h/	382	205	53.6
	1982 i/	734	358	47.5
Net inflow of foreign public capital	1970 j/	1,249	26	2.1
	1982 j/	7,723	1,964	25.4
Gross net reserves	1970 k/	4,229	223	5.3
	1982 l/	24,040	1,927	8.0
External public debt	1970 m/	8,531	460	5.6
	1982 m/	86,204	6,085	7.0

Source: World Development Report 1984, IBRD, pp.218-249.

a/ Includes Algeria, Angola, Benin, Burundi, Cameroon, Central African Republic, Chad, Congo People's Republic, Egypt, Ethiopia, Ghana, Guinea, Ivory Coast, Kenya, Lesotho, Liberia, Libya, Madagascar, Malawi, Mali, Mauritania, Morocco, Mozambique, Niger, Nigeria, Rwanda, Senegal, Sierra Leone, Somalia, Sudan, Tanzania, Togo, Tunisia, Uganda, Burkina Faso, Zaire, Zambia and Zimbabwe.

b/ Data not available for Sierra Leone, Angola and Mozambique.

c/ Data not available for Somalia, Mozambique and Angola.

d/ Millions of dollars in constant 1975 prices.

e/ Data not available for Rwanda, Benin, Guinea, Mozambique and Angola.

f/ Data not available for Somalia, Mozambique and Angola.

g/ Data not available for Lesotho.

h/ Data not available for Mali, Burundi, Tanzania, Guinea, Mozambique, Sudan, Liberia, Lesotho, Egypt, Zimbabwe, Congo People's Republic, Angola and Libya.

i/ Data not available for Ethiopia, Zaire, Malawi, Upper Volta, Uganda, Burundi, Tanzania, Benin, Guinea, Niger, Madagascar, Togo, Mozambique, Sudan, Liberia, Senegal, Zambia, Ivory Coast and Angola.

j/ Data not available for Mozambique and Angola.

k/ Data not available for Guinea, Mozambique, Liberia, Lesotho and Angola.

l/ Data not available for Guinea, Mozambique and Angola.

m/ Data not available for Angola and Mozambique.

Table 2 shows the distribution of GDP by sector of origin during 1963-81. The service sector has been the major contributor for a long period. It accounted for 40.3 per cent of GDP in 1963 and 40.1 per cent in 1981, despite fluctuations during the 1960s and 1970s. Manufacturing has almost doubled its share to 6.1 per cent in 1981, due to the rapid growth of the manufacturing sector at an average annual rate of 11.1 per cent in the 1970s. During 1963-81 the share of agriculture fell sharply from 49.5 per cent to 23.3 per cent, whereas the rapid growth of mining and quarrying is evidenced by its strikingly increasing contribution from 1.5 per cent in 1963 to 32.6 per cent in 1974. However, its relative share fell sharply to 20.7 per cent in 1981.

Analyses of the structure of demand show that public consumption during the period 1960-1982 doubled while private consumption fell from 87 to 71 per cent of GDP. Over this period gross domestic investment increased from 13 to 25 per cent of GDP while gross savings rose from 7 per cent of GDP in 1960 to 16 per cent in 1982. Although exports as a ratio of GDP rose from 14 per cent in 1960 to 19 per cent in 1982, the gap between imports and exports of goods and non-factor services also increased. It represented 6 per cent of GDP in 1960 and 9 per cent in 1982. This underlines the growing international vulnerability of the Nigerian economy.

As was noted in section 1.1 the Nigerian economy has encountered serious difficulties during the early 1980s. Over the period 1980-1983, GDP contracted at an annual average rate of -2.7 per cent, the largest fall (-6.6 per cent) being in 1983. GDP has continued to fall in every successive year. The current account on the balance of payments has shown a deficit in every year during 1981-1983. In 1984 there was a small surplus on the current account.

Although the oil sector accounts for about a fifth of GDP, it currently provides over 80 per cent of government revenue and 90 per cent of export earnings. Oil revenues have fluctuated widely during the 1970s and 1980s. Over the period 1976-1981 the annual change in the value of petroleum production averaged 5.6 per cent, but with a standard deviation as high as 19.04 per cent. Production in 1981 was 30 per cent lower than in 1980. Production recovered in 1982 but oscillated significantly during 1983 and 1984.

Table 2. Distribution of GDP by sector of origin, 1963-81

Year	Agriculture	Mining & quarrying	Manufacturing	Utilities	Construction	Services	GDP
	(Percentage)						(million $)
	(at current prices)						
1963	49.5	1.5	3.7	0.3	4.7	40.3	5757.5
1964	46.3	1.8	3.6	0.3	5.1	42.7	6118.5
1965	43.7	3.4	4.2	0.3	6.2	42.2	6412.9
1966	44.3	3.6	4.2	0.3	5.8	41.7	6922.5
1967	44.6	2.8	4.3	0.3	6.1	41.9	5687.7
1968	41.9	1.9	4.5	0.3	5.3	46.1	5534.1
1969	38.2	5.4	4.8	0.4	5.8	45.4	7268.4
1970	38.7	7.6	4.5	0.4	6.4	42.4	10542.0
1971	36.3	11.4	3.9	0.3	7.9	40.1	13425.1
1972	34.3	12.7	4.5	0.4	9.4	38.7	15732.0
1973	30.0	18.0	4.4	0.4	10.0	37.1	18278.0
1974	26.5	32.6	3.5	0.3	7.1	30.0	31111.4
1975	27.3	21.7	5.4	0.3	8.5	36.7	36905.7
1976	24.8	24.9	5.4	0.3	9.5	35.1	45930.0
1977	25.2	24.7	4.9	0.3	9.3	35.7	53182.0
1978	24.8	25.0	5.3	0.4	9.1	35.4	56412.5
1979	22.5	28.4	5.1	0.4	8.0	35.6	71473.9
1980	22.2	26.8	5.4	0.5	8.5	36.5	85135.9
1981	23.3	20.7	6.1	0.6	9.2	40.1	75700.3

Source: Statistics and Survey Unit, UNIDO.
Based on data supplied by the Office of Development Research and Policy Analysis and the UN Statistical Office, with estimates by the UNIDO Secretariat.

With an estimated reserve of around 15-20 billion barrels, Nigeria is likely to remain dependent on oil revenues - particularly as a means for financing public sector investment - for a significant time period.

During the 1980s the share of oil in government revenue has tended to fall. It is expected to be about 66 per cent during 1985. Development expenditure has been increasingly financed by domestic and foreign borrowing. Growing budgetary deficits have become a major problem in Nigeria.

Export and import levels have fluctuated widely since 1977. A deficit emerged on the balance of trade in 1978. This was turned into a substantial surplus during 1979 and 1980. The years 1981 and 1982 were once again deficit years due to the fall in the price of oil. Imports were then slashed by almost 50 per cent and the trade balance improved during 1983. In 1984 the balance of trade and the current account balance were both positive. There has also been a large outflow on the services and transfer account. Over the period 1979-1984 this totalled N 13.9 billion. This was equal to 23 per cent of export revenues during this period. Thus only 77 per cent of foreign exchange earnings are available for the financing of imports. The rest has to be used for the repayment of debts, repatriation of profits and for the payment of other services. During the 1980s both oil and non-oil exports have declined. Over the period 1980-1982 non-oil export revenue fell by over 50 per cent and oil-export earnings declined by 22 per cent. This highlights the difficulties involved in sustaining imports at a level required for development, particularly within the manufacturing sector.

1.3 An overview of the manufacturing sector

The manufacturing sector remains heavily import-dependent, despite two decades of growth sustained by import-substituting polices. A wide range of light consumer goods are currently produced. Their development represents what can be aptly described as "easy" import substitution - localization of assembly and the final processing of relatively simple products. The earliest manufacturing units to be established were within the agro-based industries, including vegetable oil-extraction plants, tanneries and tobacco processing units. They were soon followed by textiles, breweries and cement.

The First Plan (1962-1968) was drafted with the anticipation of the first substantial increase in oil revenues. It retained the emphasis on light industry and assemblage. Manufacturing projects included simple machine tools, kitchen utensils, electric fans and motor vehicle assembly. This strategy was broadly retained in the Second Plan (1970-1975).

The Third Plan (1975-1980) shifted the emphasis to heavy industry. Within the manufacturing sector the major projects were in steel and the petroleum refining sectors. Industrial production failed to maintain its momentum during this period due to rising inflation, increased competition from imports and growing inefficiencies within manufacturing enterprises. The Fourth Plan (1980-1985) retains the emphasis on heavy industry but, as noted in section 3.1, many of its policies and strategies remain unimplemented due to the economic crisis which has beset the Nigerian economy since the late 1970s. Balance-of-payments difficulties have compelled the Government to postpone some projects and to abandon others. The iron and steel subsector has been particularly seriously affected by these developments.

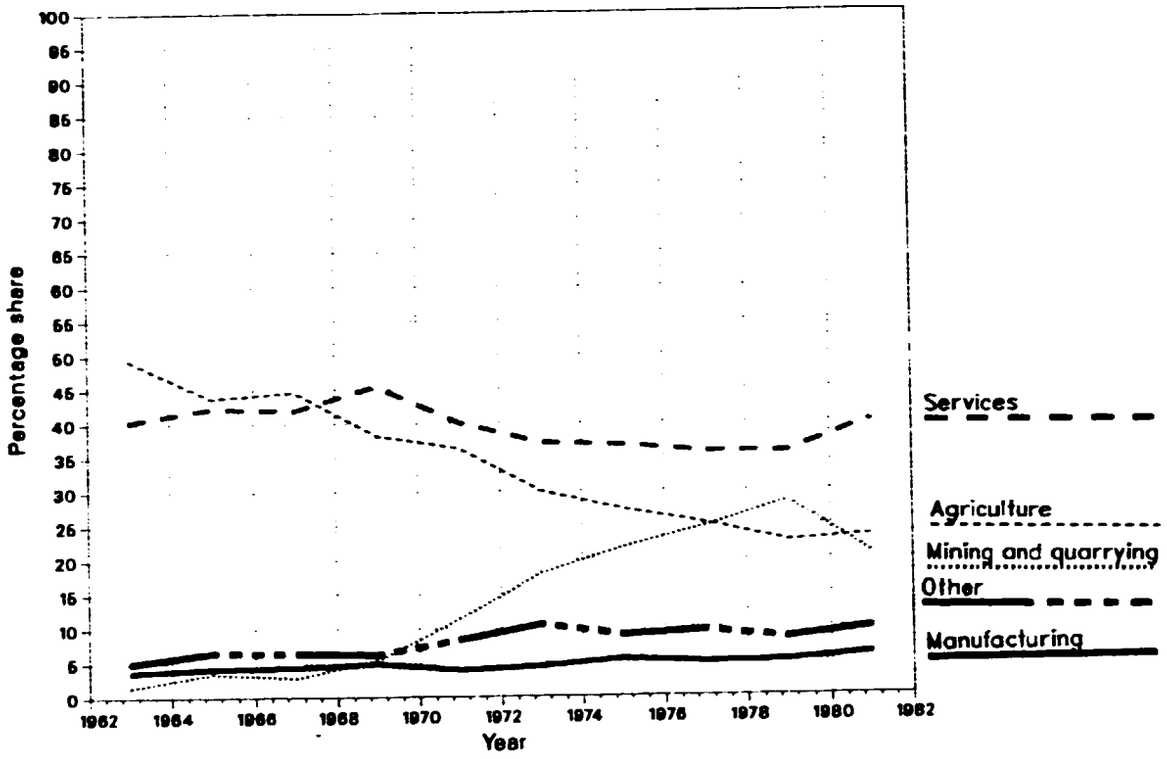
Early development of the manufacturing sector was largely due to the investment of foreign capital. The role of the public sector has grown following the oil boom and the increased emphasis on heavy industries. The indigenization laws of 1973 and 1977 have contributed to an expansion of domestic private sector investment. In most of the larger manufacturing enterprises, foreign capital retains a presence in collaboration with State and domestic private sector investors. It has been estimated that in 1980 the total value of foreign investment in Nigeria was $6.75 billion. A large proportion of this was located within the mining and manufacturing sectors.

The manufacturing sector currently accounts for about 8 per cent of GDP (1984) and remains dominated by consumer goods. The steel and hydrocarbon-based manufacturing subsectors accounted for only about 18 per cent of total manufacturing production over the period 1977-1981. Both consumer and capital goods-producing units suffer from substantial underutilization of capacity. This has been accentuated by their heavy dependence on imported raw material and technology inputs. Foreign exchange shortages have led to a drastic reduction in their availability and the

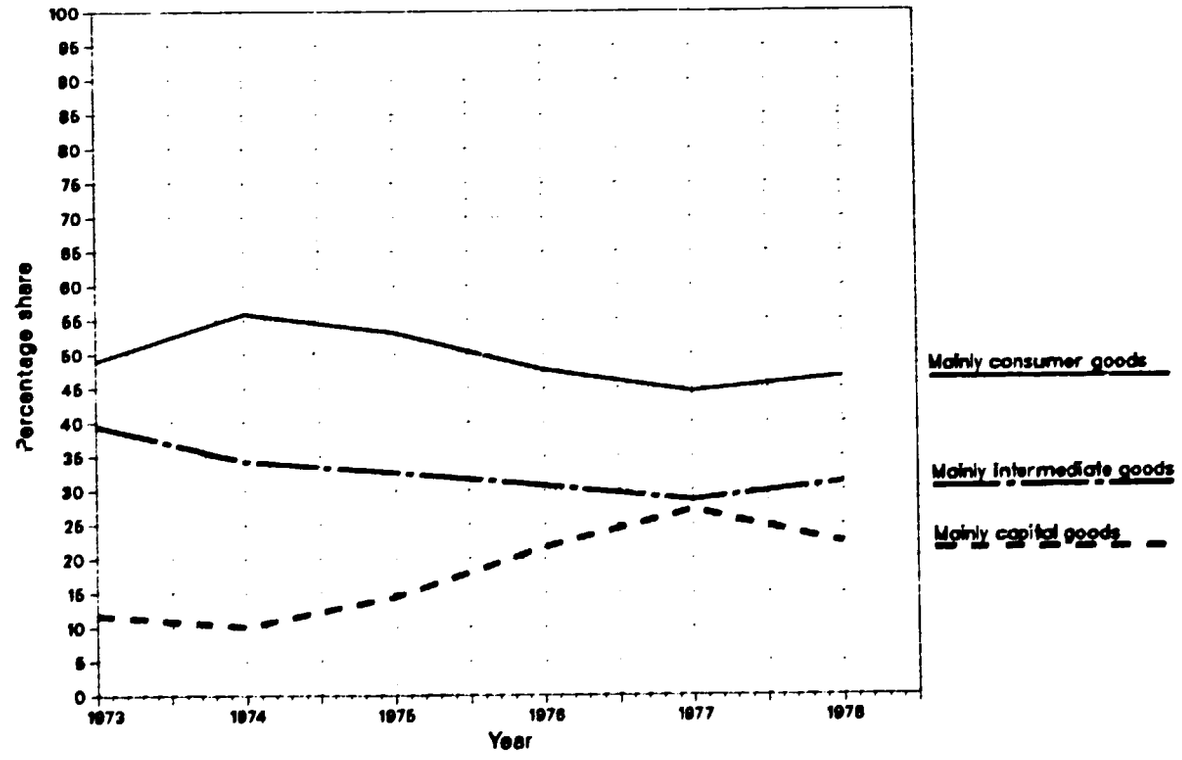
manufacturing sector has thus been seriously affected by the present crisis of the Nigerian economy. A revitalization of the sector requires dealing with some of the basic structural imbalances that have developed within this sector over the last two decades.

MANUFACTURING TRENDS

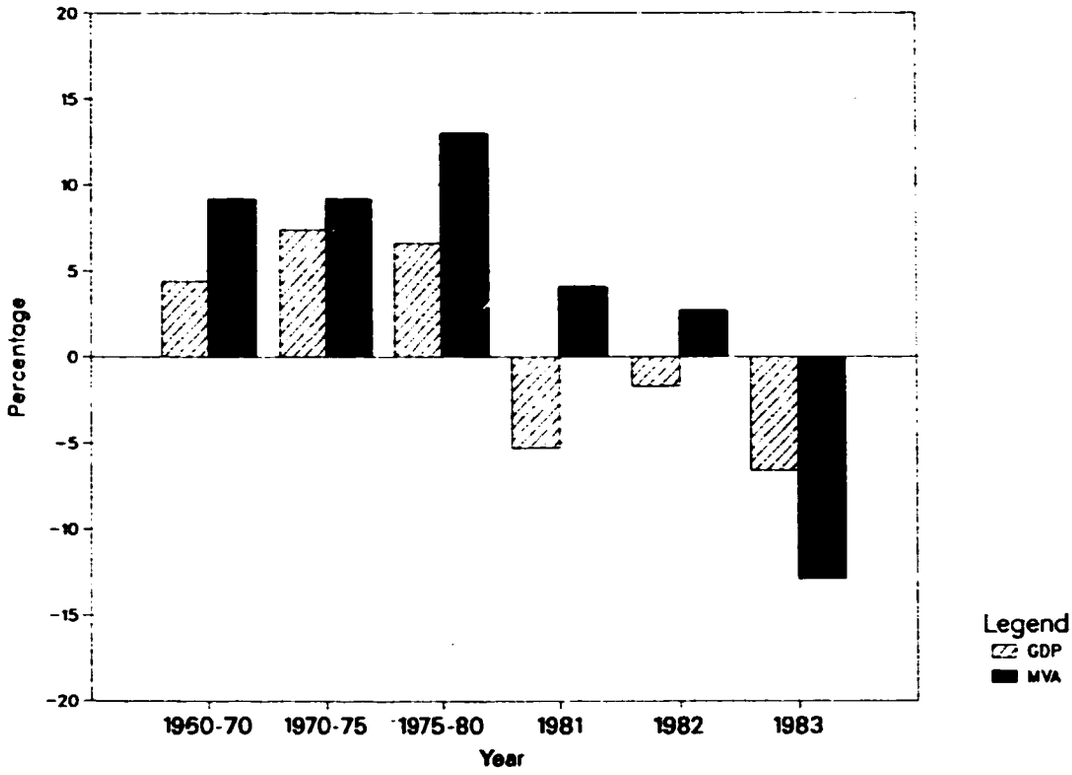
GDP BY ECONOMIC SECTOR, 1963-1981



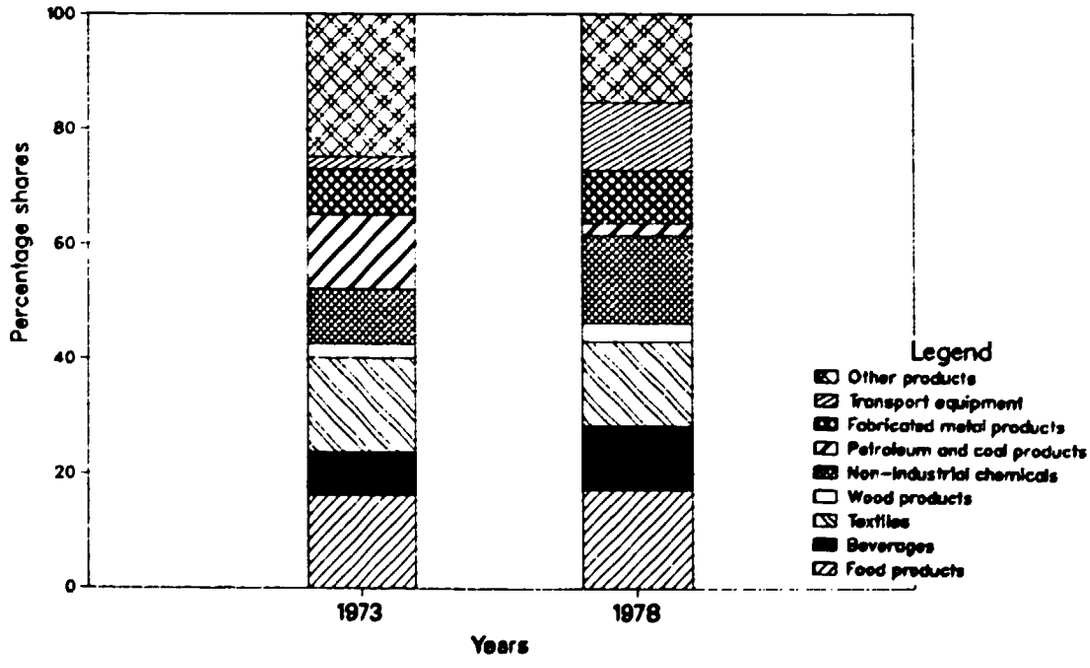
MANUFACTURING VALUE ADDED BY END USE, 1973-1978



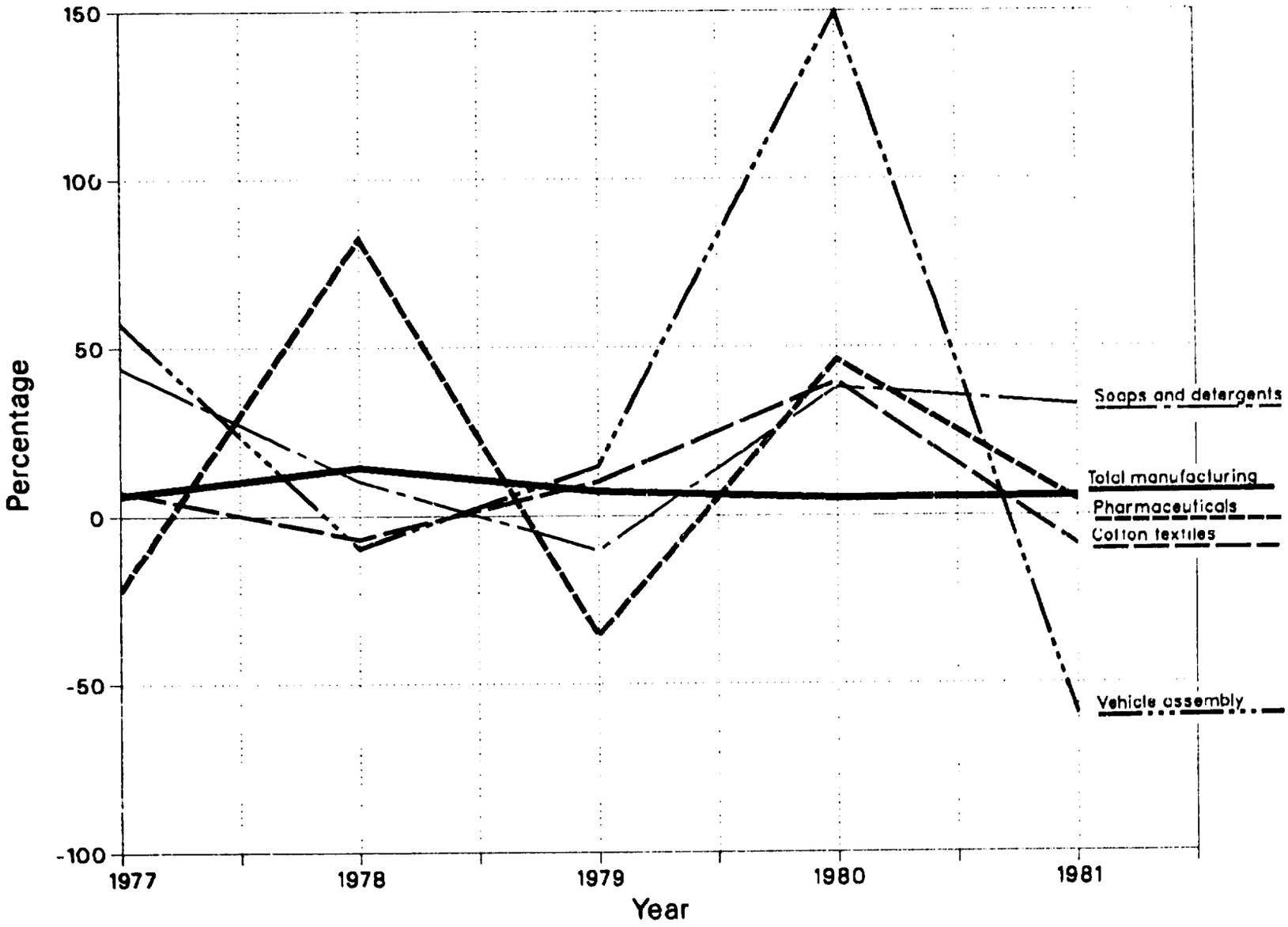
ANNUAL RATES OF GROWTH OF GDP AND MVA, 1960-1983



COMPOSITION OF MVA BY MAIN BRANCHES, 1973 and 1978

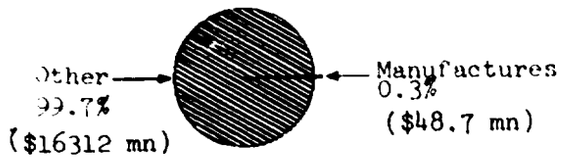


INDEX OF PHYSICAL OUTPUT, ANNUAL PERCENTAGE CHANGES,1977–81

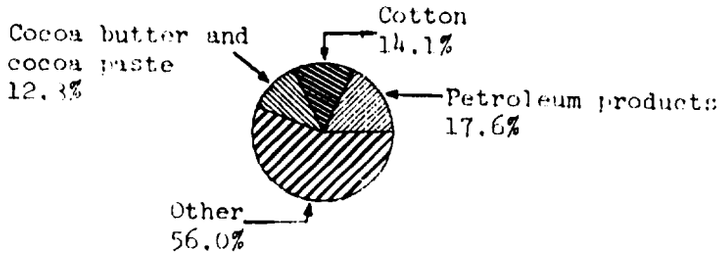


MANUFACTURED EXPORTS AND IMPORTS IN 1979

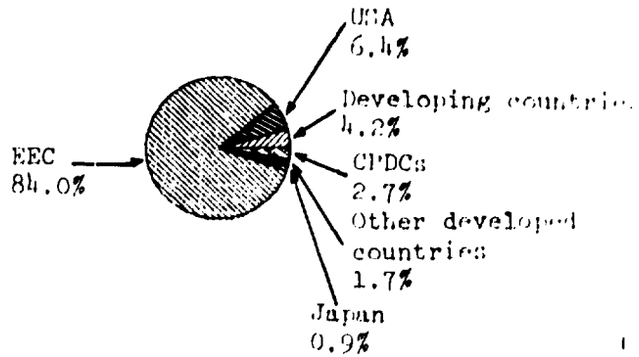
SHARE OF MANUFACTURES IN TOTAL EXPORTS (SITC 5-8 less 68)



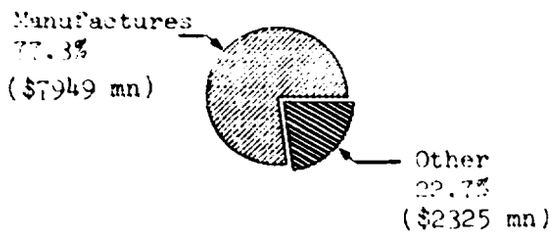
COMPOSITION OF MANUFACTURED EXPORTS



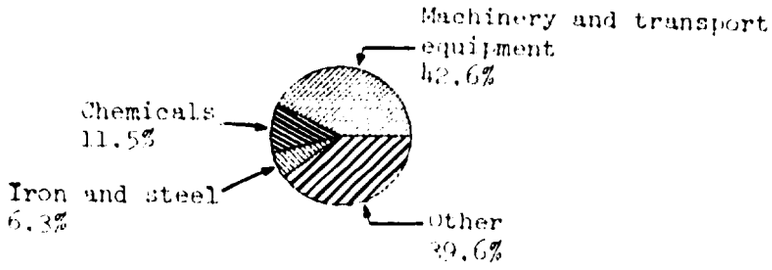
DESTINATION OF MANUFACTURED EXPORTS



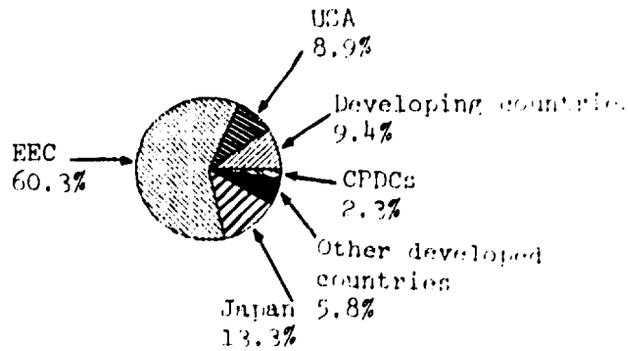
SHARE OF MANUFACTURES IN TOTAL IMPORTS (SITC 5-8 less 68)



COMPOSITION OF MANUFACTURED IMPORTS



ORIGIN OF MANUFACTURED IMPORTS



2. STRUCTURE AND PERFORMANCE OF THE MANUFACTURING SECTOR

2.1 Growth and structural change

The growth of the manufacturing sector was rapid during the 1970s - expanding at a real rate of about 10 per cent per annum. During this period manufacturing growth was relatively steady - in only one of these ten years (1974) did the index of manufacturing production register a decline. After 1981 the manufacturing sector has contracted largely due to the unavailability of required imported inputs. This trend is likely to persist until the foreign exchange shortages are eliminated and the export capacity of the economy is substantially increased.

Table 3 presents estimates of changes in the index of manufacturing production and of selected products over the period 1977-1981. The major omission from this Table is petroleum products (ISIC 3530) which in 1976 was estimated to account for 11 per cent of MVA. The products included in Table 3 account for 67.4 per cent of total manufacturing production.

Of the products covered by Table 3, beer had the highest growth rate in terms of annual output, followed by vehicle assembly and soap and detergents. Negative growth rates were recorded by vegetable oils, pharmaceuticals and cigarettes. Annual variations in production were very large. In all cases, the standard deviation was significantly greater than the mean. Variations were particularly large in the case of vehicle assembly and pharmaceuticals. Both these branches accounted for a relatively small proportion of manufacturing output over the period 1977-1981.

Estimates of structural change in the Nigerian manufacturing sector are available for an earlier period. Two such estimates are reproduced in Appendix Tables A.1 and A.2. The estimates which cover the period 1973-1980 probably include "petroleum refineries" (ISIC 353) under "other chemicals" (ISIC 352). They may on the other hand incorporate a classification which divided the value added and output of ISIC 353 between ISIC 352 and 354. This is not made clear in the original tables and renders conclusions drawn from this Table somewhat speculative.

Table 3. Index of total manufacturing production and of selected products, 1977-81

	Total	Beer	Cement	Cotton textiles	Rubber	Soaps and detergents	Vegetable oils	Vehicle assembly	Cigarettes	Pharma-ceuticals
Weights	100.0	18.8	4.0	16.2	0.7	8.4	4.1	0.5	13.5	1.2
					(Index: 1972 = 100)					
1977	266.8	185.5	117.1	179.2	109.3	328.4	14.8	1,097.3	122.0	186.6
1978	305.2	285.1	139.6	167.1	122.6	362.5	15.4	992.7	129.0	352.6
1979	327.5	310.8	161.9	184.2	112.6	325.5	16.3	1,138.9	117.3	227.2
1980 1/	344.7	604.8	146.9	257.3	113.8	449.2	12.5	2,808.2	123.0	122.4
1981 2/	364.2	605.3	170.2	235.2	...	596.0	...	1,139.1	121.3	127.9
					(Annual change in per cent)					
1977	6.2	-2.8	1.5	7.4	9.7	44.0	-39.3	57.1	-4.9	-22.2
1978	14.4	53.9	19.2	-6.8	12.2	10.4	4.1	-9.5	5.7	82.2
1979	7.3	9.0	16.0	10.2	-8.2	-10.2	5.8	14.7	-9.1	-35.6
1980	5.3	94.6	-9.3	39.7	1.1	38.0	-23.3	146.6	-4.9	46.1
1981	5.7	0.1	15.9	-8.6	...	32.7	...	-59.4	-1.4	4.5

Source: Data provided by Nigerian authorities.

1/ Revised.

2/ Provisional.

Ignoring this ambiguity, however, the estimates show that structural change during the period has been relatively modest. The value of Spearman's rank correlation coefficient between industries, ranked by value added in 1973 and 1980, was as high as 0.83. The top four industrial branches in 1973 were food manufacturing, textiles, fabricated metals and petroleum refineries (on the assumption that ISIC 353 is included in ISIC 352).[1/] In 1980 they were transport equipment - up from number 18 in the 1978 ranking - food products, petroleum refineries and beverages. The textile and fabricated metal products had dropped down to ranks five and six, respectively, in the 1980 ranking. Other industries which experienced a substantial relative decline include leather, footwear, miscellaneous petroleum, coal and wood products. Branches which significantly increased their value added share included transport equipment and petroleum products (i.e. ISIC 352). The share of consumer goods industries (ISIC 311 to ISIC 332) fell from 58 per cent of MVA in 1973 to 41.6 per cent in 1978. The fall is almost entirely due to the spectacular rise of the transport equipment. The latter is also confirmed by the diagram of industrial structural change given in Appendix Table A.14.

Appendix Table A.2 presents estimates of structural change over the period 1968-1976. Once again there is evidence that structural change has been relatively modest. Although the value of Spearman's rank correlation coefficient is 0.75 per cent for the distribution of branches in 1965 and 1971 - significantly lower than the value estimated in Table A.1, this difference is accounted for entirely by the change in the position of "other" manufactures, which ranked fifth in terms of value added contribution in 1968 and twenty-fourth in 1976. According to Table A.2, the four leading branches in 1968 and 1976 were beverages, textiles, petroleum products and food manufactures. Beverages, textiles and food manufactures were shown as declining during this period, while petroleum products, soap and paper products are seen to have increased their share of MVA significantly. Consumer-goods branches contributed 58.6 per cent of MVA in 1968. This

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1/ Their share in total MVA however declined from 57.2 per cent in 1973 to 50.8 per cent in 1975.

share declined to 45.5 per cent by 1976. Once again the result is broadly consistent with the conclusions obtained from Table A.1, although Tables A.1 and A.2 are of course not directly comparable due to significant differences in classification schemes employed.

The period since the late 1970s has been characterized by crises for the Nigerian economy. The manufacturing sector has suffered particularly due to the unavailability of imported inputs. The relative gains made by the intermediate goods industries are likely to have been eroded during this period as these industries are particularly import-dependent. The share in MVA of the textile industry, which was the third-largest industry in 1973 (Table A.1), declined to 9.5 per cent in 1980 and has faced serious difficulties during the first half of the 1980s. The growth of the different branches is thus likely to have been more erratic than in the 1970s due to changed international conditions and revisions in the Government's industrial priorities. The future prospects for manufacturing growth depend crucially upon increasing opportunities for generating investible resources by an improvement in the financial performance of the enterprises themselves.

2.2 Performance and efficiency of the manufacturing sector

It is generally agreed that industrial efficiency has not been particularly high in the Nigerian manufacturing sector. Over the period 1973-1980 employment within the sector grew by 74 per cent; MVA grew by 558 per cent. This indicates that value added grew significantly faster than employment. However, UNIDO estimates for MVA are on a current price basis. For an earlier period, 1973-1978, the World Bank estimates that in constant 1977 prices MVA increased from N993 million to N1,778 million.[1/] - a growth rate of 79 per cent while employment expanded by 83 per cent. This would indicate a small decline in MVA per employee as measured in real terms. This is a particularly sombre finding, since 1973-1978 represents the high point of the oil boom. Even in this "golden age" MVA per employee remained relatively stagnant.

1/ World Bank, Macroeconomic Policies for Structural Change, Report No. 4506-UNI (1983), p. 35.

Evidence of low industrial productivity is also provided by other sources. In a study covering 19 industrial branches over the period 1962-1975 it was found that the elasticity of substitution between capital and labour estimated through the standard Constant Elasticity of Substitution procedures was very low. In only 3 of the 19 cases was the substitution coefficient significantly greater than unity.[1/] It is generally expected that industries with higher substitution elasticities would over time have higher rates of increase in labour productivity. The association between labour-productivity growth and the value of the substitution coefficient was found to exist in the Nigerian manufacturing sector. Odama and Kazi found that 16 of the 19 manufacturing branches studied had both low values for the substitution coefficient (estimated within a CES framework) and low productivity growth rates.[2/] A cross-section study relating to 1962 and 1963 found evidence of higher levels of labour productivity in the Eastern Province of Nigeria.[3/]

Some indications of the performance of the manufacturing sector are given in Table 4 for the period 1970-1978. The most striking feature of Table 4 is the relatively high level of gross profits and the gross-profit to value-added ratio. The mean gross-profit to value-added ratio for the period 1970-1980 is as high as 0.80 with a standard deviation of only 0.018. UNIDO has estimated the average value of the gross-profit to value-added ratio for a representative group of 28 developing countries as 0.67 in 1970 and 0.66 in 1978.[4/] Nigeria is thus seen to have a much higher gross-profit ratio than many developing countries, although during 1970-1978 the gross profit rate declined at a faster rate in Nigeria than in the UNIDO sample of developing countries. Evidence of the extremely high profit rates can also be provided

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1/ Odama, J.S. and Kazi, U.A. "Rate of Capital-Labour Substitution in Time Series Production Function in the Nigerian Manufacturing Industry" Nigerian Journal of Economic and Social Studies (1982, No. 1), pp. 37-60.

2/ Ibid., pp. 50-51.

3/ Lidholm, C.E., "Production Function for Eastern Nigerian Industry", Nigerian Journal of Economics and Social Studies (1966), Vol. 8, pp. 427-440.

4/ UNIDO, Industry in a Changing World, New York, 1983. Sales No. E.83.11 B.S, p. 242.

Table 4. Some indicators of performance of the manufacturing sector, 1970-78 a/

Year	Gross profit	Gross profit / Wages	Gross profit / Value added	Gross profit / Employment
	N'000			N'000
1970	325,338	3.41	0.82	2,513
1971	353,116	3.95	0.80	2,427
1972	388,720	3.64	0.78	2,362
1973	463,852	3.90	0.83	2,780
1974	575,580	3.98	0.80	3,094
1975	934,555	3.73	0.79	3,820
1976	1,397,759	3.96	0.80	5,151
1977	1,443,384	3.28	0.77	4,492
1978	1,759,273	3.48	0.78	5,759
1979	...	...	...	...
1980	2,852,823	4.21	0.80	9,819

Source: World Bank, Report No. 4500-UNI (1983).

a/ Estimates in the Table are for the entire Nigerian manufacturing sector defined as ISIC 3000 less 3530.

from firm-level data. Thus the largest industrial and commercial group of companies operating in Nigeria reports that during the period 1971-1980 operating profits rose by 346 per cent from N 12,997 million to N 57,989 million, and sales also increased by about 300 per cent. Other large conglomerates are likely to have enjoyed similar rates of return. Although these firms and other market leaders enjoy monopoly power in many Nigerian markets, no evidence has been found to suggest a close association between firm size and level of profitability in Nigeria.[1/]

Table 5 presents summary indicators measuring the performance of the main large-scale Nigerian manufacturing enterprises. These estimates are based on observations obtained from a sample of over 200 firms. Once again there exists overwhelming evidence that gross margins within the Nigerian manufacturing sector during the mid-1970s were very high. The highest profit rates were recorded in the iron and steel, motor vehicle assembly, "other

1/ For one such study, see Inanga, E. and Soyiba, A. "The Profitability and Size of a Nigerian Quoted Conglomerate", Nigerian Journal of Economic and Social Studies (1982), No. 4, pp. 364-372.

manufactures", cement and tyres and tubes-producing establishments. In each of these gross profit rates were in excess of 80 per cent. The lowest gross profit (38.4 per cent) was obtained in the saw milling units. It is interesting to note the very weak association between the gross-profit to value-added ratio on the one hand and the value-added to gross-output ratio on the other. Spearman's correlation coefficent for the two rankings is only +0.12. The average value-added to gross-output ratio is 45.6 per cent for the whole manufacturing sector. This is not significantly different from the value of this ratio, 42.0 per cent, as estimated by UNIDO for a representative group of developing countries in 1978.[1/] As noted earlier, the value of the gross-profit ratio is considerably higher in Nigeria than in the developing country sample.[2/] Industries with high values of the value-added to

Table 5. Performance indicators for selected Nigerian manufacturing establishments, 1973-1977

(Percentage)

Subsector	Gross profit / Value added	Value added / Output	Investment / Value added
Vegetable oil	70.0	32.8	30.0
Textiles	63.0	40.4	30.4
Made-up-textile goods	65.0	40.6	47.0
Leather products	63.6	52.6	8.8
Saw milling	38.4	49.2	64.6
Other wood and cork products	77.7	57.2	42.5
Wooden furniture	63.2	44.7	43.5
Containers and paper board	73.4	39.2	11.6
Paper products	76.2	37.0	31.6
Printing, publishing	58.0	57.6	105.2
Tyres and tubes	80.8	62.6	6.2
Cement	82.4	69.2	99.6
Concrete products	77.8	53.4	27.7
Iron, steel and non-ferrous metals	92.0	57.7	-
Motor vehicle assembly	85.7	25.5	11.7
Other manufactures	83.6	48.8	17.6

Source: Appendix Table A.3.

1/ UNIDO, op.cit., p. 215.

2/ Ibid.

output ratio - indicating relatively low unit-material costs - include cement, tyres and tubes, iron and steel, printing and publishing and wood products. The lowest value-added to output ratio was obtained in the motor-vehicle firms which, with an average profit rate of 92 per cent, ranked second-highest on the basis of the gross-profit to value-added indicator. The value-added to output ratio was also low in the case of the vegetable oil and the paper products establishments.

A very weak association exists between the value of the investment value-added ratio and the value-added to output ratio. On the other hand, a significant negative association exists between the gross profit and the investment ratio. Establishments with high gross profit rates generally had low investment rates - the most marked instances of this being motor-vehicle assembly, other manufactures and tyres and tubes. Sawmilling, printing and publishing and wooden furniture had low gross-profit and high investment to value-added rates. As Table A.3 shows, the ratio of net capital expenditure to gross profits over the period 1973-1977 was 34 per cent (standard deviation = 14.3). The former in all probability includes substantial bank borrowing and equity financing. Over the period 1973-76 commercial bank lending to the Nigerian manufacturing sector equalled N 2,136 million. This was larger than the total net capital expenditure undertaken by the sector. During 1977 equity financing grew rapidly in response to the indigenization decrees (see Section 2.4). It is thus legitimate to conclude that the reinvestment ratio is likely to be low in Nigerian manufacturing. Investment rates have grown at a slow rate during this period. The period following 1978 has seen a further deterioration as the recession has affected both the ability to realize a surplus within the manufacturing sector and the ability to mobilize loan and equity finance.

The relatively high profit rates in Nigerian manufacturing are not so much indicative of high levels of industrial efficiency as of significant monopoly power enjoyed by market leaders and of the "easy" import substitution and protection policy pursued by the Government during the last two decades. There is a general consensus that the import-substitution industrialization strategy has proved unsuccessful and emphasis should now be focused on export promotion. It is important to stress that the healthy growth of the manufacturing sector depends not only on the generation of high profit rates -

this has already been achieved during the 1970s albeit in an inefficient way, i.e. through excessive government protection - but also on a sustained and rapid growth of self financing ratios within the sector. Given the high level of foreign participation within Nigerian manufacturing - and the consequent high relative level of transfer payments on Nigeria's current account (see Sec. 1.2) - increasing industrial efficiency must involve a renegotiation for an improvement of the terms on which Nigeria supplies exports and receives imports and capital from international markets.

2.3 International trade in manufactures and the role of resource-based industrial growth

Manufactured exports currently constitute less than 1 per cent of total Nigerian exports. The evolution of Nigeria's industrial structure has been heavily influenced by tariffs, quantitative restrictions and exchange-rate management. Nigeria had an overvalued exchange rate during most of the 1970s, which has tended to depress the level of manufacturing exports. Moreover, many manufacturing enterprises - particularly foreign ones - grew up behind high protectionist barriers during the 1960s. Nigerian manufacturing enterprises have remained largely domestically oriented due to the existence of a large national market. The system of protection that evolved during the 1970s discriminated against the agricultural sector. The operation of the marketing boards up to the early 1970s led to a gradual worsening of agriculture's intersectoral terms of trade. Agricultural exports also declined due to the appreciation of the naira. Agricultural exports constituted 71.8 per cent of total exports in 1960. By 1980 their share fell to 3.9 per cent .

During this period the share of manufactures in total exports also fell from 12.6 per cent to 0.3 per cent. The value of Nigerian manufactured exports in 1960 was N 42 million in current prices. In 1980 they amounted to only N 39 million. Thus the impact of the protection system on manufactured export performance has been very significant. Manufactured exports have declined absolutely, not merely in terms of their share relative to oil.

Estimates of the effective rates of protection applicable to different branches of the Nigerian manufacturing sector have been provided by the World Bank for 1977 and 1979/1980.[1/] Appendix Tables A.4-A.6 present the results of these studies which are summarized in Table 6. The average net effective rate of protection (ERPn) is seen to have increased between 1977 and 1979/1980. The most likely impact of the import restrictions introduced since April 1982 is a further steep rise in the average ERPn for the manufacturing sector. Despite this increase, however, the rankings in the years 1977 and 1979/1980 remain virtually unchanged. The highest values of ERPn are for the assembly industries and consumer-goods industries processing imported raw materials. Export-oriented industries and mineral- and forest-based industries received negative protection in both 1977 and 1979/1980. ERPn for intermediate and capital goods industries - particularly those processing domestic raw materials - was generally low. In 1979/80 relatively high levels of negative ERPn existed for fertilizers, cement, sugar cubing, finished textiles and industrial gases. Export-oriented industries - leather and natural rubber products - also had negative rates, but they tended to be somewhat lower than ERPn rates for local resource-based industries. It is interesting to note that assembly industries enjoyed the highest level of effective protection although, as shown in Table 6, they had the lowest value-added to gross-output ratios. They also had the highest rate of gross profits in the manufacturing sector - accounted for mainly by the high level of effective protection they enjoyed.

A striking feature of the protection system is the high degree of variance in relative net effective rates of protection, both between activities and within functional and end-use groupings. In 1979/1980, ERPn ranged between -62 per cent (for fertilizers and insecticides) to 1,119 per cent (for certain categories of automobiles). Twenty-seven per cent of all activities examined had negative ERPns, indicating strong disincentives to investment and production, drawing resources away from these and into other more financially profitable and more highly protected industries. Many of these activities have faced major difficulties in recent years and production

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1/ See World Bank, Nigeria's Non-oil Export Prospects, Report No. 3771-UNI (1982), pp.29-31; and World Bank, Nigeria: The Industrial Incentive System (1983), Report No. 4272-UNI, pp.31-40.

Table 6. Net effective rates of protection in manufacturing by major product and end-use grouping, 1977 and 1979/80

(Percentage)

	1977	1979/80
Agro-allied industries	-6.7	14.7
Mineral and forest resource-based industries	-10.3	-13.5
Export-oriented industries	-22.3	-15.1
Industries processing domestic raw materials	-4.1	39.9
Industries processing imported raw materials	65.7	66.8
Assembly industries	79.4	215.8
Consumer goods industries:	55.8	124.9
- Processing mostly domestic raw materials	12.7	81.7
- Processing mostly imported raw materials	74.6	146.9
Intermediate and capital goods industries:	1.5	37.7
- Processing mostly domestic raw materials	-9.9	16.4
- Processing mostly imported raw materials	24.4	65.6

Source: Tables A.4-A.6.

has stagnated. The considerable unevenness in ERPns within functional and end-use groupings is also evident. In the metal-working subsector, for example, certain goods received negative effective protection, e.g. iron rods, aluminium sheets, coils and circles, matchets, etc., while others had ERPns in the 30-65 per cent range and above (e.g. metal furniture, tin containers, aluminium household utensils).[1/]

Highly protected industries, however, are not necessarily inefficient or high-cost activities. In some cases, the differential in domestic value added results in monopoly profits accruing to the firm. This in turn may result in monopolistic or oligopolistic pricing policies which serve as barriers to new entrants into the product market. As section 2.2 has shown, profit rates are very high in Nigerian manufacturing.

1/ World Bank, Nigeria: The Industrial Incentive System, Report No. 4272-UNI, (1983).

Another important characteristic of the structure of incentives in Nigeria is the significant degree of instability as evidenced by the often substantial short-term fluctuations in levels of protection for individual goods. This would appear to be due both to substantial short-term modifications in trade policies, and changes in the form, and hence the degree, of protection resulting from switching between the use of tariffs alone and reliance upon quantitative restrictions. Trade policy and the structure of protection have tended to evolve in an ad hoc fashion and an industrial incentives system has emerged which was largely unplanned.

Expanding export earnings from the manufacturing sector is an important objective of the Government. Some export potential has been identified in the case of a number of manufactured products. These include palm kernel oil and cake, cement, finished and semi-finished steel products, LNG, carbon black and caustic soda. Export expansion in these industries is currently limited, due to underutilization of capacity, supply bottlenecks and low levels of managerial efficiency. A combination of industrial incentives and carefully selected government initiatives is required to stimulate manufactured exports from Nigeria.

An important problem in this respect is the very limited growth of subregional trade within West Africa. Nigeria has been an active member within the Economic Community of West African States (ECOWAS), established in 1975. Yet trade with ECOWAS partners constituted less than 2 per cent of total Nigerian trade in the early 1980s.[1/] About 87 per cent of total manufactured exports are destined for developed market economies. An expansion of Nigerian manufactured exports must mean increased penetration of these highly competitive and relatively stagnant markets. This is by no means an easy task.

Nigerian manufacturers have thus traditionally preferred to concentrate on producing for the domestic market. There are sound economic reasons for this preference. Nigeria has a population approaching 100 million. Moreover, as Table A.10 shows, domestic demand substantially exceeds domestic production in about 70 per cent of manufacturing product categories for which data are

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1/ Forrest, T., "Recent Nigerian Industrialisation", in Fransman, M., Industry and Accumulation in Africa, Heinman, London, 1983, p.334.

available. These categories include consumer, intermediate and capital goods branches. The problem has been that the import substitution has failed to increase the integration of the rural and urban sectors of the economy. The Nigerian economy remains a highly dualistic one. The dependence on imports can be illustrated from the change in the structure of trade. Capital goods imports grew by 735 per cent over the period 1973-81, but the value of raw material imports for industrial processing grew by 819.8 per cent (both measured in current prices). Estimates of the ratio of imported to total raw materials used in selected manufacturing establishments have been provided by the World Bank and are reproduced in Table 7. Currently about 60 per cent of the total raw materials consumed in the manufacturing sector are imported. The most heavily dependent subsectors on imported raw materials are knitted goods, fabricated metal products, grain mill products and dairy products. The average ratio of imported raw materials to total raw materials used in these branches was 94.1 per cent.

Table 7. Share of imported materials in total raw materials in selected Nigerian manufacturing enterprises, 1979

(Percentage)

Vegetable oils (Nigeria) Limited	negligible
Beer - Nigerian Breweries Co.	60
Soft drinks - Nigerian Bottling Co.	90
Textiles - NTM	negligible
Aswami Textiles	90
Afprint	15
Nichemtex	65
EPE Plywood	5
Bricks - Lacon Co.	negligible
Concrete blocks - Acceptance Engineering Co.	negligible
S and K Asbestos Products Ltd.	60
Metal products - Alumaco	70 a/
Nigalex	100

Source: World Bank mission to Nigeria, 1979.

a/ 30 per cent of raw materials consist of small sections of extruded aluminium purchased locally from Nigalex, but the latter imports all its raw materials. Consequently, the true import content of Alumaco raw materials is close to 100 per cent.

The dependence on capital goods imports and on the expatriate labour-force within the manufacturing sector is as pronounced as the dependence on imported raw material. Although less than 2 per cent of the manufacturing labour-force consists of expatriate workers, yet this small group contains virtually the entire stock of technological and managerial expertise in the sector.

It is therefore an urgent necessity to accelerate the use of domestic resource content of manufactured output. There is a need to increase the backward integration of the Nigerian manufacturing industry. This is of particular importance with respect to the agro-based industries for which there exists an enormous resource potential. Nigeria is rich in agricultural resources which could provide a basis for the rapid development of export-oriented food processing and textile industries. Nigeria's climate is suitable for a wide variety of crops. Before the oil boom the agricultural sector provided some 80 per cent of Nigeria's exports. In the past few years agriculture has been affected by drought, which has reduced both output and exports of cash crops. Table 8 shows the general declining trend in the cash-crop purchases by marketing boards during 1979-1982. The expansion of cash-crop production is essential for the growth of both manufactured and primary exports from Nigeria.

Table 8. Cash-crop purchases by marketing boards, 1979-82

(Tons)

Cash crop	1979	1980	1981	1982
Palm kernels	230,762	189,139	193,865	171,821
Cotton	117,399	80,931	77,875	35,890
Cocoa	144,309	107,207	184,392	106,503
Rubber	21,140	21,230	19,607	20,521
Groundnuts	18,281	31,082	1,724	467

Source: Lloyds Bank. Nigeria Economic Report 1984.

Equally important is the growth of a local capital goods industry which can benefit from the existence of relatively cheap energy resources. Nigeria is the fifth-largest producer in OPEC, with a capacity of 2.4 m b/d of light,

high quality oil, which has a low sulphur content. Proven oil reserves are put at 20 billion barrels, which is sufficient to last at least 15-20 years at 1979 rates of extraction and large areas remain to be explored. Nigeria is the second-largest supplier of oil to the USA, which takes almost half of Nigeria's oil.

Natural gas reserves are estimated at 88,000 billion cubic feet, and offer good potential for diversification within the hydrocarbon sector. The main obstacles to harnessing the associated gas (which is currently flared) are the high costs involved. Plans for a large-scale project were drawn up as early as 1976, envisaging construction of a $414 million plant, but uncertainty over marketing prospects led to a progressive scaling-down of plans. A revised scheme costing $7 billion was under consideration in 1983. The military Government in 1984 announced its intention to go ahead with this smaller version. Development of both the steel and the petrochemical branches depends crucially upon the efficient utilization of natural gas reserves. Both these industries can play an important part in reducing aggregate import needs in the medium and long run. A resource-based import-substitution industrialization strategy can prove viable in the Nigerian context given the large domestic markets and the many obstacles which impede the growth of manufactured exports. Future government initiatives may increasingly explore this possibility. Resource-based industrialization will, however, require a change in the pattern of industrial investment in Nigeria.

2.4 Investment and ownership patterns

Appendix Tables A.11 and A.12 present an inter-branch distribution of actual and planned manufacturing investment within Nigeria. The main features are summarized in Table 9.

These estimates are very tentative, being based on a variety of sources. Comparability in terms of sectoral shares, particularly over time, is strictly limited. Nevertheless, they permit a few generalizations. First, even if the 1981-1985 figures are ignored on the grounds that many of the projects envisaged for implementation during the Fourth Plan period have in fact been shelved or drastically reduced, the importance of the public sector in

Table 9. Distribution of manufacturing investment in Nigeria, 1971-1985

Year	Private					Public				
	Consumer goods		Intermediate and capital goods		Total	Consumer goods		Intermediate and capital goods		Total
	Value[a]	Per cent	Value[a]	Per cent	Value[a]	Value[a]	Per cent	Value[a]	Per cent	Value[a]
1971--1974	252.4	70.6	105.2	29.4	357.6	161.0[b]	11.12[b]	1,286.2[b]	85.57[b]	1,447.2
1975--1978	1,439.2	73.2	527.1	26.8	1,965.3					
1975--1981						782.0	20.60	3,017.2	79.40	3,799.2
1981--1985 [c]					3,000	500.0	9.21	4,924.0	90.78	5,424.0

Source: Tables A-11 and A-12; Forrest, T., "Recent Nigerian Industrialization", in Fransman, M., Industry and Accumulation in Africa, Heinman, London, 1983, p.335.

a/ Millions of current naira.
b/ 1970-1978.
c/ Planned investments in the Fourth Plan.

Nigerian industrialization clearly stands out.[1/] It is responsible for the bulk of investment in the intermediate and capital goods sector - according to Table 9 about two-thirds of investment in the intermediate and capital goods industries originated in the public sector during 1971-78. Investment levels during the Fourth Plan envisaged a small reduction in the public sector's participation within the intermediate and capital goods sector. The State sector participates in many joint ventures with both domestic and foreign capital. Particularly important is the role of state financing institutions, such as the Nigerian Industrial Development Bank (NIDB) and the Nigerian Bank for Commerce and Industry (NBCI). Public industrial investment has tended to grow faster than private investment, but institutions such as NIDB and NBCI have ensured that this growth goes hand in hand with increased collaboration with domestic and foreign private capital.

Secondly, Table 9 shows that private investment remains concentrated in the consumer-goods branches. The data suggest that the share of private investment in the consumer-goods branches has risen and that of public investment has fallen, at least until 1978. Private sector investment has grown faster in the consumer goods than in the intermediate and capital goods branches.

Over the period 1970-78 investment in manufacturing industry grew rapidly. Gross investment has been estimated at N 500-N 530 million during 1971-74. During 1975-78 this rose to N 3.6 billion.[2/] Direct public investment contributed at least 60 per cent of this amount. Private investment which had grown rapidly during 1975-77 slowed down somewhat following the indigenization decrees of 1977. This slowdown, however, represents two different tendencies: direct foreign investment contracted, while domestic private sector investment continued to grow. After 1978, investment levels within the manufacturing sector have generally been reduced, particularly following the Government's decisions in and after 1982 to severely restrict imports and to postpone and reschedule major industrial projects.

1/ This is also illustrated for an earlier period 1971-78 in a study undertaken for UNIDO. See The Role of the Public Sector in Nigeria's Development, Udo-Udo Aka, UNIDO/IS.363, 1982.

2/ These estimates are in 1975 prices.

Foreign investment has also continued to contract during 1978-82. Until 1975 foreign investment had been an important - many would argue dominant - factor in Nigerian manufacturing. In 1975, private non-Nigerians held 42 per cent of the equity of large-scale manufacturing enterprises.[1/] Foreign manufacturing investment represented about 22 per cent of total foreign investment in Nigeria during 1965-76. The United Kingdom was the largest foreign investor in Nigeria during this period. Although foreign private investment grew from 1965 to 1970 (including the period of the Nigerian war) and again between 1974-77, there was an important difference in the experience of the 1960s and 1970s.

During the 1960s annual inflow of net direct, private foreign investment on average exceeded outflows in the form of profit, dividends and other service payments by about 18 per cent. This situation was reversed during 1970-78. During this period outflows exceeded net direct, private foreign investment. Moreover, the period since 1972 has seen a rapid rise of service payments in comparison to profit repatriation. It is interesting to note that this trend predates the indigenization decree of 1977 by five years. It reflects the rising price of technology and managerial services Nigeria has had to import and Nigeria's weakening bargaining position in the markets for these services.

The indigenization decrees were promulgated in 1972 and 1977. The 1972 decree envisaged the transfer of those businesses in the private sector believed to be within the competence of indigenous expertise and Nigerian equity participation to a minimum of 40 per cent in 35 more advanced enterprises. Eighty capital-intensive modern enterprises were exempted from this decree and remained in foreign hands. The 1977 decree (effective December 1978) provided for the whole or part indigenization of all foreign enterprises. The minimum level of Nigerian equity partnership in industries previously exempted was 40 per cent. Equity participation was raised to 60 per cent in other cases.

1/ Forrest, op. cit., p.325.

The effects of the implementation of the indigenization decrees have been widely studied. A survey of industrial units in Kano, with particular reference to indigenization, found a high concentration of indigenous equity ownership and the emergence of new patterns of collaboration between local and foreign investors. The technological control of the latter group is seen to have increased, registering a negative impact on the rate of growth of manufacturing employment in Kano.[1/] Another study notes that indigenization has "not affected the basic fact that the most important economic activities going on in Nigeria are foreign directed or foreign derived".[2/] In this study emphasis is also placed on Nigeria's high level of technological dependence. Finally, another study opines that "indigenization encouraged collaboration between Nigerian and foreign capital and enhanced the national credentials of the foreign companies".[3/] Thus, although indigenization raised the level of local participation in Nigerian industry and led to a slowing down of the net inflow of private capital into Nigeria, foreign investment has retained an active presence in the Nigerian manufacturing sector. Appendix D provides details pertaining to sales, profit, net asset and ownership of major companies in Nigeria .

2.5 Geographical distribution of manufacturing activity

Indigenization has not led to a marked lowering of the extent of industrial concentration. This concentration is reflected not only in terms of ownership and size of firms, but also in terms of their geographical dispersion. During the 1970s industry has become increasingly concentrated around Lagos and in the Kano-Kaduna axis. Lagos' share in industrial production increased from 38 per cent in 1965 to 71 per cent in 1976.

1/ Hoogvelt, A., "Indigenization and Foreign Capital: Industrialization in Nigeria", Review of African Political Economy, No. 14, January-April 1979, pp.56-68.

2/ Osoba, S., "The Deepening Crisis of the Nigerian National Bourgeoisie", Review of African Political Economy, No. 13, May-August 1978, p.66.

3/ Beckman, Bjorn, "Whose State? State and Capitalist Development in Nigeria", Review of African Political Economy, No. 23, January-April 1982, p.48.

However, as Appendix Table A.13 shows, Lagos' share in MVA was 48.2 per cent in 1976 - having declined from 53.6 per cent in 1968. Lagos' share was tne highest in structural metal products, beer and soft drinks, sugar refineries and cement in 1968. By 1976 there had been a decline in Lagos' share within all these branches - except metal products. Lagos' share in the value added generated by textiles increased from 32 per cent in 1968 to 56 per cent in 1976. Small increases were also recorded in the vegetable oil and lumber-processing subsectors.

Disaggregated information on changes in the pattern of regional industrial dispersion of manufacturing units is not available for later years. The Government has, however, adopted a number of measures to stimulate the generation of regional dispersion of industry. A variety of incentives have been offered to entrepreneurs willing to establish "pioneer industries" in less developed regions. An emphasis on resource-based industrialization can contribute to a lowering of regional concentration. Some resource-based industries have been developed recently in the formerly neglected Middle Belt region of Nigeria. Such industries include the Savannah sugar-processing factory near Numan; the Benue cement factory at Yandev near Gboko; and the massive Ajaokuta steel-production plant near Okenne in the Kwara state. The establishment of these large-scale industrial plants has necessitated the investment of substantial financial resources in previously neglected regions. Over a billion naira have been invested in the Ajaokuta steel factory; about N 47 million in the Benue cement factory and over N 400 million in the Savanna Sugar Company.

A recent detailed study of industrial concentration in the Kwara state of northern Nigeria has been undertaken for UNIDO.[1/] The study found that manufacturing activity remains concentrated around Lagos (data used is generally for 1982), but diffusion over a wider regional area has slowly taken place since 1960. A similar pattern is noted with respect to the Kwara state. Whereas in 1962, only the state capital - Ilorin - had any manufacturing

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1/ Abiodun, J., Industrial Policies and the Pattern of Manufacturing in Nigeria, Symposium on Regional Development Processes, Vienna, Austria, 20-24 August 1984, UNIDO Conference Room Paper No. 24.

establishment employing ten people and above, by 1982, nine of the 12 local government areas in the State had such establishments. Furthermore, the indigenization policy of the Federal Government has resulted in a greater involvement of Nigerians in the ownership and management of manufacturing activities. However, despite this, many of the enterprises are still technologically dependent on foreign sources.

The Kwara-state analysis reveals that most of the establishments have no backward linkage effects on activities in their surrounding areas and have only very limited forward linkages. Most of the establishments are geared towards final consumption. In addition, a majority of the establishments rely on raw materials imported from foreign countries or on inputs obtained from other states in Nigeria. The result of a high dependence on foreign raw materials is the vulnerability of these establishments at a period of foreign exchange restrictions, as is currently the case in Nigeria. A few of these establishments are already faced with possible closure consequent upon the lack of imported raw materials. In terms of labour, the greatest favourable impact occurs in Ilorin where 59.5 per cent of the industrial workers are either indigenous to the town or are indigenous to other towns in the Kwara state. The analysis also reveals that other centres of manufacturing activities in Nigeria are succeeding in attracting labour away from metropolitan Lagos, thus indicating a positive impact of the decentralization efforts of the Federal Government. Another finding of the analysis indicates a positive relationship between the regional (states) population and the size of employment in manufacturing activities. The improvement in the pattern of the regional distribution of industry requires correcting important structural imbalances within the sector and indeed within the economy as a whole.

2.6 Summary

Although manufacturing growth had been rapid during the 1970s, particularly by African standards, important structural imbalances developed within the sector. These imbalances contributed to a virtual evaporation of growth of MVA during the 1980s. The drastic cutbacks in imports following the introduction of the austerity programme in April 1982 and the revision of government investment plans anticipated in the budgets for 1983, 1984 and 1985 exposed the weaknesses of the Nigerian manufacturing sector.

Perhaps the most important weakness is the dependence on imports of raw materials, technology and managerial services. Although following an import-substitution strategy, the net import requirements of the manufacturing sector have continued to grow rapidly during the 1970s. Resource-based industries - both agro- and hydrocarbon-based branches - have stagnated, at least partly, because of a system of protection and state intervention which discriminates against them. In the industries which benefit from this system - e.g., vehicle assembly units - gross profit rates are extremely high, but investment rates are low. This indicates a high level of industrial concentration, both in terms of size of individual units and the regional dispersion of industry. There are indications that capital intensity has increased significantly during the 1970s - although estimates cannot be made due to the absence of capital stock data. Public investment remains concentrated in highly capital-intensive industries and efficiency in the public manufacturing sector remains low. The cost of plant and equipment in Nigeria is relatively high due to high costs of construction and of expatriate skilled labour and the need for infrastructural investment by the firms themselves. The average cost of fixed asset per job in modern Nigerian industry was estimated at $15,000 in 1977 and there are indications that the marginal cost has risen significantly in the 1980s.[1/] Moreover, private sector investors have a noted preference for capital-intensive projects due to the underpricing of capital equipment and the low real interest rates that have prevailed in recent years.

National industrial policy thus has a crucially important role to play in correcting these structural deficiencies. The triple overriding objectives must be: (a) increasing industrial efficiency, by streamlining public sector investment appraisal and policy-implementation procedures; (b) regulating monopoly profits and prices within the modern, private industrial sector; and (c) reducing the import dependence of Nigerian manufacturing.

All these objectives require the development of a policy framework which facilitates the development of resource-based and relatively labour-intensive industries and contributes towards a wider regional dispersion of manufacturing activity. Nigeria has been moving towards developing such a policy framework in her efforts to deal with the present foreign exchange crisis. These efforts are reviewed in chapter 3.

1/ IBRD: Nigeria: The Industrial Incentive System: A Review and Analysis, Report No. 4272-UNI (1983), p.15.

3. INDUSTRIAL OBJECTIVES, POLICIES AND PROSPECTS

3.1 Industrial plans, policies and strategies

As noted earlier, Nigeria adopted a strategy of relatively "easy" import-substitution-based industrialization during the 1960s as well as during the years following the oil boom of 1973.

Among the major policy initiatives taken during this period was the granting of pioneer status, including a profit tax holiday varying from two to five years depending on the amount of initial investment. This was incorporated in the Industrial Development (Income Tax Relief) Act, 1958, amended as Decree No. 22 of 1971. The 1971 amendment stipulated more conditions under which profit tax relief may be granted. Apart from the volume of invested capital, a company was requested to show signs of development, use local raw materials, implement realistic plans for staff training and manpower development, particularly with respect to Nigerian personnel, and be important nationally. Provision was also made for tax relief for small enterprises during the first six years of operation. The Import Duties Relief Act of 1957 was amended under the Approved Users Scheme of 1964. Under this scheme a manufacturing firm was permitted to import certain raw materials completely free of import duty or with high concessions on duty. The Customs (Draw-Back) Regulation as well as the Dumped and Subsidized Goods Act, 1958, were designed to encourage the development and expansion of manufacturing industries in Nigeria. Other financial incentives included provisions for Accelerated Depreciation on Capital Investment and Tariff Protection. Monetary policies and incentives included the establishment of financial institutions such as the Nigerian Industrial Development Bank (NIDB), the Federal Loans Board (FLB), and the Nigerian Bank for Commerce and Industry (NBCI). The latter tends to operate as an industrial promoter rather than as a bank. Finally, it may be noted that the indigenization decrees (known as the Nigerian Enterprise Promotions Acts) were issued and amended over the period 1972-1977.

Industrial policy objectives have also been incorporated in the subsequent National Development Plans.

In the Third National Development Plan (TNDP), 1975-80, prepared in the expansive period immediately following the first oil boom, rapid industrialization was identified as a key element in Nigeria's future economic development. An important objective was the development of a more diversified and integrated industrial sector based upon the large domestic market and rapidly rising incomes. A significant proportion (25 per cent) of the greatly expanded public investment programme was allocated to manufacturing, mainly to projects for heavy and intermediate industrial goods.

Other main objectives for industry under TNDP included: regional dispersal of industry, employment creation, export promotion, small-scale industry development, acquisition of technology for "knowledge-intensive" industries and development of local technical skills and "know-how". These goals, however, were by and large indicated in very general terms with little reference to the specific instruments proposed for attaining them.

Under the Fourth National Development Plan (FNDP), 1981-85, rapid manufacturing growth is one of the three principal development priorities after the expansion of agriculture and the strengthening of the economic infrastructure. The FNDP stresses rapid economic growth especially in the non-oil commodity-producing sectors together with more equitable income distribution and greater local participation in ownership and management of productive enterprises. With the coming on stream of several large-scale investments initiated under TNDP, real manufacturing growth was projected to average 15 per cent annually.

There is a substantial degree of continuity between the objectives of TNDP and those of FNDP as regards manufacturing. Amongst others, regional dispersal, export promotion, employment creation and promotion of small-scale industries continue as important aims.

The FNDP, however, puts greater emphasis on increasing self-reliance within the manufacturing sector by promoting the growth of resource-based industries, stimulating the growth of private sector investment in the manufacturing sector and improving industrial efficiency and competitiveness. The emphasis on basic industry development is maintained, with steel, refineries and

petrochemicals accounting for 61.6 per cent of the investment of the Federal Government within the manufacturing sector over the period 1981-85.

3.2 Recent changes in industrial policy

Recent events have overtaken the FNDP. The foreign exchange crisis of the early 1980s has led to a rescheduling and scaling-down of many of the projects identified in the Plan. In April 1982, the Government introduced a stabilization programme to improve the balance-of-payments situation. The principal measures adopted included: (a) increased tariffs (on a range of selected goods) and their extension to public sector imports (previously exempt); (b) an enlarged list of restricted imports; (c) a graduated system of advanced deposits for imports to further control import demand and to sterilize progressively a substantial portion of the money supply; (d) a customs crackdown through tightening of customs administration; (e) a 2 per cent across-the-board increase in interest rates; (f) a planned 40 per cent cutback in public investment in 1982; (g) restrictions on external capital transfers; and (h) an increase in petroleum product prices.

This led to a substantial reduction in imports during 1983, 1984 and 1985. There has also been a significant cutback in industrial investment. The Government has announced project-rescheduling schemes in the budgets for 1983, 1984 and 1985. Many private sector investors have also postponed their investment plans. Particularly badly affected is the steel industry which throughout 1984 was the subject of State investigation. The Ajaokuta and Delta steel plants were said to be suffering from administrative and financial mismanagement. The chairman of the panel set up to investigate the Delta plant said in late 1984 that the panel had discovered a major fraud. The senior officials including the general manager have been dismissed following the report of the panel. The Government is, however, going ahead with plans to establish a flat products steel plant to enhance the production of machine tools and machinery spare parts. Details have also been announced of new investments in the shipbuilding industry. Investment expansion in the private sector has been constrained due to the shortage of import licences and the lowering of import duty on some competitive products such as cocoa paste, cigarettes, sacks, tubes and fittings. The decision to lower these import duties was announced in the 1984 budget.

The budget also contained indications of the Government's current industrial priorities. Priority projects identified in the 1984 budget speech by the Head of State included the paper-mill projects at Jebba, Iwopur and Calabar, the machine-tool industry in Oshogbo, the fertilizer project at Port Harcourt and the Savannah Sugar Company. New investment in the paper mills is expected to be around N 450 million.

The programme for the industrial sector was also to include incentives for industries using local raw materials, assistance to small-scale industries and investment promotion. When issuing import licences, priority was to be given to raw materials, spare parts, essential commodities and export promotion. In line with the cuts in the capital allocation for transport, the Head of State emphasized that in the area of works and housing the focus will be on rehabilitation and maintenance rather than new construction.

In early 1984 a high-level committee was set up to review all federal projects with completion costs in excess of N 30 million. The committee submitted its recommendations in May. It divided the 615 projects that it reviewed into four categories and identified those within the first category as "core" projects. The recommendations of the committee are likely to form the basis of government capital-spending plans until 1986. A new Fifth National Development Plan is currently being drafted to run from 1986-1990. Details of the recommendations of the review committee or the orientation and tentative size of the Plan have not yet been finalized. Total Plan outlay is tentatively fixed at N 66.9 billion, of which public sector accounts for N 42 billion.

Despite the general cutback in industrial investment, it is interesting to note that international project loans for medium-term industrial ventures have not slackened. Over the period July 1983 - June 1984, such loans totalled $691.7 million, the average maturity period being 8.2 years. The major international lenders include Morgan Greenfall, managing five loans, Lazard Brothers (three), Midland Bank International and Samuel Montague/Banque Parebas (two each). Thirteen of the 14 loans contracted during this period were made to state Governments or publicenterprises. In January 1985 an independent agreement was concluded with a United States telecommunications group on refinancing $365 million

trade debts. Recently the Swiss Bank Corporation has agreed to lend $171 million to the Nigerian Telecommunications (UNITEL). Nigeria's ability to attract private sector international finance as well as its success in concluding debt-rescheduling arrangements with its uninsured creditors during 1984, bypassing official IMF conditionality, illustrates that there is widespread confidence in the possibilities of an early recovery and in the broad continuity of government policies with regard to the industrial sector.

The policy initiatives of the period 1982-85 have had a significant impact on the performance of manufacturing enterprise. Many firms - particularly breweries and pharmaceutical companies - have experienced profits rise while turnover declined during 1984. They have been able to sell off stock as imports have fallen. Import restrictions have provided opportunities for company re-organization and increased the use of domestic resources. There has been a revitalization of the local paper, sugar, cement plants to limit raw material imports to N 1.8 billion during 1985 - 40 per cent less than the previous year. This is likely to lead to an underutilization of capacity - which currently stands at about 30 per cent - and a growth in urban unemployment. The Government has rationalized the foreign exchange allocation system. It is emphasizing the need to reduce production in branches such as breweries, soft drinks, plastics and vehicle assembly. Increased import substitution remains the key element in the new industrial strategy. During 1984 many agro-based units have achieved some success in increasing the domestic content of production. In some areas import substitution is not possible in the short run. Thus the 20 per cent reduction in capital-import substitution planned for 1985 must mean a reduction of industrial investment and employment during the present year.

3.3 Institutional infrastructure

Nigeria has a relatively well developed institutional infrastructure for the formulation and implementation of industrial policy initiatives. Guidelines for the development of this system have been provided in a series of legislations (see appendix B). The most recent of these documents is the Nigerian Industrial Policy and Strategy Guidelines issued in 1980. This document outlines the main features of Nigerian industrial policy.

The Ministry of Commerce and Industry is the central decision-making institution. It advises the Government on the formulation of industrial policy. It is formally responsible for the operation of federal industrial projects. It also supervises public enterprises and encourages and regulates private industrial investors. An Industrial Development Co-ordination Committee has been established to simplify procedures for investment-sanctioning and to provide a focal contact-point between government agencies and private (specially foreign) investors. The Committee also advises the Ministry on other matters of relevance for the reformulation of industrial policy.

Other organizations, active in the industrial field, include:

(i) The Standards Organization of Nigeria, which was established by law and charged with the responsibility of prescribing and monitoring standards for industrial products in Nigeria. Its role is to ensure that, quality-wise, the products of Nigerian manufacturing industries compare favourably with their foreign counterparts.

(ii) The Industrial Inspectorate Division which was also established by law and charged with responsibility for checking claims of capital expenditure with a view to verifying claims regarding industrial investment expenditure. The Division carries out physical inspection of plant and machinery in factories to check irregularities.

(iii) The Nigerian Enterprises Promotion Board which was set up by law as an instrument for the implementation of Government policy determined to closely involve Nigerians in the industrialization process and to have them ascend to the commanding heights of the national economy. Under the Nigerian Enterprises Promotion Act, all business enterprises are grouped into three Schedules. Those classified in Schedule I are reserved exclusively for Nigerians. They are relatively simple enterprises in terms of technology and capital investment. Foreigners can participate in Schedules II and III enterprises up to 40 per cent and 60 per cent of equity, respectively. The Board is to ensure compliance with this requirement by all business enterprises in the country.

(iv) The National Office of Industrial Property which was also established by law principally to oversee the licensing and technical agreements between Nigerians and their foreign business associates. The aim is to ensure that the terms and conditions of co-operation are equitable and that there are no undesirable clauses in these agreements which could be prejudicial to the interests of the Nigerians involved and the national economy.

(v) The Export Promotion Council which is, as its name implies, charged with the responsibility of encouraging exports of Nigerian goods and services to other countries by helping to remove any disincentives in this regard and positively encouraging Nigerian entrepreneurs to sell their products in foreign markets.

(vi) The Industrial Training Fund which is a statutory organization concerned with promoting on-the-job training of industrial personnel and creating training and industrial attachment facilities for technology students. It helps with the funding of such training and organizes training courses for various categories of the country's labour force.

(vii) The Nigerian Industrial Development Bank (NIDB) and the Nigerian Bank for Commerce and Industry (NBCI), which are two financial institutions set up by the Government dealing with industrial financing. The Government makes funds available to these banks for on-lending to industrial ventures. The terms of development institutions are less stringent than those of the commercial banks. In addition, the guidelines issued by the Central Bank of Nigeria to the financial institutions in the country provide for preferential lending to industry, especially to small-scale industries. There are other financial arrangements to enhance availability of funds for small-scale industrial development throughout the country.

(viii) Investment information and promotion: There is, in the Federal Ministry of Industries, an Investment Information and Promotion Centre which is concerned with furnishing both existing and prospective industrialists with the information they require for sound investment decisions. The Centre also assists investors in other ways, such as linking them with joint-venture partners and rendering advice on sources of machinery and equipment. A branch office of the Centre has been established in New York; it is proposed to establish other branch offices in other business centres of the world. An industrial data bank is also being established.

(ix) Industrial research institutes: In order to stimulate relevant applied research and development, the Federal Government has established twenty-two research institutes. Two of these, - the Federal Institute of Industrial Research, Oshodi (FIIRO), and the Projects Development Institute (PRODA), Enugu, are charged with special responsibilities for industrial research. Accordingly, their major focus is on development of resource-based processes, projects and equipment, as well as an adaptation of industrial technologies to the Nigerian environment. Particular emphasis is currently being placed on the agro-allied and mineral-based industrial subsectors.

Since Nigeria is a mixed-enterprise developing economy, the Federal Ministry of Industry and its bodies are only a part of the whole infrastructure for carrying out overall industrial policy in the Federation. Apart from other State ministries, many semi-governmental and non-official agencies have been created to provide infrastructural and other support

services. These include: development banks and other financial institutions for industry; training institutions; industrial business-information services; project analysis and design services; testing services for raw materials and finished products; industrial standardization, quality control services; technology transfer advisory services; private consultancy services for industry; and export promotion services.

Among various supporting institutions listed above, of particular importance are the so-called interest groups, which not only attempt to influence administration, but the administration itself consults them in the formulation and implementation of government policy. The formally organized interest groups in Nigeria comprise the manufacturers' associations and the chambers of commerce and industry. The most important are the three largest groups. They comprise the organizations which are open to all industrial firms: the Manufacturers Association of Nigeria (MAN), the Nigerian Employers Consultative Association (NECA) and the Chambers of Commerce and Industry. In addition, there are other associations representing the interests of industrial firms of specific branches. The formal interest groups frequently collect their own information on the activities of their members, and are familiar with the attitudes and opinions of the firms they represent. This information is often of great importance in the formulation of directives and decrees. When an interest group has participated in formulating a policy, it can also be asked to contribute to its implementation.

The main objective of the Manufacturers Association of Nigeria (MAN) is to develop and promote the contribution of manufactures to the national economy through representation in all reputable bodies, Government and others, whose work may affect directly and indirectly the interests of manufacturers. The MAN collects information and surveys data which is processed and made available to members. It has representatives in various government organizations, for example, the National Economic Advisory Council, the Export Promotion Council, the National Wages Advisory Council, and in the National Standards Organization. Through participation in decision-making in these organizations, it can exercise a direct influence on industrial policy formulation.

The Nigerian Employers Consultative Association (NECA) was founded in 1957 to provide a means for consultation and exchange of information on questions arising about the relations between employers and workers. The NECA carries out its own data surveys and analyses, which are then sent to members. As one of the central employers' organizations it represents, in a similar way to the MAN, the opinion of the majority of the employers vis-à-vis the Government. The NECA is also represented in various government organizations, where it can exercise influence. In addition, it sends delegates on government invitation to the ILO conferences. In this way Nigeria's employers are able to express their views on international recommendations which could subsequently become law.

The Chambers of Commerce and Industry regard their main task to be the protection of all matters affecting trade and industry for the promotion of the economic growth of the country. They collect and analyse information. The Lagos Chamber of Commerce, for instance, has its own Statistics Standing Committee. Members are mainly given information on questions connected with the establishment of new industries and commercial relations on industrial fairs, customs tariffs and incentives. The various chambers, which exist in almost all of the 12 states, are members of the Nigerian Association of Chambers of Commerce, Industry, Mines and Agriculture. This Association appoints representatives from the private sector who are delegated to the government organizations. The representatives sit in the bodies already mentioned, in which the MAN and the NECA are also represented. The Chambers also maintain close contacts with the Ministries.

In view of their large membership, the MAN, the NECA and the Chambers of Commerce should be able to exercise considerable influence in the formulation of government policy, but it must be considered that the degree of influence does not only depend on the number of members, but also on the self-assurance and authority of the particular representative of an industrial organization.

3.4 Problems and prospects for engineering and textile industries

Having outlined the broad macro and institutional framework of industrial development, it may be convenient to look at constraints on the development of some individual branches. Engineering and textiles have been selected on the basis of their intrinsic importance in the Nigerian manufacturing sector and because of the availability of relatively recent field reports.

A. Engineering:[1/] The foreign exchange shortage and the stabilization programme of 1982 have severely affected the engineering industry. Due to delays in the issuing of import licenses, stocks of raw materials and intermediate products fell sharply during 1983 and 1984 causing severe problems of underutilization of capacity. Many of the largest firms had to close down their plants. These included Peugeot (car assembly plants), Metal Box (fabricated metal products) and John Holt (agricultural implements). Many other firms had to reduce their work-force by as much as 50 per cent. Production levels in 1983 were only 20 per cent of those of 1982. The continuation of an austerity programme with restrictions on imports and on the growth of domestic demand may create bankcruptcy on a wide scale within the engineering industry.

The engineering sector can be divided into two parts:

(a) Twenty to thirty large firms assembling end-products from imported material sent to them by their parent firms: they include vehicle assembly units and producers of some consumer durables. These firms probably account for the majority share of output and value added in the Nigerian engineering industry;

(b) There is a larger group of fabricated metal products producers destined for the construction industry.

An important structural weakness of the engineering sector is the virtual absence of forges, foundries and machine shops producing inputs for firms in groups (a) and (b). This is due to the heavy reliance on imports. Imports of engineering inputs account typically for about 50 per cent of Nigerian imports. The austerity programme has reduced this level very sharply.

Engineering industries attracted only about 4 per cent of total private investment in Nigeria in the late 1970s and accounted for only 8.5 per cent of MVA and 5 per cent of manufacturing employment. The domestic price of locally produced engineering products is roughly 25 per cent higher than that of equivalent imports. Some of this differential is due to inflated import costs and low labour productivity. Most engineering firms also face a serious shortage of skilled labour. Infrastructural constraints - power,

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1/ This section is mainly based on a World Bank study, Nigeria: Review of the Engineering Industries (1983) (mimeo).

communication and transport in particular - are other serious bottlenecks. The use of private electricity generators is very widespread. The supply of fuel oil is also irregular. This leads to inefficiencies and concentration within a very limited product range. Contacts between government officials and businessmen in the industry which can stimulate infrastructure improvement are relatively few.

The Government has specified that by end-1986 the local component of vehicle assembly should be raised to 100 per cent, but the large firms are making very few efforts to increase subcontracting. Without the development of substantial subcontracting facilities, the engineering sector faces a severe crisis in the medium term.

The non-vehicle assembly engineering firms enjoy relatively low levels of effective protection, as shown in section 2.3 (see Table 6). This has also adversely affected the performance of the engineering industries. Improving efficiency within this branch and increasing opportunities for the efficient production of subcontracting services is of greatest importance as far as the engineering industries are concerned. Technical assistance should be extended to meet these needs.

b. Textiles:[1/] The Nigerian textile industry is the largest in West Africa in terms of production capacity. The industry grew rapidly during the 1960s due to large-scale foreign investment, but its raw material base remains undeveloped. Profit rates were high during the 1960s due primarily to high levels of protection, but supply constraints led to the closure of many textile mills in the early 1970s. The industry staged a partial recovery in the late 1970s due to import bans and the offering of liberal investment incentives. However, in the early 1980s supply problems became acute - with local production accounting for less than 28 per cent of the industry's needs. Illegal imports of textiles have also grown rapidly. Nigeria needs more than 200 million metres of cloth a year but, according to the Textile Manufacturers Association, more than half is supplied by goods imported unofficially from neighbouring Ivory Coast and Cameroon, as well as India, the Republic of Korea and Europe.

1/ Information in this section is mainly based on the World Bank study Nigeria: Textile Sector Review, 1983 (mimeo).

No national survey of the textile industry has been made since 1970. According to the Nigerian Textile Manufacturers Association there were 95 enterprise users of yarn in 1983. Three per cent of the textile industry work-force is employed in establishments consisting of 100-500 workers, 14 per cent in those with 500-1,000 workers and 83 per cent in establishments with a work-force in excess of 1,000. The majority of the textile mills are owned by foreign investors.

The Nigerian textile industry is estimated to operate some 693,000 spindles; about 17,500 looms; some 80 printing machines; and an estimated 50 knitting machines. In 1982, it produced about 410,000 million metres of fabrics (at a value estimated at N 554 million) or about 51 per cent of the estimated 800 million metres total consumption in the country. The importance of the textile industry lies foremost in its employment generation ability. It has always been the leading employer in manufacturing (approximately 120,000 in 1980), although in the last two years, textile employment has decreased to an estimated 90,000 in 1983.[1/] The textile industry also is important for its economic linkages with the domestic cotton producing activity and the garment industry. In 1981/82, the textile industry consumed all of the 21,000 tons of domestically grown cotton and needed to import some 57,000 tons more to cover the shortfall. The garment industry is still at present in a very early stage of development (consisting of some 30 smaller-scale establishments employing an estimated 2,000 workers)[2/], but it holds good potential for further development when domestic fabric production strengthens to cater more effectively to domestic demand.

Nearly 25 per cent of the existing textile mills are integrated mills. A breakdown of the leading mills accounting for two-thirds of existing capacity, by operating type, is given in Table 10.

More modernization has occurred in the weaving than in the spinning mills. Shortage of machinery spare parts has become an increasingly important problem since 1982. The product range is relatively restricted, ranging from

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1/ Source: Nigerian Textile Manufacturers Association.

2/ Ibid.

Table 10. Nigeria - Textile manufacturing capacities, 1978/1979

Area	Installed machinery	
	Spindles	Looms
Lagos Area		
Apprint (Nigeria) Ltd.	46,800	1,000
Arcee Textile	-	224
Atlantic Textile Manufacturing Co. Ltd.	12,000	114
Bhojsons Industries Ltd.	-	300
Daltex (Dalami Textile Mills Ltd.)		208
Expee Industries Ltd.	-	299
Five Star Industries Ltd.		272
GDH Textile Manufacturing Ltd.		...
Ganela	15,000	...
Jaybee Industries (Nigeria) Ltd.	...	...
Lagos Textiles	...	60
Nichemtex Industries Ltd./UNTL	20,700	756
Nigerian Synthetic Fabrics Ltd.	-	-
Closed	10,700	220
Nigerian Textile Mills Ltd.	45,000	1,434
Nigerian Weaving and Processing Co. Ltd.	5,000	...
President Clothing Co. Ltd.	-	...
Stecomill Textiles Ltd.	36,000	...
Western Textile Mills Ltd.	12,000	68
Hong Kong Synthetic Fiber Co.	-	500
Spintex/Sun Flag	26,000	100
	228,400	5,555
Kaduna Area		
Arewa Textiles Ltd	55,000	1,752
Kaduna Textiles Ltd. (Being closed)	84,500	2,118
Norspin Ltd./UNTL	45,000	-
Nortex (Nigeria) Ltd.	25,490	...
Northern Nigeria Textile Mills Ltd.	-	-
Unitex (United Nigerian Textiles) Ltd./UNTL	37,000	2,500
Zamfara Textile Industries Ltd.	21,000	...
	267,990	6,368
Kano Area		
Bagauda	4,000	170
Kano Citizen's Trading Co.	-	...
Kano Dyeing and Printing	12,000	...
Nigerian Spinning and Dyeing	2,400	-
Nigerian Suiting Manufacturing Ltd.	-	48
Northern Textile Manufactures Ltd.	620	146
Funtua Textiles/UNTL	15,360	376
	34,380	740
Other Areas		
Aba Textile Mills Ltd.	28,800	851
Edo Textile Mills Ltd.	...	...
General Cotton Mill Ltd.	50,000	...
Kainji	15,000	...
Mid-West Textile Mill Ltd.	20,000	...
Prospect	4,000	...
Sunflag Knitting Mills (Nigeria) Ltd.		40
Westtexinco	12,000	...
Woolen and Synthetic Textile MFG. Ltd.	-	68
Zaria Industries Ltd.	15,000	...
Estimated Total Capacity in Mills	144,800	959
Where Individual Capacity not Available	17,670	3,878
National Totals	693,240	17,500

Source: Nigerian Textile Manufacturers' Association, Federal Ministry of Industries, ITMF.

printed cotton (called African prints), accounting for 70 per cent of the output, to cloth mainly of polyester blends (5 per cent of output). The African print output has increased in recent years and there has been significant product upgrading. This is partly in response to the growth in illegal textile imports which are often of a superior quality. Product design is mainly determined by the only two wholesalers in the country - UAC and CFAO of Nigeria. Response to the challenge from illegal imports is constrained by a severe shortage of installed spinning capacity. This was estimated at about 100,000 spindles in 1983. Moreover, existing capacity is underutilized. Utilization rates are estimated at 64 per cent in weaving and 57 per cent in spinning enterprises. This has led to an increasing reliance on imported cotton staple and yarn. The current import restrictions are creating severe problems for the textile industry.

Productivity in the textile industry is low - spinning output per hour is one-third of the level in Italy, half that of Greece and about 40 per cent of the level in Turkey. Import dependence has increased as domestic cotton production fell from 82,000 metric tons in 1976/77 to 19,900 metric tons in 1982/83. Import licensing delays have created serious production bottlenecks. Import licensing procedures apply to raw materials, spare parts and equipment. Wage costs per unit of output in the industry are high - twice as high as Egypt and four times higher than in the Kenyan textile sector. Gross profit margins are also high. This results in a high cost structure - roughly similar to European textiles but almost twice as expensive as East Asian products of a similar quality. Net effective protection of the textile industry is relatively low and ranges widely between activities. ERPn on African prints with grey cloth as inputs is actually negative, while on grey cloth itself ERPn is as high as 62 per cent.

Improvement in levels of production requires increasing incentives for domestic cotton production, encouraging innovation within the local engineering industries for the production of textile equipment and spare parts, reducing power shortages, emphasizing programmes of in-house training for improving labour productivity and reducing inconsistencies in government policy intervention within the industry.

The long-run prospects of the textile industry are good, if supply constraints are reduced and an increased backward integration is achieved efficiently. Nigeria has a huge potential domestic market. Current per capita consumption of textile goods is estimated at 1.5 kilograms per year - of which more than 50 per cent is imported. Egypt, with a per capita income less than half that of Nigeria, has a per capita textile-consumption rate of 5.0 kilograms per year - more than three times higher than Nigeria. Moreover, immediate investment needs are relatively modest. The World Bank estimated them at about $100 million in 1983.[1/] This is due to the extremely high level of underutilization of capacity. There is a much greater need for investments to increase the supply of domestically produced raw materials, capital equipment and spare parts. This is essential for increasing the backward integration of the industry. It is also important to encourage innovation particularly with respect to product designing and to reduce the dominance of the only two wholesale establishments which currently determine product design within the industry.

3.5 Future prospects of the manufacturing sector and technical assistance

The year 1985 is likely to see the beginning of an economic recovery in Nigeria. GDP fell by -6.6 per cent in 1983 and by -0.7 per cent in 1984. It is likely to register a positive growth rate in the present year. During 1984 there was a significant improvement in the balance-of-payments situation, and agricultural production also improved. Imports have remained depressed, adversely affecting short-term recovery prospects, particularly in the manufacturing sector. In the first half of 1984 there was an increase of more than 30 per cent in international financial reserves, and foreign debts worth N 1.2 billion were paid off. Earnings from oil exports are also likely to be higher in 1984 than in the previous year.

Nigeria's improved economic prospects have been recognized by her international creditors. Nigeria's offer to convert its official debt into six-year promissory notes along the lines agreed to with its uninsured creditors has been seriously considered by all the export-credit agencies. This is so despite Nigeria's refusal to accept the terms of an IMF standby agreement which is normally a precondition for this type of debt rescheduling.

1/ World Bank, Nigeria: Textile Sector Review, August 1983 (mimeo), pp.34-35.

Within the manufacturing sector, good growth prospects exist for industries which can substitute domestically-produced raw materials for imported inputs. Many food-processing plants have experimented successfully with such schemes during 1984 and 1985. For instance, although production is yet at the pilot-plant stage, it has been convincingly demonstrated that composite flour (produced from wheat and locally-produced cassava and maize) can be an effective substitute for wheat flour in baked goods production. Similarly, larger beer of high quality and taste has been commercially produced from a blend of equal proportions of imported barley malt and locally grown sorghum malt. Other import-substituting industries - particularly textiles and clothing - have benefitted from import cutbacks on competing commodities and from substantial reductions in unofficial import operations. Effective control of such operations can legalize the rapidly-growing regional trade and create opportunities for domestic resource-based light manufacturing industries in Nigeria.

Prospects are also good for industrial establishments which can service Nigerian engineering industries. Difficulties in importing spare parts have stimulated the rapid development of an indigenous maintenance and repair industry. Foreign investors have realized the potential for such activities. Thus, since 1984, the tractor and equipment division of the United Africa Company (UAC) of Nigeria has placed primary emphasis on maintenance and repair work. Spare parts and component shortages also create opportunities for small-scale operations - such as foundries, forge shops, etc. - in the metalworking industries. Their rapid development through the encouragement of intra-industrial subcontracting is essential for filling vital "gaps" in the production structure of the manufacturing sector.[1/] Finally, within the heavy industry sector the Government remains committed to an accelerated development of the petrochemical and the cement-producing sectors in order to meet growing domestic demand and cut back import requirements. Foreign partners are actively being sought for completing the second phase of the national petrochemical complex[2/] by 1990.

1/ This point is discussed in more detail in section 3.3.

2/ Involving the creation of capacity for the production of ethelyne (200,000 M tons/year), LDPE (110,000 M tons/year), HDPE (70,000 M tons/year), VCM (145,000 M tons/year), PVC (140,000 M tons/year).

There are thus grounds for cautious optimism for Nigeria's medium-term prospects. However, the recovery is likely to be slower in manufacturing than in most other economic sectors. This is essentially because of the excessive dependence of the manufacturing sector on imports and on government subsidies and protection. The redressing of fundamental structural imbalances is a precondition for restoring self-sustaining growth within Nigerian manufacturing.

Of greatest importance perhaps is the need to increase the integration of the manufacturing sector within the domestic economy. At present 60 per cent of the raw materials consumed by the manufacturing sector are imported. Many enterprises employ relatively capital-intensive technologies. Increasing domestic raw material usage and increasing the ability to absorb labour - unemployment within the formal sector is currently estimated at over 3 million by unofficial sources and is reputed to have doubled during 1982-84 - could be regarded as the two most important objectives of industrial policy in the medium run.

Equally important is the need to increase efficiency levels within the manufacturing sector. The widespread discrepancies of the system of taxation, subsidies, import licensing and investment allocation and sanctioning could be reduced. Protection could be accorded to genuine infant industries, particularly those capable of increasing the forward linkages of the manufacturing to the agricultural sector (such as producers of fertilizers and agricultural machine tools) and those which can contribute towards a reduction of import needs (such as forge shops, foundries and engineering workshops). An improvement in accountancy practices and a closer and more rational system of company investigation are required to ensure that government subsidies have an optimum effect.

Technical assistance provided by UNIDO amounted to US $833,000 in 1984. UNIDO is currently involved in projects related to managerial services, textile testing and quality control, transfer of technology and industrial research.[1/] Further technical assistance is required for restructuring production units in branches such as agro-industries, engineering and textiles. Assistance is also needed for a regularization of accountancy

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1/ A list of ongoing UNIDO projects is provided in appendix C.

procedures and practices and for the development of management skills. There is also a need to provide assistance for improving the operational efficency of the parastatal sector and for the development of an institutional framework for the provision of public sector support for private, industrial enterprises. Such support is particularly important for the penetration of regional and subregional markets by Nigerian manufactured exports. A careful monitoring of these markets and an increased awareness of actual export potential can bring rich rewards in the future.

Appendix A: STATISTICAL TABLES

Table A.1. Gross output and value added in manufacturing, 1973 and 1980

(at current prices)

(currency = Naira)

NIGERIA

Description (ISIC)	Gross output (thousands)		Gross output Share in total (percentage)		Value added (thousands)	
	1973	1980	1973	1980	1973	1980
TOTAL MANUFACTURING(300)	1242200a/	6943400a/	100.0a/	100.0a/	579640a/	3530400a/
Food products(311)	235000	943700	18.9	13.6	85250	315700
Beverages(313)	145400	729800	11.7	10.5	115230	542400
Tobacco(314)	57900	248500	4.7	3.6	45600	195500
Textiles(321)	205700	707600	16.6	10.2	78060	334900
Wearing apparel,except footwear(322)	2400	6800	0.2	0.1	800	2700
Leather products(323)	11400	29500	0.9	0.4	3050	11400
Footwear,except rubber or plastic(324)	20200	48900	1.6	0.7	8230	23300
Wood products,except furniture(331)	22100	63200	1.8	0.9	11650	40100
Furniture,except metal(332)	7200	114000	0.6	1.6	3040	47900
Paper and products(341)	33300	151100	2.7	2.2	13000	51500
Printing and publishing(342)	35300	142900	2.8	2.1	18770	88200
Industrial chemicals(351)	4200	32200	0.3	0.5	2200	18900
Other chemicals(352)	110300	794300	8.9	11.4	52560	398200
Petroleum refineries(353)	...	...	...	...	...	...
Misc. petroleum and coal products(354)	60500	399300	4.9	5.8	36740	158900
Rubber products(355)	39800	95900	3.2	1.4	20330	43300
Plastic products(356)	25100	121100	2.0	1.7	4680	49100
Pottery,china,earthenware(361)	700	900	0.1	0.0	300	700
Glass and products(362)	4000	57200	0.3	0.8	1620	32800
Other non-metallic mineral prod.(369)	46500	161400	3.7	2.3	28740	97700
Iron and steel(371)	0	16500	0.0	0.2	0	15700
Non-ferrous metals(372)	18490	91410	1.5	1.3	1000	45970
Fabricated metal products(381)	124810	504090	10.0	7.3	39210	193330
Machinery,except electrical(382)	1400	80200	0.1	1.2	330	33500
Machinery electric(383)	20700	167600	1.7	2.4	4530	61900
Transport equipment(384)	7600	1219400	0.6	17.6	3780	717500
Professional & scientific equipm.(385)	0	0	0.0	0.0	0	0
Other manufactured products(390)	2200	15900	0.2	0.2	940	9300

Source: Statistics and Survey Unit, UNIDO. Based on data supplied by the UN Statistical Office, with estimates by the UNIDO Secretariat.

Table A.2. Manufacturing value added by industry group, 1968, 1972 and 1976

Industry group	N thousands 1968	1972	1976	Percentage shares 1968	1972	1976
Food products	15,486	38,620	159,347	14.9	7.8	9.8
Beverages	15,772	118,187 a/	215,637 a/	15.2	23.9	13.3
Vegetable oil milling	7,184	13,084	51,540	6.9	2.6	3.2
Textiles b/	18,823	76,276	200,931	18.1	15.4	12.4
Garments	47	7,205	3,228	-	1.5	0.2
Tanneries, leather	643	2,264	3,286	0.6	0.5	0.2
Footwear	597	1,495	15,739	0.6	0.3	1.0
Lumber processing, other wood products	1,730	11,168	36,974	1.6	2.3	2.3
furniture and fixtures (wooden)	713	4,737	48,995	0.7	1.0	3.0
paper and board, printing	3,806	22,315	109,472	3.7	4.5	6.7
glass products and pottery	67	1,287	9,664	0.1	0.3	0.6
drugs and medicine	695	3,849	22,001	0.7	0.8	2.0
paints	652	5,376	7,399	0.6	1.1	0.5
soap, perfumes	5,618	26,754	120,079	5.4	5.4	7.4
bricks and tiles	131	403	8,627	0.1	0.1	0.5
cement	3,306	12,736	39,914	3.2	2.6	2.5
Concrete products	791	7,723	28,576	0.7	1.6	1.7
Basic industrial chemicals	639	2,141	14,731	0.6	0.4	0.9
Other chemical products	1,052	4,450	13,843	1.0	0.9	0.9
Petroleum products	2,441	46,424	193,342	2.4	9.4	11.9
Tyres, tubes, other rubber products	4,222	17,157	44,495	4.1	3.5	2.7
Basic metals and metal products	7,805	54,901	119,597	7.5	11.1	7.4
Industrial machinery	157	888	2,267	0.2	0.2	0.1
Electrical equipment, electronics	636	5,557	32,779	0.6	1.1	2.0
Transport equipment, repairs	2,435	35	70,280	2.3	-	4.3
Plastic products	1,144	6,630	33,839	1.1	1.3	2.1
Others c/	7,248	2,893	6,109	7.0	0.6	0.4
TOTAL	103,836	494,555	1,624,654	100.0	100.0	100.0

Source: Federal Office of Statistics; Industrial Surveys, 1968, 1972 and 1976.

a/ Including tobacco.
b/ Including made-up textile goods, knitting mills, carpets and rugs.
c/ Including travel goods.

Table A.3. Industrial indicators for selected Nigerian manufacturing establishments,[a/] 1973-1977

	Number of Establishments (1)	Number Employed (2)	Wages & Salaries (N'000) (3)	Gross Output (N'000) (4)	Industrial Costs (N'000) (5)	Value Added (N'000) (6)	Net Capital Expenditure (N'000) (7)	Non-industrial Costs (N'000) (8)	Value Added Content of Output (%) (9)=(6)÷(4)	Wage Content of Value Added (%) (10)=(3)÷(6)	Value Added per Worker (N'000) (11)=(6)÷(2)	Investment Output Ratio (%) (12)=(7)÷(5)	Average Wages & Salaries (N'000) (13)=(3)÷(2)
Vegetable Oil Milling													
1973	46	6270	2733	61511	46194	15317	1879	9103	25	18	2443	12	436
1974	35	7285	2243	49748	28992	20756	-138	4119	42	11	2849	*	308
1975	46	25826	9621	47460	29070	18570	17532	5449	39	52	719	96	373
1976	43	16878	8838	65401	45548	19853	9261	2931	30	45	1176	47	524
1977	47	23817	10367	85109	61517	23591	6263	3106	28	44	991	27	436
Rate of Change (73-77)	0.4	30.5	30.5	6.7	5.9	9.1	27.1	-19.4	2.3	19.6	-16.5	17.6	0.0
Textiles (Spinning & Weaving)													
1973	73	39364	22196	159150	96825	62297	16327	32868	39	36	1583	26	564
1974	70	39829	27955	209803	119593	90210	7045	33645	43	31	2265	8	702
1975[2]	68	50241	54072	378063	211329	166734	64434	42138	44	32	3319	39	1076
1976	41	55009	65263	421207	285417	135790	64008	19443	32	48	2469	47	1186
1977	57	64961	85426	511959	285158	226441	71791	55109	44	38	3486	32	1321
Rate of Change (73-77)	-4.9	10.6	30.5	26.5	24.1	29.5	34.2	10.9	2.4	1.1	17.1	4.2	18.6
Made-up Textile Goods													
1973	15	3007	1614	11593	8050	3544	1818	2567	31	46	1179	51	537
1974	14	4425	3267	28017	18678	9339	3412	3775	33	35	2111	36	738
1975	18	4641	3904	26148	14388	11760	3294	4897	45	33	2534	28	841
1976	15	3926	3761	26997	14545	12452	3807	3457	46	30	3172	31	958
1977	17	7006	6662	43683	22106	21577	19194	7386	49	31	3080	89	951
Rate of Change (73-77)	2.5	18.4	32.5	30.5	22.5	43.5	61.0	23.1	9.6	-7.6	21.5	11.8	12.1
Leather Footwear													
1973	18	3981	3645	20208	11978	8230	1683	2502	41	44	2067	8	916
1974	19	4119	4203	23474	10906	12568	620	3555	54	33	3051	5	1020
1975	20	4208	5202	44459	14726	29733	1691	20508	67	17	7066	6	1236
1976	18	4528	6891	30772	15047	15725	2008	7345	51	44	3473	13	1522
1977	17	4249	7172	31545	15317	16229	1898	10215	51	44	3819	12	1688
Rate of Change (73-77)	-1.1	1.3	14.5	9.4	5.0	14.6	2.4	32.1	4.4	0.0	13.0	8.5	13.0
Saw Milling													
1973	116	5424	5420	22136	10455	11680	2995	2289	53	46	2153	26	999
1974	108	9612	6346	24432	11727	12705	1085	6498	52	50	1322	9	660
1975	139	12114	9711	39124	17027	22097	16311	4190	56	44	1824	74	802
1976	185	16875	17238	45232	30971	14259	20465	138792	32	121	845	144	1022
1977	166	19945	19045	75796	35685	40111	20354	7748	53	47	2011	51	905
Rate of Change (73-77)	7.5	29.3	28.8	28.0	27.9	28.0	46.5	27.5	0.0	0.4	-1.4	14.4	2.0

Table A.3. Industrial indicators for selected Nigerian manufacturing establishments,[a/] 1973-1977 (continued)

	Number of Establishments	Number Employed	Wages & Salaries (N'000)	Gross Output (N'000)	Industrial Costs (N'000)	Value Added (N'000)	Net Capital Expenditure (N'000)	Non-Industrial Costs (N'000)	Value Added Content of Output (%)	Wage Content of Value Added (%)	Value Added per worker (N'000)	Investment Output Ratio (%)	Average Wages & (N'000)
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)=(6)÷(4)	(10)=(3)÷(6)	(11)=(6)÷(2)	(12)=(7)÷(5)	(13)=(3)÷(2)
Other Wood & Cork Products													
1973	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
1974	3	50	26	149	6	143	46	2	96	18	2860	32	520
1975	11	1616	1671	25822	17085	8737	2225	1680	34	19	5407	25	1034
1976	5	456	492	4513	2346	2167	1171	709	48	23	4752	54	1079
1977	5	474	538	3688	1803	1885	1105	565	51	29	3977	59	1135
Rate of Change (74-77)	13.6	75.2	135.0	150.0	**	90.0	168.0	**	17.1	12.7	8.6	16.5	21.5
Wooden Fixtures & Furniture													
1973	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
1974	84	5066	2846	13824	7875	5948	507	1826	43	48	1174	9	562
1975	126	7787	5603	27318	14076	13243	5836	2343	48	42	1701	44	720
1976	117	7831	5212	49120	27187	21933	13488	3337	45	24	2801	61	666
1977	121	8307	8007	56301	29873	24426	14594	6115	43	33	2940	60	964
Rate of Change (74-77)	9.6	13.1	29.5	42.0	41.9	42.8	188.0	35.1	0.0	-8.9	25.9	61.0	14.5
Containers & Paper Board													
1973	10	1763	1825	15816	10007	5809	231	1754	37	31	3295	4	1039
1974	11	1852	2554	25748	16076	9658	475	2190	38	26	5215	5	1379
1975	14	2121	3601	32671	19274	13397	1970	2956	41	27	6316	15	1698
1976	24	3523	4628	48900	29131	19769	3025	3807	40	23	5611	15	1314
1977	14	2941	6044	59089	35697	23392	4352	7377	40	26	7954	19	2055
Rate of Change (73-77)	7.0	11.1	27.0	32.0	28.9	32.0	80.0	33.0	1.6	-3.5	19.3	36.5	14.7
Paper Products													
1973	8	1605	1459	17525	10337	7188	909	1826	41	20	4479	13	909
1974	8	1947	2200	27548	18342	4207	555	3839	33	24	4729	6	1130
1975	11	2993	5218	49512	33128	16384	3310	5576	33	32	5462	20	1743
1976	10	3110	4318	51121	31422	19699	13008	386	39	222	6334	66	1388
1977	12	3412	5574	68498	41561	26935	14631	10160	39	21	7894	54	1634
Rate of Change (73-77)	8.5	16.3	31.0	32.0	32.0	30.5	74.0	41.0	-1.0	1.0	12.0	33.0	12.4
Printing & Publishing													
1973	68	8298	9308	35293	16523	18771	3496	4002	53	50	2262	19	1122
1974	76	9147	11373	46283	21148	21535	5363	5071	50	53	2354	25	1243
1975	98	12396	13814	69207	27632	41574	83981	5619	60	33	3354	202	1120
1976	97	12455	27659	101077	37115	63962	91677	1916	63	43	5135	143	2221
1977	99	13387	22055	114321	43150	71171	97754	5743	62	31	5316	137	1647
Rate of Change (73-77)	7.8	10.0	18.8	26.5	21.5	30.5	94.0	7.5	3.1	-9.1	18.8	48.5	8.0
Types & Tubes													
1973	9	2274	2883	24522	11376	13146	1166	5876	54	22	5781	9	1268
1974	9	2646	3776	33516	12794	20721	147	3562	62	18	7831	*	1427
1975	7	1772	3101	26780	9653	17127	265	1567	64	18	9665	2	1750
1976	9	2467	5839	41702	18649	23053	3831	2481	55	25	9345	17	2367
1977	9	2517	4678	46479	9769	36709	2314	5584	79	13	14584	6	1859
Rate of Change (73-77)	0.0	2.0	10.2	13.6	-3.0	22.9	14.7	-1.0	7.9	-10.0	20.5	-7.8	8.0

Table A.3. Industrial indicators for selected Nigerian manufacturing establishments,[a] 1973-1977 (continued)

	Number of Establishments (1)	Number Employed (2)	Wages & Salaries (N'000) (3)	Gross Output[b] (N'000) (4)	Industrial Costs[c] (N'000) (5)	Value Added[d] (N'000) (6)	Net Capital Expenditure[e] (N'000) (7)	Non-Industrial Costs[f] (N'000) (8)	Value Added Content of Output (%) (9)=(6)÷(4)	Wage Content & Value Added (%) (10)=(3)÷(6)	Average Productivity of Labor (N) (11)=(6)÷(2)	Investment Output Ratio (%) (12)=(7)÷(6)	Average Wages & Salaries (N'000) (13)=(3)÷(2)
Cement													
1973	5	2861	2989	30744	9636	21107	19021	15671	69	14	7377	90	1045
1974	5	2796	3913	40174	11867	28307	10478	5007	70	14	10124	37	1400
1975	5	2158	2380	14017	5384	8634	14033	1554	62	28	4001	163	1103
1976	5	3621	6043	54373	14460	39913	44251	2475	73	15	11023	111	1669
1977	8	5482	7090	58681	16381	42100	41343	4516	72	17	7680	98	1293
Rate of Change (73-77)	9.9	13.9	18.9	13.7	11.2	14.8	16.8	-21.9	0.9	4.0	0.8	1.7	4.3
Concrete Products													
1973	22	2877	1717	12008	6184	5825	1281	1495	49	29	2025	22	597
1974	28	3452	2652	19986	8661	11325	-39	3474	58	21	3339	*	710
1975[g]	44	5856	5588	41536	18977	22559	5683	5927	54	25	3852	25	954
1976	54	5966	5625	50215	22596	27619	12816	3517	55	20	4665	46	946
1977	67	7301	9565	68070	33379	34691	6859	4081	51	28	4752	20	1310
Rate of Change (73-77)	25.0	20.5	27.2	41.5	40.0	42.8	39.9	22.5	0.8	-0.7	18.6	-2.0	17.0
Iron, Steel & Non-Ferrous Metals													
1973	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
1974	18	2462	2185	56682	38125	18556	844	2657	33	12	7537	5	778
1975	6	720	822	29007	4714	24293	956	959	84	3	33740	4	1142
1976	10	2289	3139	57940	24779	33161	1352	3351	57	9	14487	4	1371
1977	11	2804	3004	64591	30063	37028	72	2999	57	8	13205	*	1071
Rate of Change (73-77)	-11.6	3.3	8.3	3.3	-5.7	18.9	-45.9	3.1	14.6	-9.7	15.1	-	8.3
Motor Vehicle Assembly													
1973	-	-	-	-	-	-	-	-	-	-	-	-	-
1974	12	1966	1530	47472	27172	20300	224	1953	43	8	10326	1	778
1975	11	3603	3759	188506	136303	52203	4895	3627	28	7	14489	9	1043
1976	16	10019	10376	375150	303870	71820	5732	53048	19	14	7168	8	1036
1977	17	8914	18458	533662	463199	65473	19010	51623	12	28	7345	29	2071
Rate of Change (73-77)	9.1	46.0	87.0	84.0	101.0	34.0	**	1m.0	-27.5	37.0	-8.2	190.0	28.5
Other Manufacturings													
1973	618	842H8	61977	823930	417015	407443	63272	210611	49	15	4834	16	735
1974	545	80611	70931	875609	446140	429471	40537	153953	49	17	5328	9	880
1975	666	106191	122408	1571461	852991	718289	137922	221652	46	17	6764	19	1153
1976	627	122752	177521	2391092	1161217	1229335	156514	148156	51	14	10015	13	1446
1977	751	148923	226331	2560819	1371611	1194689	360379	379868	47	19	8022	30	1520
Rate of Change (73-77)	4.0	12.0	29.5	25.5	26.2	24.0	41.0	12.5	-0.9	4.8	10.6	13.4	15.6
Total													
1973	1008	162012	117766	1234936	654580	580357	113078	290364	47	20	3582	19	727
1974	1045	175299	147800	1518851	787902	820949	71161	235126	47	21	4113	10	843
1975	1290	244243	250545	2611091	1425757	1185334	364338	333644	45	21	4853	5	1026
1976	1376	271685	352843	3814810	2064300	1750510	446414	397151	46	20	6443	26	1299
1977	1418	329440	460016	4382091	2498269	1886448	681913	562195	43	23	5814	36	1356
Rate of Change (73-77)	7.1	14.9	30.1	28.5	30.9	26.5	43.5	14.1	-1.8	2.8	10.2	13.6	13.3

* Negligible.
** More than 500 percent.

a/ Data refer to manufacturing establishments employing ten or more persons.

b/ Gross output is the value of sales products, plus receipts for resale of goods sold in the same condition as when bought, value of contract work, receipt for maintenance and repairs, value of assets produced for own use or minus the value of inventory changes in finish goods and work in progress.

c/ Industrial costs consist of costs of materials, fuel, electricity, goods sold in the same condition as when bought, contract work done by others on own materials and repairs and maintenance work done by others.

d/ Value-added means census value added and it is the difference between gross output and industrial costs.

e/ Net capital expenditure is the cost of new and used capital equipments purchased by establishments during the year under survey plus the value of assets produced by own employees, less proceeds from the sale of any capital assets already held by the establishment.

f/ Non-industrial costs are the incidental expenses which are not part of costs of the raw materials, e.g. administrative expenses.

Source: Federal Office of Statistics, quoted from World Bank, Nigeria Non-oil Export Prospects, June 30, 1982.

Table A.4. Industries receiving negative net effective rate of protection, 1979/80 a/

(Percentage)

Industry	Nominal rate of protection	Net effective rate of protection
Meat and poultry products		
- Meat products b/	10	-20.6
Dairy products		
- Tinned milk	20	-25.0
- Assorted dairy products (mainly yoghurt and flavoured drinks)	15	-16.5
Vegetable and oil milling		
- Groundnut oil	14.5	-23.5
- Cottonseed oil	9.7	-1.0
- Palm oil	0	-33.3
Sugar cubing b/	34	-40.0
Cocoa butter and cake	2	-52.7
Beer and stout c/	25 - 40	-6.1 - 15.6
Soft drinks b/	20 - 35	-18.9 - 3.4
Spinning, weaving and finished textiles		
- Sewing thread b/	10 - 20	-26.8 - 16.3
- Yarn from synthetic fiber	10 - 20	-20.1 - 6.7
- Gray baft c/	20 - 40	-2.1 - 4.0
Leather belts	35	-2.8
Lumber	0	-30.1
Toilet and tissue paper b/	25	-46.6
Industrial cases	10 - 20	-32.4 - 18.4
Fertilizers	0 - 10	-62.4 - 26.2
Paints b/	25 - 33 1/3	-3.4 - 36.0
Drugs and medicines	8	-36.1
Vaseline products	20	-8.8
Blended lubricating oils and	2.1	-26.3
Tires and tubes	20 - 30	-15.9 - 13.0
Other rubber products		
- Natural rubber, fully integrated	0	-25.4
- Natural rubber, non-integrated	0	-53.7
Bricks and tiles		
- Terra 220 tiles	12	-26.1
- Structural clay products	20 - 33 1/3	-8.4 - 4.3
Cement	9	-31.1
Concrete-asbestos roofing		
Sheets and pipes b/	18 - 25	-3.3 - 8.3
Iron rods	20	-12.7
Aluminum sheets, coils, and circles	5 - 10	-23.0 - 8.2
Matchets	8	-31.7
Trailers, tippers, and tanks b/	15 - 20	-14.1 - 3.2
Presses and crushes	0	-38.6
Tape saws, block molding, machines, etc.	5	-22.7
Insulated electric cable b/	10 - 30	-28.1 - 10.1
Tugs, barges and small boats	5	-24.6
Ball point pens	30	-2.3

Source: James W. Robertson, The Structure of Industrial Incentives in Nigeria, 1979-80, World Bank, 15 September 1981.

a/ Assuming 35 per cent overvaluation of the naira.

b/ Requires import license.

c/ Under import ban.

Table A.5. Industries receiving negative net effective protection, 1977

(Percentage)

Industry	Nominal rate of protection	Net effective rate of protection[a/]	Net effective rate of protection[b/]
A. Nominal Rate of protection < 35%			
1) Meat products	0	-22	-31
2) Dairy products	4	-25	37
3) Groundnut oil and cake	-2	-174	-79
4) Cottonseed oil and cake	18	-1	-11
5) Palm oil milling [c/] (doubtful)	0 [c/]	-25 [c/]	-35
6) Sugar factories and refineries	8	-13	-23
7) Ovaltine substitutes, etc.	23	-1	-19
8) Tea and coffee	16	-10	-23
9) Prepared animal feeds	10	-29	-80
10) Soft drinks and carbonated waters	22	-4	-13
11) Cotton yarn	5	-20	-35
12) Grey baft (possibly)	10 - 30	-16 - +13	-20 (average)
13) Finished textile fabrics (possibly)	14 - 40	-22.3 - +130	
14) Wooden fixtures and furniture (possibly)	35 - 55	-12 - +10	-38 (average)
15) Drugs and medicine	8	-15	-34
16) Cement	0	-30	-41
17) Cotton wool and gauze	17	-5	-55
18) Matches	8	-16	-33
19) Natural rubber	0	-25	-35
20) Tin smelting	0	-23	-32
21) Agricultural machinery and equipment	0	-25	-35
22) Industrial machinery and equipment	11	-22	-31
B. Nominal rate of protection < 50% (not listed in A.)			
1) Flour	10	10	-15
2) Bakery products	40	26	-38
3) Beer breweries	27	6	-10
4) Knitting fishing nets	35	25	-9
5) Wearing apparel except footwear	44	8	-9
6) Tanneries and leather finishing	8	8	-6
7) Sawmills, planning and other wood	26 - 33	13 - 28	-2
8) Fertilizers	21	6	-5
9) Disinfectants, insecticides and fungicides	12	1	-14
10) Tire and tube industries	22	2	-13
11) Bricks and tiles	17	4	-11
12) Concrete products: asbestos roofing	18	2	-12
13) Cast iron products	45	20	-1
14) Aluminium sheets, coils and circles	10	0	-1
15) Metal furniture and fixtures without "approved user status"	30	18	-2
16) Structural metal products			
- Iron rods	21	8	-7
- Trailers and tankers	18	15	-9
- Windows and doors	20	11	-6
17) Motorcycles	15	16	-4

Source: J. Bertrand and M. Robertson, An Analysis of Industrial Incentives and Location in Nigeria, World Bank, 1978.

a/ Assuming 35 per cent overvaluation of the naira.

b/ Assuming 50 per cent overvaluation of the naira.

c/ According to Bertrand and Robertson, however, the oil-palm subsector report suggests a positive and large net effective protection for oil-palm milling in recent years.

Table A.6. Industries receiving positive net effective rate of protection, 1977 a/

(Percentage)

Industry	Nominal rate of protection	Net effective rate of protection b/	Net effective rate of protection c/
A. Nominal rate of protection: 30 per cent			
1) Grain mill products	10	10	-15
2) Beer and stout d/	27	6	-10
3) Grey baft	10 - 30	-16 - 13	-20 (average)
4) Yarn from synthetic fiber	22 - 45	- 53 - 800	102 (average)
5) Waste cotton blankets	23	15	0
6) Tanneries and leather finishing d/	8	8	-6
7) Sawmills and other wood mills	26 - 33	13 - 28	
8) Fertilizers	21	6	-5
9) Pesticides	12	1	-14
10) Paints, etc.	28	19	1
11) Tire and tube industries	22	2.2	-13
12) Plastic shoes	15	269	192
13) Plastic sheeting and imitation leather	23	189	119
14) Mirrors	28	75	50
15) Bricks and tiles	17	4	-11
16) Concrete products d/	18	2	-12
17) Metal containers	25	17	
18) Metal furniture and fixtures			
- with approved user status	30	69	42
- without approved user status	30	18	-2
19) Iron rods	21	8	-7
20) Trailers and tankers	18	15	-0
21) Windows and doors	20	11	-6
22) Enamelwar	19	32	6
23) Galvanized iron sheets d/	16	39	14
24) Electrical cables	20	60	20
25) Shipbuilding and rep iring - small boats	28	18	5
26) Motor vehicles			
- engine capacity 1800 ccs	25	44	19
27) Motorcycles	15	16	-4
28) Ink	20	109	20
B. 30 Nominal rate of protection: 50 per cent			
1) Bakery products d/	40	26	-38
2) Chocolate confectionary d/	40	79	62
3) Cigarettes	45	18	2
4) Finished textile fabrics	14 - 40	-22.3 - 130	-43 (average
5) Yarn from synthetic fiber	22 - 45	53 - 800	102 (average)
6) Tarpauline	34	137	60
7) Fishing nets	35	25	-9
8) Knitted fabrics d/	35	158	106
9) Wearing apparel except footwear	44	8	-9
10) Leather products and substitutes	35 - 45	21 - 74 23 (average)	
11) Sawmills and other woodmills	26 - 33	13 - 28 -2 (average)	
12) Containers, boxes of paper and paperboard	45	35	9
13) Pulp, paper and paperboard	40	33	9
14) Electrodes	35	127	68
15) Soap, detergents, perfumes, and cosmetics d/	43	39	15
16) Glass containers	42	31	8
17) Cast iron product d/	45	20	-1
18) Metal containers	40	46	25
19) Television, radio, communication equipment	45	47	23
20) Electrical equipment and housewares	35	290	199
21) Motor vehicles			
- engine capacity 1800-2000 ccs	40	50	27
22) Ballpoint pens	35	16	0
C. Nominal rate of protection: 50 per cent			
1) Spirits	58	40	13
2) Cordage	62	...	...
3) Leather footwear	51	83	54
4) Wooden furniture and fixtures d/	35 - 55	-12 - 10 38 (average)	
5) Foam cushions and mattresses	55	54	25
6) Ceramic tableware	66	56	28

Source: J. Bertrand and M. Robertson, "An Analysis of Industrial Incentives and Location in Nigeria", World Bank, 1978.

a/ Assuming 35 per cent currency overvaluation.

b/ Assuming 35 per cent exchange-rate overvaluation.

c/ Assuming 50 per cent exchange-rate overvaluation.

d/ Industries with excess profits (in 1977) thought sufficient to permit absorption of losses from a removal of all market distortions.

Table A 7. The composition and value of trade in manufactures, 1978 and 1979

NIGERIA

Description of traded goods (SITC)	Imports (Percentage of total trade)		Exports (Percentage of total trade)		Trade balance (Exports less imports in 1000 current US $)	
	1978	1979	1978	1979	1978	1979
OILS AND FATS						
Animal oils and fats(411)	0.2	0.3	...	...	...	...
Fixed vegetable oils and fats(421/2)	0.8	1.3	0.2	0.2	-82233.3	-102178.2
Processed animal and vegetable oils and fats(431)	0.0	0.0	0.0	...	-4902.3	...
CHEMICALS						
Organic chemicals(512)	0.6	0.8	0.0	0.0	76981.1	-81105.5
Inorganic chem., oxides and halogen salts(513/4)	0.7	1.2	0.0	0.0	-93255.3	-122532.8
Dyeing, tanning and colouring materials(531)	0.4	0.7	...	0.0	...	-68201.6
Medicinal and pharmaceutical products(541)	2.0	2.2	0.0	0.0	-253376.5	-220447.3
Plastics, cellulose and artificial resins(581)	1.2	2.0	0.0	...	-157944.5	...
FERTILIZERS						
Nitrogenous fertilizers & related materials(5611)	0.0	0.1	...	...	...	...
Phosphatic fertilizers and related materials(5612)	0.0	0.0	...	...	...	...
Potassic fertilizers and related materials(5613)	0.0	0.0	...	...	...	...
PETROLEUM						
Petroleum, crude or partly refined(331)	0.0	0.3	90.0	94.8	8960388.9	15490400.8
Petroleum products(332)	1.9	2.0	0.3	0.3	-214365.5	-160084.3
RUBBER						
Crude rubber, synthetic and reclaimed(231)	0.0	0.1	0.2	0.2	15618.5	25369.0
Rubber materials, e.g.sheets, threads, piping(621)	0.7	0.9	0.0	0.0	-88577.5	-87862.4
Articles of rubber, e.g. tyres, tubes(629)	1.3	1.0	0.0	0.0	-168133.5	-101835.1
WOOD AND FURNITURE						
Wood, shaped or simply worked(243)	0.0	0.0	0.0	0.0	-208.5	-110.7
Pulp paper, including waste(251)	0.0	0.1	...	...	...	...
Veneers, plywood, improved wood(631)	0.3	0.3	0.0	0.0	-34446.5	-28519.7
Wood manufactures(632)	0.1	0.1	0.0	0.0	-10181.8	-7562.6
Paper and paperboard(641)	1.4	1.4	0.0	0.0	-178422.4	-142781.5
Articles of pulp, paper or paperboard(642)	0.5	0.4	0.0	0.0	-59505.2	-39511.1
Furniture(821)	0.2	0.1	0.0	0.0	-19652.9	-10067.0
TEXTILES AND CLOTHING						
Wool and other animal hair(262)	0.0	0.0	...	...	...	...
Cotton(263)	0.0	0.0	0.1	0.2	5175.5	33206.0
Jute(264)	0.1	0.0	...	0.0	...	-2862.1
Vegetable fibres, flax and hemp(265)	0.0	0.0	...	0.0	...	-1674.4
Synthetic and regenerated fibres(266)	0.0	0.1	...	...	...	...
Textile yarn and thread(651)	2.1	2.6	0.0	...	-272075.7	...
Woven cotton fabrics(652)	0.1	0.1	0.0	...	-9061.0	...
Woven textile fabrics(653)	0.1	0.1	...	...	...	...
Made-up articles chiefly of textiles(656)	0.2	0.3	0.0	0.0	-31570.4	-27381.6
Travel bags, handbags, etc.(831)	0.0	0.0	0.0	0.0	-4058.7	-330.4
Clothing, excluding leather(841 less 8413)	1.2	0.6	0.0	0.0	-152475.3	-56606.0
Calf leather(6113)	...	...	...	0.0	...	...
LEATHER AND PRODUCTS						
Other leather, including artificial(611 less 6113)	0.0	0.0	0.1	0.2	10184.2	24155.1
Leather manufactures(612)	0.5	0.4	...	0.0	...	-39658.2
Apparel and accessories of leather(8413)	0.0	0.0	...	...	...	...
Footwear(85)	0.2	0.0	...	...	...	...
BUILDING MATERIALS AND GLASS						
Lime, cement, fabricated building materials(661)	2.7	2.9	0.0	0.0	-344171.7	-295371.6
Construction and refractory materials of clay(662)	0.3	0.2	...	...	...	...
Glass(664)	0.4	0.4	0.0	0.0	-47128.1	-44820.5
Glassware and pottery(665 6)	0.7	0.7	0.0	0.0	-90223.8	-67237.1

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Table A.7 The composition and value of trade in manufacturing, 1978 and 1979 (continued)

NIGERIA

Description of traded goods (SITC)	Imports (Percentage of total trade)		Exports (Percentage of total trade)		Trade balance (Exports less imports in 1000 current US $)	
	1978	1979	1978	1979	1978	1979
IRON AND STEEL						
Iron ore and concentrates(281)	0.0	0.0	...	...	...	...
Iron and steel scrap(282)	0.0	0.0	...	0.0	...	17.0
Pig iron and sponge(671)	0.0	0.0	...	...	...	...
Ingots and other primary forms(672)	0.2	0.5	0.0	...	-26042.6	...
Bars, rods, shapes, sections(673)	1.4	1.5	...	...	...	...
Universals, plates and sheets(674)	1.9	2.1	...	0.0	...	-217571.6
Hoop and strip(675)	0.2	0.1	...	...	...	...
Iron and steel wire(677)	0.2	0.2	...	...	...	...
Tubes, pipes and fittings(678)	1.6	1.2	0.0	0.0	-205041.0	-125505.1
Unworked castings and forgings(679)	0.0	0.0	...	...	...	...
NON-FERROUS METALS						
Non-ferrous ore and concentrates(283)	0.0	0.0	0.0	0.1	3422.8	13226.1
Copper, blister, refined, alloys(6821)	0.0	0.0	...	...	...	...
Copper bars, shapes, sections, wire, etc.(6822)	0.1	0.2	...	0.0	...	-17837.0
Aluminium, unwrought or worked(684)	0.5	0.6	...	0.0	...	-62743.9
Lead, unwrought or worked(685)	0.0	0.0	0.0	...	-1331.0	...
Zinc, unwrought or worked(686)	0.1	0.1	0.0	...	-12178.3	...
Tin and alloys, unwrought or worked(687)	0.0	0.0	0.3	0.1	27819.4	14921.5
Wire products, e.g. cables, ropes(693)	0.3	0.3	0.0	0.0	-38336.8	-35840.4
SELECTED CAPITAL GOODS						
Hand tools used in agriculture(6951)	0.1	0.1	0.0	...	-11605.4	...
Tools for use in hand or machine(6952)	0.6	0.5	0.0	0.0	-78992.6	-55671.8
Power generating machinery, non-electric(711)	1.5	1.3	...	0.0	...	-136325.1
Agricultural machinery(7121/2)	0.2	0.1	0.0	0.0	-21237.3	-14750.0
Dairy equipment(7123)	0.0	0.2	...	...	...	...
Tractors(7125)	0.6	0.4	...	...	...	...
Office machines(714)	0.3	0.3	...	0.0	...	-25990.9
Metal working machinery (715)	0.3	0.2	...	...	...	...
Textile and leather machinery(717)	1.3	1.4	...	...	...	...
Machines for paper, pulp and paper articles(7181)	0.1	0.4	...	...	...	...
Industrial food-processing machinery(7183)	0.4	0.4	...	...	...	...
Machine tools for working minerals,wood,etc.(7195)	0.4	0.4	...	...	...	...
Electrical power machinery and switchgear(722)	4.3	3.1	0.0	0.0	-545931.4	-317864.3
MAJOR CONSUMER DURABLES						
Commercial road vehicles(732 less 7321)	9.3	10.6	0.0	0.0	-1183447.4	-1085412.6
Passenger motor cars(7321)	2.8	2.4	0.0	0.0	-353279.1	-243419.5
Television and radio sets(7241/2)	0.7	0.4	0.0	0.0	-94729.9	-43930.0
Domestic electrical equipment(725)	0.8	0.6	...	0.0	...	-61233.6
TOTAL OF ABOVE, IN MILLIONS OF US $	6559	5459	9078	15717	2519	10259
TOTAL TRADE (SITC 0 TO 9), IN MILLIONS OF US $	12763	10274	9959	16361	-2804	6086

Source: Statistics and Survey Unit, UNIDO.Based on data supplied by the UN Statistical Office, with estimates by the UNIDO Secretariat.

Note: Percentages may not add to 100.0 due to the fact that countries report trade to/from "unspecified areas". Selection of products shown in this table was based on the definition of the manufacturing sector used for production statistics (i.e. the ISIC) and the associated raw material supplies. Thus, not all products are regarded as manufactures according to the conventional definitions of manufactured trade (e.g. SITC 5 to 8 less 68).

Table A.8. Origin of manufactured imports by industry, 1979

NIGERIA

Description of traded goods (SITC)	World total (in 1000 current US $)	Developing countries	Developed market economies				Centrally planned economies
			Total	USA	EEC	Japan	
		(Percent of world total)					
OILS AND FATS							
Animal oils and fats(411)	30612.7	0.0	100.0	91.2	7.7	0.0	0.0
Fixed vegetable oils and fats(421/2)	129270.7	7.6	92.4	0.7	84.9	0.0	0.1
Processed animal and vegetable oils and fats(431)	3053.5	0.7	99.0	0.0	97.0	0.0	0.0
CHEMICALS							
Organic chemicals(512)	82316.5	1.4	98.1	6.1	79.1	3.8	0.4
Inorganic chem., oxides and halogen salts(513/4)	122608.9	1.2	97.7	3.1	87.0	2.2	0.6
Dyeing, tanning and colouring materials(531)	68313.6	0.7	99.2	1.6	58.7	5.0	0.0
Medicinal and pharmaceutical products(541)	220984.9	10.2	86.5	2.7	70.7	0.2	3.2
Plastics, cellulose and artificial resins(581)	203456.3	1.9	95.3	2.9	85.0	3.8	1.5
FERTILIZERS							
Nitrogenous fertilizers & related materials(5611)	6173.4	0.0	66.2	0.0	39.5	0.2	31.7
Phosphatic fertilizers and related materials(5612)	3720.9	12.6	87.4	2.7	50.8	0.0	0.0
Potassic fertilizers and related materials(5613)	1159.4	0.0	100.0	0.0	99.5	0.0	0.0
PETROLEUM							
Petroleum, crude or partly refined(331)	26078.4	0.0	92.7	92.6	0.1	0.0	7.3
Petroleum products(332)	202906.4	19.2	80.8	5.1	69.2	0.0	0.0
RUBBER							
Crude rubber, synthetic and reclaimed(231)	6337.6	8.3	91.7	6.0	78.0	7.6	0.0
Rubber materials, e.g.sheets, threads, piping(621)	87862.6	3.6	95.4	67.2	24.7	2.2	0.2
Articles of rubber, e.g. tyres, tubes(629)	101848.5	3.9	93.5	17.5	54.6	3.9	0.5
WOOD AND FURNITURE							
Wood, shaped or simply worked(243)	196.1	0.0	100.0	0.0	100.0	0.0	0.0
Pulp paper, including waste(251)	7215.4	2.5	96.5	2.5	10.2	1.4	1.0
Veneers, plywood, improved wood(631)	28520.7	8.7	54.3	0.8	25.8	4.7	8.9
Wood manufactures(632)	7562.7	2.5	96.1	15.1	57.5	0.3	1.2
Paper and paperboard(641)	143580.9	6.7	92.5	8.1	42.1	0.5	0.7
Articles of pulp, paper or paperboard(642)	39605.3	1.7	96.4	2.1	87.7	2.0	0.0
Furniture(821)	10104.1	0.9	97.5	5.2	87.6	0.5	1.2
TEXTILES AND CLOTHING							
Wool and other animal hair(262)	956.0	2.4	97.6	0.0	88.4	0.1	0.0
Cotton(263)	1117.1	4.3	76.1	0.0	75.6	0.0	0.0
Jute(264)	2882.4	97.7	0.0	0.0	0.0	0.0	0.0
Vegetable fibres, flax and hemp(265)	1685.1	0.0	100.0	20.9	54.8	24.3	0.0
Synthetic and regenerated fibres(266)	6745.2	0.0	100.0	11.9	51.5	19.4	0.0
Textile yarn and thread(651)	264695.3	38.8	48.9	2.9	23.0	14.3	0.4
Woven cotton fabrics(652)	6244.3	17.1	82.9	8.0	56.3	0.6	0.0
Woven textile fabrics(653)	6630.6	11.5	80.9	26.7	44.9	5.2	0.3
Made-up articles chiefly of textiles(656)	27545.2	55.0	20.2	0.7	11.3	7.4	3.2
Travel bags, handbags, etc.(831)	348.8	6.9	53.8	0.9	43.5	2.8	34.8
Clothing, excluding leather(841 less 8413)	57510.6	29.1	57.5	39.6	13.8	2.8	2.8
Calf leather(6113)	...	...	...	...	...	...	...
LEATHER AND PRODUCTS							
Other leather, including artificial(611 less 6113)	3191.9	2.0	98.0	0.0	93.8	0.0	0.0
Leather manufactures(612)	39694.1	19.7	61.0	2.6	53.7	1.6	0.1
Apparel and accessories of leather(8413)	4940.5	28.7	65.2	5.0	43.4	10.0	0.2
Footwear(85)	3258.8	14.1	81.9	18.4	61.2	2.0	3.8
BUILDING MATERIALS AND GLASS							
Lime, cement, fabricated building materials(661)	297812.0	2.7	74.7	1.2	36.1	0.2	22.5
Construction and refractory materials of clay(662)	20604.9	4.8	93.5	8.7	68.0	6.8	1.6
Glass(664)	44820.6	39.7	50.3	15.2	30.8	1.2	9.1
Glassware and pottery(665,6)	67324.2	15.2	76.8	8.7	65.9	1.0	6.1

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Table A.8. Origin of manufactured imports by industry, 1979 (continued)

NIGERIA

Description of traded goods (SITC)	World total (in 1000 current US $)	Developing countries	Developed market economies				Centrally planned economies
			Total	USA	EEC	Japan	
		(Percent of world total)					
IRON AND STEEL							
Iron ore and concentrates(281)	270.6	0.0	100.0	0.0	16.9	0.0	0.0
Iron and steel scrap(282)	8.6	0.0	80.6	0.0	80.6	0.0	0.0
Pig iron and sponge(671)	1086.1	8.8	91.2	0.2	68.0	1.1	0.0
Ingots and other primary forms(672)	53054.6	6.2	83.0	9.1	69.2	3.1	9.9
Bars, rods, shapes, sections(673)	151903.7	15.3	81.5	1.0	62.9	2.2	1.8
Universals, plates and sheets(674)	217773.5	0.7	97.3	0.3	27.5	68.8	1.9
Hoop and strip(675)	14799.9	1.7	98.3	0.1	91.8	4.9	0.0
Iron and steel wire(677)	17586.4	11.0	82.8	0.5	80.4	1.4	5.2
Tubes, pipes and fittings(678)	125642.4	3.0	93.4	21.8	53.7	17.2	0.5
Unworked castings and forgings(679)	2306.5	0.3	99.7	2.1	72.7	3.1	0.0
NON-FERROUS METALS							
Non-ferrous ore and concentrates(283)	656.1	2.3	90.0	0.0	90.0	0.0	0.0
Copper, blister, refined, alloys(6821)	896.8	0.0	100.0	0.0	70.0	0.0	0.0
Copper bars, shapes, sections, wire, etc.(6822)	17837.6	1.5	98.3	3.8	56.1	20.7	0.1
Aluminium, unwrought or worked(684)	62744.2	2.8	96.1	1.9	61.8	1.8	1.0
Lead, unwrought or worked(685)	1626.0	4.1	95.8	5.0	69.7	19.9	0.0
Zinc, unwrought or worked(686)	12167.3	1.6	88.1	1.8	79.7	0.0	0.0
Tin and alloys, unwrought or worked(687)	293.3	0.0	100.0	0.0	100.0	0.0	0.0
Wire products, e.g. cables, ropes(693)	35840.9	15.2	83.0	5.0	70.3	4.3	1.3
SELECTED CAPITAL GOODS							
Hand tools used in agriculture(6951)	14826.7	9.0	77.0	31.9	37.3	6.5	9.2
Tools for use in hand or machine(6952)	55673.1	11.0	84.2	12.1	61.3	5.9	3.6
Power generating machinery, non-electric(711)	136327.9	5.4	93.3	8.4	60.2	18.0	0.4
Agricultural machinery(7121/2)	14750.0	7.2	78.9	12.5	55.4	0.2	27.1
Dairy equipment(7123)	15452.4	1.4	98.5	0.3	97.3	0.3	0.0
Tractors(7125)	41661.4	6.1	91.8	2.8	85.7	2.4	2.1
Office machines(714)	25994.4	3.7	96.1	19.0	64.6	8.7	0.1
Metal working machinery(715)	24040.4	13.4	81.7	3.3	68.8	3.2	1.8
Textile and leather machinery(717)	141177.8	15.9	80.9	2.5	45.7	13.8	0.0
Machines for paper, pulp and paper articles(7181)	44360.8	0.2	99.4	18.8	74.7	0.1	0.2
Industrial food-processing machinery(7183)	38406.3	5.4	93.3	7.3	83.3	0.2	1.1
Machine tools for working minerals,wood,etc.(7195)	44955.9	2.6	93.3	4.0	82.0	2.2	4.4
Electrical power machinery and switchgear(722)	317866.1	3.2	94.5	6.8	69.0	14.8	1.2
MAJOR CONSUMER DURABLES							
Commercial road vehicles(732 less 7321)	1086521.7	3.6	95.0	1.4	65.8	25.7	0.4
Passenger motor cars(7321)	243429.9	15.9	80.0	1.7	39.3	35.6	2.7
Television and radio sets(7241/2)	43930.0	4.5	92.9	20.1	30.5	32.6	0.0
Domestic electrical equipment(725)	61240.3	28.7	59.0	2.8	34.0	18.2	0.4
TOTAL OF ABOVE	5458607	8.9	86.5	6.8	57.1	13.8	2.6
TOTAL OF ALL MERCHANDISE (SITC 0 to 9)	10274326	8.5	85.5	10.7	55.3	10.8	1.9

Source: Statistics and Survey Unit, UNIDO.Based on data supplied by the UN Statistical Office, with estimates by the UNIDO Secretariat.

Note: Percentages may not add to 100.0 due to the fact that countries report trade to/from "unspecified areas". Selection of products shown in this table was based on the definition of the manufacturing sector used for production statistics (i.e. the ISIC) and the associated raw material supplies. Thus, not all products are regarded as manufactures according to the conventional definitions of manufactured trade (e.g. SITC 5 to 8 less 68).

Table A.9. Destination of manufactured exports by industry, 1979

NIGERIA

Description of traded goods (SITC)	World total (in 1000 current US $)	Developing countries	Developed market economies				Centrally planned economies
			Total	USA	EEC	Japan	
		(Percent of world total)					
OILS AND FATS							
Animal oils and fats(411)	...	...	...	...	...	...	...
Fixed vegetable oils and fats(421/2)	27092.4	1.8	98.2	0.0	98.2	0.0	0.0
Processed animal and vegetable oils and fats(431)	...	...	...	...	...	...	...
CHEMICALS							
Organic chemicals(512)	1211.0	0.0	95.6	0.0	95.6	0.0	4.4
Inorganic chem., oxides and halogen salts(513/4)	76.1	2.6	97.4	0.0	97.4	0.0	0.0
Dyeing, tanning and colouring materials(531)	112.0	0.0	100.0	0.0	100.0	0.0	0.0
Medicinal and pharmaceutical products(541)	537.6	5.4	94.3	1.5	92.8	0.0	0.0
Plastics, cellulose and artificial resins(581)	...	...	...	...	...	...	...
FERTILIZERS							
Nitrogenous fertilizers & related materials(5611)	...	...	...	...	...	...	...
Phosphatic fertilizers and related materials(5612)	...	...	...	...	...	...	...
Potassic fertilizers and related materials(5613)	...	...	...	...	...	...	...
PETROLEUM							
Petroleum, crude or partly refined(331)	15516479.2	12.5	87.2	46.9	37.7	0.0	0.0
Petroleum products(332)	42822.1	6.3	87.5	85.0	2.5	0.0	0.0
RUBBER							
Crude rubber, synthetic and reclaimed(231)	31706.6	18.5	79.7	1.6	77.7	0.0	1.8
Rubber materials, e.g.sheets, threads, piping(621)	0.2	0.0	100.0	46.5	53.5	0.0	0.0
Articles of rubber, e.g. tyres, tubes(629)	13.4	20.1	78.0	44.6	0.0	0.0	0.0
WOOD AND FURNITURE							
Wood, shaped or simply worked(243)	85.4	0.0	100.0	38.3	61.7	0.0	0.0
Pulp paper, including waste(251)	...	...	...	...	...	...	...
Veneers, plywood, improved wood(631)	1.0	42.1	36.8	36.8	0.0	0.0	0.0
Wood manufactures(632)	0.2	100.0	0.0	0.0	0.0	0.0	0.0
Paper and paperboard(641)	799.4	0.1	99.7	0.1	29.3	0.0	0.0
Articles of pulp, paper or paperboard(642)	94.3	3.8	93.6	5.3	88.3	0.0	0.0
Furniture(821)	37.1	48.2	33.9	25.3	8.6	0.0	0.0
TEXTILES AND CLOTHING							
Wool and other animal hair(262)	...	...	...	...	...	...	...
Cotton(263)	34323.1	14.6	85.1	0.0	43.4	22.3	0.0
Jute(264)	20.2	100.0	0.0	0.0	0.0	0.0	0.0
Vegetable fibres, flax and hemp(265)	10.7	0.0	100.0	0.0	100.0	0.0	0.0
Synthetic and regenerated fibres(266)	...	...	...	...	...	...	...
Textile yarn and thread(651)	...	...	...	...	...	...	...
Woven cotton fabrics(652)	...	...	...	...	...	...	...
Woven textile fabrics(653)	...	...	...	...	...	...	...
Made-up articles chiefly of textiles(656)	163.6	0.4	99.6	0.4	0.0	99.2	0.0
Travel bags, handbags, etc.(831)	18.4	0.7	99.3	0.0	99.3	0.0	0.0
Clothing, excluding leather(841 less 8413)	904.6	84.4	15.6	5.1	10.5	0.0	0.0
Calf leather(6113)	246.1	0.0	100.0	100.0	0.0	0.0	0.0
LEATHER AND PRODUCTS							
Other leather, including artificial(611 less 6113)	2734.0	2.7	94.2	8.6	79.9	0.3	0.1
Leather manufactures(612)	35.9	0.0	100.0	0.0	100.0	0.0	0.0
Apparel and accessories of leather(8413)	...	...	...	...	...	...	...
Footwear(85)	...	...	...	...	...	...	...
BUILDING MATERIALS AND GLASS							
Lime, cement, fabricated building materials(661)	2440.5	0.1	51.2	0.0	51.2	0.0	48.7
Construction and refractory materials of clay(662)	...	...	...	...	...	...	...
Glass(664)	0.1	0.0	100.0	100.0	0.0	0.0	0.0
Glassware and pottery(665/6)	87.2	99.7	0.2	0.2	0.0	0.0	0.0

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Table A.9. Destination of manufactured exports by industry, 1979 (continued)

NIGERIA

Description of traded goods (SITC)	World total (in 1000 current US $)	Developing countries	Developed market economies				Centrally planned economies
			Total	USA	EEC	Japan	
		(Percent of world total)					
IRON AND STEEL							
Iron ore and concentrates(281)	...	...	...	...	...	...	...
Iron and steel scrap(282)	25.6	0.0	68.8	0.0	68.8	0.0	0.0
Pig iron and sponge(671)	...	...	...	...	...	...	...
Ingots and other primary forms(672)	...	...	...	...	...	...	...
Bars, rods, shapes, sections(673)	...	...	...	...	...	...	...
Universals, plates and sheets(674)	202.0	0.1	99.9	0.0	0.0	99.9	0.0
Hoop and strip(675)	...	...	...	...	...	...	...
Iron and steel wire(677)	...	...	...	...	...	...	...
Tubes, pipes and fittings(678)	137.3	0.0	100.0	100.0	0.0	0.0	0.0
Unworked castings and forgings(679)	...	...	...	...	...	...	...
NON-FERROUS METALS							
Non-ferrous ore and concentrates(283)	13882.3	0.5	99.5	18.9	78.6	0.5	0.0
Copper, blister, refined, alloys(6821)	...	...	...	...	...	...	...
Copper bars, shapes, sections, wire, etc.(6822)	0.1	0.0	100.0	100.0	0.0	0.0	0.0
Aluminium, unwrought or worked(684)	0.2	57.1	42.9	42.9	0.0	0.0	0.0
Lead, unwrought or worked(685)	...	...	...	...	...	...	...
Zinc, unwrought or worked(686)	...	...	...	...	...	...	...
Tin and alloys, unwrought or worked(687)	15214.8	0.0	100.0	0.0	84.4	0.0	0.0
Wire products, e.g. cables, ropes(693)	0.5	86.7	13.3	13.3	0.0	0.0	0.0
SELECTED CAPITAL GOODS							
Hand tools used in agriculture(6951)	...	...	...	...	...	...	...
Tools for use in hand or machine(6952)	1.3	27.1	72.9	39.1	33.8	0.0	0.0
Power generating machinery, non-electric(711)	2.8	46.3	53.7	0.0	53.7	0.0	0.0
Agricultural machinery(7121/2)	...	...	...	...	...	...	...
Dairy equipment(7123)	...	...	...	...	...	...	...
Tractors(7125)	...	...	...	...	...	...	...
Office machines(714)	3.5	80.2	15.1	14.2	0.9	0.0	0.0
Metal working machinery(715)	...	...	...	...	...	...	...
Textile and leather machinery(717)	...	...	...	...	...	...	...
Machines for paper, pulp and paper articles(7181)	...	...	...	...	...	...	...
Industrial food-processing machinery(7183)	...	...	...	...	...	...	...
Machine tools for working minerals,wood,etc.(7195)	...	...	...	...	...	...	...
Electrical power machinery and switchgear(722)	1.8	28.5	71.5	71.5	0.0	0.0	0.0
MAJOR CONSUMER DURABLES							
Commercial road vehicles(732 less 7321)	1109.1	2.4	97.6	0.0	97.6	0.0	0.0
Passenger motor cars(7321)	10.5	0.0	100.0	63.8	36.2	0.0	0.0
Television and radio sets(7241/2)	...	...	...	...	...	...	...
Domestic electrical equipment(725)	6.7	57.6	42.4	42.4	0.0	0.0	0.0
TOTAL OF ABOVE	15717264	12.4	87.2	46.5	38.0	0.1	0.0
TOTAL OF ALL MERCHANDISE (SITC 0 to 9)	16360780	12.0	87.6	45.4	39.4	0.1	0.0

Source: Statistics and Survey Unit, UNIDO.Based on data supplied by the UN Statistical Office, with estimates by the UNIDO Secretariat.

Note: Percentages may not add to 100.0 due to the fact that countries report trade to/from "unspecified areas". Selection of products shown in this table was based on the definition of the manufacturing sector used for production statistics (i.e. the ISIC) and the associated raw material supplies. Thus, not all products are regarded as manufactures according to the conventional definitions of manufactured trade (e.g. SITC 5 to 8 less 68).

NIGERIA

Product grouping and commodity (ISIC)		Unit	Average apparent consumption per 1000 inhabitants	Imports: As percentage of apparent consumption	Exports: As percentage of apparent consumption	Average annual production	Growth rate of apparent consumption
			1979-1981	1979-1981	1979-1981	1979-1981	1970-1981
FOOD PRODUCTS							
Raw sugar (311801)	a/	W	0.44	0.7	4.6	35000	5.41
Refined sugar (311804)	a/	W	7.85	94.8	0.6	34500	19.82
Cocoa powder (311907)	a/	W	0.05	3.4	171.2	9789	-12.27
Cocoa butter (311910)	a/	W	0.02	1.4	538.2	10400	-3.98
Chocolate and chocolate products (311913)		W	...	...	...	...	...
Prepared animal feeds (312201)	a/	W	1.20	42.2	0.0	52500	9.47
OILS AND FATS							
Oils and fats of animals, unprocessed (311507)		W	...	...	...	...	...
Oils of vegetable origin (311510*)	a/	W	8.93	6.5	4.4	662500	1.82
TEXTILES							
Wool yarn, pure and mixed (321103)		W	...	...	...	...	...
Cotton yarn, pure and mixed (321109)	b/	W	0.37	82.0	0.2	5000	17.83
Cotton woven fabrics (321128)	c/	S	5505.43	0.3	0.0	423000000	0.71
Woollen woven fabrics (321134)		S	...	...	...	...	...
Knitted fabrics (321301)	a/	W	0.12	2.0	0.1	8692	19.45
FOOTWEAR							
Footwear, excluding rubber footwear (324000)	a/	P	142.10	30.6	0.2	7500000	9.63
WOOD AND WOOD PRODUCTS							
Veneer sheets (331110)	b/	V	0.12	66.7	0.0	3000	33.26
Particle board (331122)	a/	V	0.59	7.7	0.0	41500	2.43
PAPER AND PAPER PRODUCTS							
Wood pulp, mechanical (341101)	b/		0.00	100.0	0.0	0	-6.43
Pulp of fibres other than wood (341104)	a/	W	0.00	100.1	0.1	0	-40.47
Wood pulp, dissolving grades (341107)	a/	W	0.01	100.0	0.0	0	17.79
Wood pulp, sulphate and soda (341110)	c/	W	0.20	100.0	0.0	0	24.79
Wood pulp, sulphite (341113)	a/	W	0.00	100.0	0.0	0	-24.99
Wood pulp, semi-chemical (341116)			0.02	100.0	0.0	0	-4.01
Newsprint (341119)	a/	W	0.45	101.6	1.6	0	6.94
Other printing and writing paper (341122)	a/	W	0.91	94.7	0.5	4000	11.24
Kraft paper and kraft paperboard (341125)		W	...	...	...	...	...
Other paper and paperboard (341131)		W	...	...	...	...	...
INDUSTRIAL CHEMICALS							
Methanol (methyl alcohol) (351121)		W	...	...	...	...	...
Glycerine (glycerol) (351125)		W	...	...	...	...	...
Chlorine (351145)	a/	W	0.01	100.0	0.0	0	7.85
Sulphuric acid (351147)	a/	W	0.06	100.0	0.0	0	40.33
Nitric acid (351149)		W	...	...	...	...	...
Zinc oxide (351154)	b/	W	0.01	100.0	0.0	0	12.29
Titanium oxides (351155)	b/	W	0.01	101.4	1.4	0	22.49
Lead oxides (351157)		W	...	...	...	...	...
Ammonia (351158)		W	...	...	...	...	...
Caustic soda (351159)	a/	W	0.37	100.1	0.1	0	6.00
Soda ash (351166)		W	...	...	...	...	..
Hydrogen peroxide (351171)		W	...	...	...	...	..
Calcium carbide (351173)		W	...	...	...	...	...
Dyestuffs, synthetic (351174)	b/	W	0.17	100.0	0.0	0	6.22
Vegetable tanning extracts (351175)		W	...	...	...	...	...
Nitrogenous fertilizers (351201)		W	...	...	...	...	...
Phosphatic fertilizers (351204 + 351207)	a/	W	1.19	95.3	0.8	5000	17.22
Potassic fertilizers (351210)	a/	W	0.32	100.0	0.0	0	30.42
Insecticides, fungicides, etc. (351216)		W	...	...	...	...	...
Rubber, synthetic (351301)		W	0.07	100.0	0.0	0	32.02
Non-cellulosic staple and tow (351304)	a/	W	0.06	27.2	0.0	3244	69.54
Regenerated cellulose (351331)	a/	W	0.10	100.0	0.0	0	11.11

========> continued

Table A.10. Average apparent consumption of selected manufactures, 1979-1981 (continued)

NIGERIA

Product grouping and commodity (ISIC)		Unit	Average apparent consumption per 1000 inhabitants	Imports as percentage of apparent consumption	Exports as percentage of apparent consumption	Average annual production	Growth rate of apparent consumption
			1979-1981	1979-1981	1979-1981	1979-1981	1970-1981
PETROLEUM REFINERIES							
Motor gasolene (353007A)			28.61	4.5	1.2	2133333	16.88
Kerosene (353013A)			9.24	2.8	2.0	706667	10.36
Distillate fuel oils (353019A)			23.39	17.0	3.9	1566667	13.88
Residual fuel oils (353022A)			10.70	0.0	37.4	1133333	1.97
Lubricating oils (353025A)			0.95	0.0	0.0	73333	11.13
Liquefied petroleum gas (353037A)			0.28	10.9	0.0	19000	2.65
GLASS AND CEMENT							
Glass bottles and containers (362010B)		w	...	...	...	...	...
Cement (369204)	c/	w	59.14	63.7	1.3	1714000	10.09
IRON AND STEEL							
Pig iron (371007 + 371010)	c/	w	0.01	100.0	0.0	0	6.97
Wire rods (371028)		w	...	...	...	...	...
Angles, shapes and sections (371035)		w	...	...	...	...	...
Plates(heavy), over 4.75 mm. (371040)	c/	w	0.56	100.1	0.1	0	-1.08
Plates(medium), 3 to 4.75 mm. (371043)	c/	w	0.15	100.0	0.0	0	-6.19
Plates and sheets, < 3 mm. (371046 + 371049 + 371052)	c/	w	6.43	100.0	0.0	0	41.70
Tinplate (371055)	c/	w	0.67	100.0	0.0	0	1.08
Railway track material (371067)	c/	w	0.07	100.0	0.0	0	8.39
Wire, plain (371070)	c/	w	0.44	100.0	0.0	0	7.53
Tubes, seamless (371076)	c/	w	1.50	100.0	0.0	0	7.97
Tubes, welded (371079)	c/	w	0.73	100.5	0.5	0	9.55
Steel castings in the rough state (371085)		w	...	...	...	...	...
Steel forgings (371088)		w	...	...	...	...	...
NON-FERROUS METALS							
Copper, refined, unwrought (372004)		w	...	...	...	...	...
Copper bars, rods, angles, etc. (372010 + 372013)	a/	w	0.06	100.0	0.0	0	15.72
Copper plates, sheets, strip and foil (372016)	a/	w	0.03	100.0	0.0	0	34.08
Copper tubes and pipes (372019)	c/	w	0.00	100.0	0.0	0	3.01
Aluminium, unwrought (372022)		w	...	...	...	...	259.08
Aluminium bars, rods, angles, etc. (372025 + 372028)	c/	w	0.06	100.0	0.0	0	2.80
Aluminium plates, sheets, strip etc. (372031)	a/	w	0.15	100.1	0.1	0	4.01
Aluminium tubes and pipes (372034)	a/	w	0.00	103.6	3.6	0	17.06
Lead, refined, unwrought (372037)	a/	w	0.04	36.3	0.3	1750	9.13
Zinc, unwrought (372043)	c/	w	0.23	100.3	0.3	0	19.35
Zinc plates, sheets, strip and foil (372046)	a/	w	0.00	100.6	0.6	0	3.70
Tin, unwrought (372049)	a/	w	0.02	2.1	154.5	2918	34.52

Source: Statistics and Survey Unit, UNIDO.
Based on data supplied by the UN Statistical Office, with estimates by the UNIDO Secretariat.

Note: ISIC 311510* consists of 311510 + 311513 + 311516 + 311519 + 311522 + 311525 + 311528 + 311531 + 311534 + 311537.
Growth rates have been calculated on the basis of available annual data over the period indicated.
Footnotes: a/ Data for 1981 not available.
b/ Data for 1979 only.
c/ Data for 1980 only.

Table A.11. Manufacturing gross investment by industry grouping, 1971-74 and 1975-80

(Current naira)

1. PRIVATE INVESTMENT

	1971-74		1975-78	
	N millions	Per cent	N millions	Per cent
A. Consumer goods industries	252.4	70.6	1,439.2	73.2
of which: Food, beverages and tobacco	101.4	28.4	421.6	21.4
Textiles and apparel	94.0	26.3	411.4	20.9
Leather goods and footwear	4.2	1.2	13.6	0.7
Paper products and printing	17.6	4.9	338.2	17.2
Plastic and rubber goods	15.4	4.3	69.8	3.6
Other non-durable goods	11.6	3.2	104.8	5.3
Wood and metal furniture	6.8	1.9	70.6	3.6
TV and radio equipment	1.4	0.4	9.0	0.5
B. Intermediate goods industries	101.3	28.3	446.9	22.7
of which: Chemical and paints	15.4	4.3	55.2	2.8
Leather tanning and finishing	1.0	0.3	5.6	0.3
Tyres and tubes	5.6	1.6	14.0	0.7
Sawmills and wood products	6.4	1.8	59.0	3.0
Building materials	48.2	13.5	155.4	7.9
Metalworking industries	23.6	6.6	150.8	7.7
Miscellaneous	1.0	0.3	6.7	0.3
C. Capital goods industries	3.9	1.1	80.2	4.1
of which: Machinery and equipment	0.6	0.2	10.5	0.5
Other electrical equipment	2.1	0.6	19.5	1.0
Transport equipment	1.2	0.3	50.2	2.6
Total all industries	375.5	100.0	1,966.3	100.0

2. PUBLIC SECTOR INVESTMENT

	1975-80	
	Per cent	N millions
Petroleum and petrochemical products	44.0	
Iron and steel	22.5	
Cement	5.7	
Pulp and paper	7.2	
Other (including: sugar refineries, metal engineering, etc.)	20.6	
Total	100.0	3,800

N.B. - Data for Private Investment derived from Federal Office of Statistics: Industrial Surveys reported "Net" Capital Expenditures (i.e., after deduction of fixed assets sold by establishments during a given year; but before depreciation). This data may underestimate level of investment since Surveys do not usually cover establishments not yet in operation. Survey data used as proxy for private investment since almost all major ongoing public sector projects not operational by 1978 thus probably not included. Limited overlap likely, however, between private and public sector data due to: (a) probable inclusion of operational State government sponsored projects in Surveys, and (b) probable inclusion of (up to 10% of) Federally sponsored investments in Surveys.

- Data for Public Sector Investment derived from Third Development Plan and Plan execution reports.

Table A.12. Public investment in manufacturing programmed under the Fourth National Development Plan (1981-85) by major categories of investment

	Millions of Naira	Per cent
Federal Government of Nigeria	6,367	58.0
of which:		
- Iron and steel and steel products[a/]	3,030	47.6
- Refineries and petrochemicals[a/]	887	13.9
- Liquified natural gas[a/]	295	4.6
- Agro-allied industries	539	8.5
(of which pulp and paper)[a/]	(217)	(3.4)
- Chemicals[a/]	303	4.8
(of which cement and fertilizers)[a/]	(175)	2.75
- Building materials	85	1.3
- Engineering	107	1.7
- Small-scale industries	295	4.6
- Others	77	1.2
- Financial institutions, etc.	743	11.7
- Quantity control	7	0.1
		100.0
State and local Governments	1,697	15.0
Private sector (Indicative Plan)	3,000	27.0
Total	11,064	100.0
(Federally-sponsored capital-intensive:	4,604)	

Source: Federal Republic of Nigeria, Fourth National Development Plan, (1981-85).

a/ Capital-intensive industries.

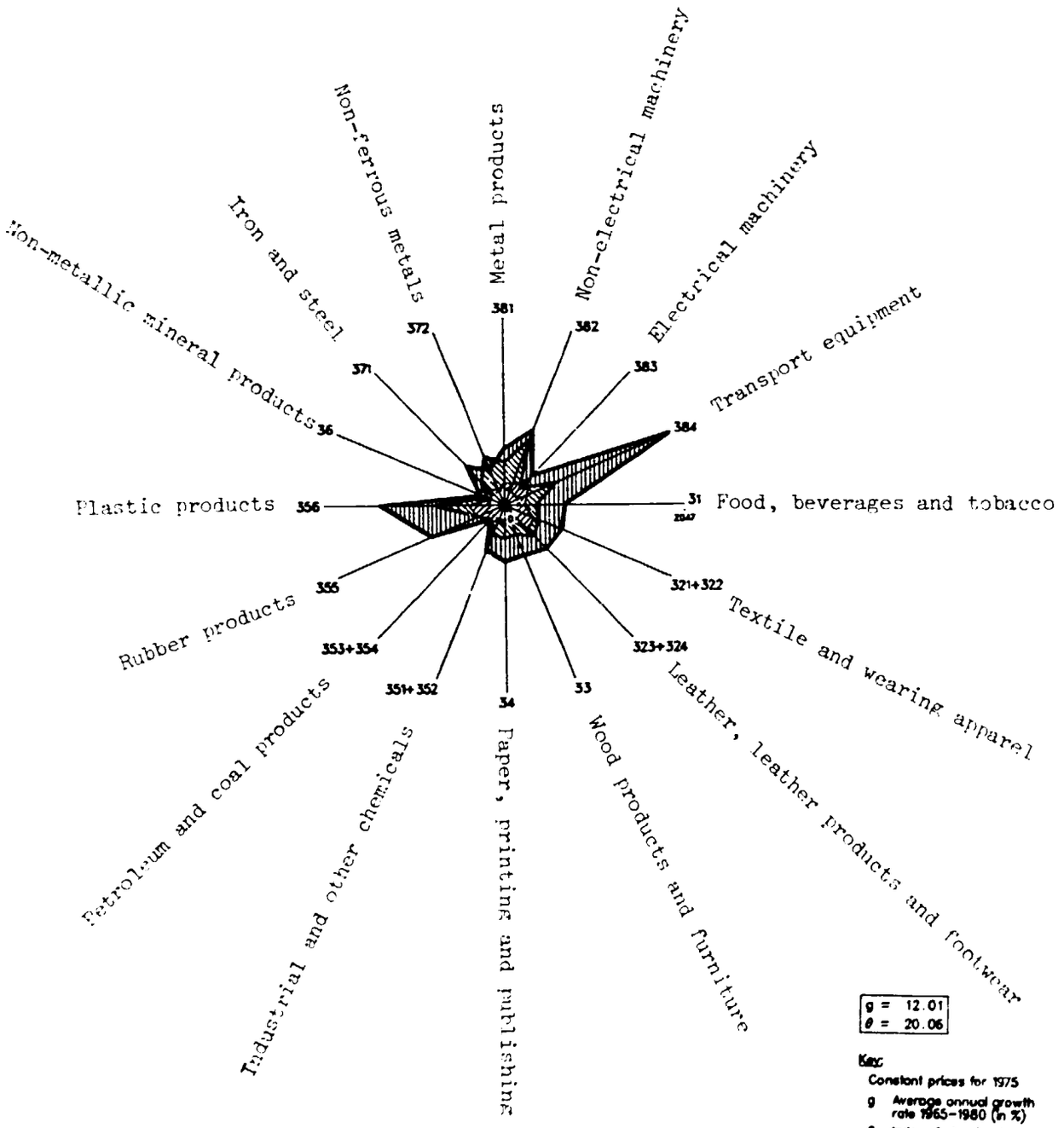
Table A.13. Value added[a/] according to location of industry, 1968 and 1976
(In thousands of naira)

	1968				1976			
	Lagos	Outside Lagos	Total	Outside Lagos (Per cent)	Lagos	Outside Lagos	Total	Outside Lagos (Per cent)
Vegetable oil milling	200	6,984	7,184	97.2	3,459	48,081	51,540	93.3
Sugar refineries, factories	1,328	540	1,868	28.9	4,118	5,395	9,513	56.7
Beer	11,961	3,811	14,494	24.2	88,402	28,267	116,669	24.2
Soft drinks			1,278		67,942	31,026	98,968	31.3
Textiles	5,495	11,307	16,802	67.3	95,159	74,362	169,521	43.9
Lumber processing	103	1,627	1,730	94.0	2,865	31,894	34,759	91.8
Bricks and tiles	64	67	131	51.1	1,629	6,998	8,627	81.1
Concrete products	150	141	291	48.5	13,313	15,263	28,576	53.4
Structural metal products	1,055	156	1,211	12.9	19,875	2,270	22,145	10.2
Total	20,356	24,633	44,989	54.8	292,762	243,556	540,318	45.1
Total manufacturing	55,606	48,230	103,836	46.4	1,107,521	517,133	1,642,654	31.8

Source: Industrial Surveys, 1968 and 1976.

a/ Including "other costs". Data on "other costs" is not available for 1968.

Appendix A-14. INDUSTRIAL STRUCTURAL CHANGE, 1965-1980
(Index of value added: 1965=100)



The measure for structural change is defined as:

$$\cos \theta = \frac{\sum_{i} s_i(t).s_i(t-1)}{\sqrt{\left(\sum_{i} s_i(t)^2\right).\left(\sum_{i} s_i(t-1)^2\right)}}$$

where $s_i(t)$ is the share of the i-th branch of value added in total value added in the year t.

The value θ can be interpreted as the angle between the two vectors $s_i(t-1)$ and $s_i(t)$ measured in degrees.

Source: UNIDO, Industry and Development, Global Report, 1985

Appendix b: LAWS AND REGULATIONS RELATED TO INDUSTRIAL DEVELOPMENT

The following are the laws and regulations related to industrial development in Nigeria:

1. Customs and Excise Management Act 1958, No. 55 of 1958.
2. Customs (Drawback) Regulations Legal Notice, No. 70 of 1959.
3. Customs Duties (Dumped and Subsidised Goods) Act No. 9 of 1958.
4. Income Tax Management Act; 1961, No. 21.
5. Factories Act Cap. 66.
6. National Provident Fund Act 1961, No. 20.
7. Workmen's Compensation Act: Cap. 222.
8. Merchandise Marks Act Cap. 117.
9. Registration of Business Names Act 1961, No. 17.
10. Trade Marks Act 1965, No. 29.
11. Immigration Act 1963, No. 6.
12. Exchange Control Act 1962, No. 16.
13. Companies Act No. 51 of 1968.
14. Patents and Designs Act 1970, No. 60.
15. Industrial Inspectorate Act 1970, No. 53.
16. Industrial Development (Income Tax) Act 1971, No. 22.
17. Nigerian Standards Organisation Act 1971, No. 56.
18. Industrial Training Fund Act 1971, No. 47.
19. Wages Boards and Industrial Councils Act 1973, No. 1.
20. National Bank for Commerce and Industry Act 1973, No. 22.
21. Trade Union Act 1973, No. 31.
22. Excise Tariff (Consolidation) Act 1973, No. 7.
23. Customs Tariff (Consolidation) Act 1973, No. 6.
24. Labour Act 1974, No. 21.
25. Trade Disputes Act 1976, No. 7.
26. Trade Disputes Essential Services Act 1976, No. 23.
27. Nigerian Export Promotion Council Act 1976, No. 26.
28. Nigerian Enterprises Promotion Act 1977, No. 3.
29. Productivity, Prices and Incomes Board Act 1977, No. 30.
30. Pre-shipment Inspection of Imports Act 1978, No. 36.
31. Companies Income Tax Act 1979, No. 28.

32. Industrial Promotion Act 1979, No. 40.

33. Import Prohibition Order L.N. 10 of 1979.

34. National Office of Industrial Property Act 1979, No. 70.

35. Securities and Exchange Commission Act 1979, No. 71.

36. The Electricity (Private Licenses) Regulations 1965, LN 76.

37. Bankruptcy Act 1979, No. 16.

Appendix C: THE APPROVED AND/OR OPERATIONAL TECHNICAL CO-OPERATION PROJECTS OF UNIDO

(March 1985)

Federal Republic of NIGERIA

Project Number	Backstopping responsibility (Spec.Act.Code)	Project Title
DP/NIR/75/012**	IO/TRNG (31.5.A)	Industrial management development services
DP/NIR/78/001*	IO/INFR (31.3.K)	Assistance in textile testing and quality control (phase II)
DP/NIR/78/006*	IS/TEC (62.4.Z)	Establishment of a national office for technology transfer and a national industrial consultancy agency
ST/NIR/80/001**	IO/MET (31.8.F)	Central metallurgical research and development institute
DP/NIR/83/022	IO/INFR (31.3.N)	Federal Institute of Industrial Research, Industrial Information Centre (phase II)

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

** Total allotment $1 million or above.

Appendix D: MAJOR NIGERIAN COMPANIES, 1984

(In millions of US dollars, unless otherwise indicated)

	Company	Type of business	Sales/ Turnover	Profit (Loss)	Number of employees	Net assets	Ownership
1.	Nigerian National Petroleum Co (NNPC) a/	Oil	6,600 est				
2.	UAC of Nigeria	Manufacturing/merchants	994	18.8		507.7	Unilever
3.	Peugeot Automobile Nigeria a/	Cars	890	23.7	4,500		
4.	Gulf Oil (Nigeria)	Oil	766 est				Gulf, U.S.A.
5.	New Africa Development Co.b/	Distribution	743		30		
6.	SCOA Nigeria	Vehicle	619	6	3,926	24.1	Scoa, France
7.	Nigerian Breweries d/	Brewery	438		3,088		Unilever, Heineken
8.	Total Nigerian	Oil	435	22.5			
9.	Prestige Industries	Fabrics, footwear	415				
10.	Nigeria Agip Oil b/	Oil	395		1,366		Agip, Italy
11.	Mobil Oil Nigeria	Petroleum	392	19.2	520	56.8	
12.	Nigerian Bottling c/	Soft drinks	369	38	6,250	160.5	
13.	African Petroleum	Petroleum	354	24.7	991		
14.	CFAO Nigeria	gen supplies	349	19.4	4,000		
15.	Nigeria Cocoa Board a/	Cocoa	334		1,592		
16.	Guiness Nigeria	Brewery	332	43.9	4,500	178.6	
17.	Texaco Nigeria	Petroleum	326	18.3	420		U.S.A.
18.	Flour Mills of Nigeria	Flour milling	296 est			3,000	
19.	Nigerian Breweries d/	Brewery	259		4,500		
20.	National Oil and Chemical	Pet.products	249		1,400		Shell, U.K.
21.	IBRU b/	General trade and manufacture	238		8,000		
22.	Unipetrol Nigeria	Petroleum	214	8.5	600		
23.	Lever Brothers Nigeria	Detergents	205	11.8	3,500	139	U.K.
24.	Leventis Motors c/	Vehicle assembly	188	2.5	200	59	
25.	Nigerian Technical Co.b/	Vehicle distributors	171	3.7	1,600		
26.	West African Portland Cement	Cement	166	17.5	2,500	185	
27.	Cadbury Nigeria	Confectionery	165	5.4	2,450		U.K.

Source: South, March 1985, p.46.

a/ 1981. b/ 1982. c/ 1983/84. d/ Different companies.

REFERENCES

Abiodun, J., Industrial Policies and the Pattern of Manufacturing in Nigeria. Symposium on regional development priorities, Vienna, Austria, 20-24 August 1984, UNIDO Conference Room Paper No.24.

Beekman, B., "Whose State? State and Capitalist Development in Nigeria", Review of African Political Economy, no.23, January-April 1982.

Forrest, "Recent Nigerian Industrialization" in Fransman, M., Industry and Accumulation in Africa, Heinman, London, pp.321-356.

Hoogvelt, A., "Indigenisation and Foreign Capital: Industrialization in Nigeria", Review of African Political Economy, nr. 14 (1979), pp.56-68.

Inanga, A. and Soyba, A., "The Profitability and Size of a Nigerian Quoted Conglomorate", Nigerian Journal of Economic and Social Studies, 1982, no.4, pp.364-372.

Lidholm, C.E. "Production Functions for Eastern Nigerian Industry", Nigerian Journal of Economic and Social Studies, 8,3, (1966) pp.427-439.

Lloyds Bank, Nigeria Economic Report 1984.

Nigeria, Federal Office of Statistics, Industrial Survey, 1968, 1972 and 1976.

Odama, J. and Kazi, U., "Rate of Capital Labour Substitution in Time Series Production Function in the Nigerian Manufacturing Industry", Nigerian Journal of Economic and Social Studies (NJESS), 1983, no.1, pp.37-60.

Osoba, S., "The Deepening Crisis of the Nigerian National Bourgeoisie", Review of African Political Economy, no.13 (1979), pp.63-77.

UAC of Nigeria (Ltd.), Annual Reports and Accounts, 1971-1980.

UNIDO, Industry in a Changing World, New York 1983, Sales No.E.83.II.B.9.

World Bank, "An Analysis of Industrial Incentives and Location in Nigeria", Washington DC 1978 (unpublished report, submitted to the Federal Ministry of Industries, Lagos).

World Bank, James W. Robertson, The Structure of Industrial Incentives in Nigeria, 1979-80, 1981.

World Bank, Nigeria's Non-oil Export Prospects, Report No. 3371-UNI (1982).

World Bank, Nigerian Textile Sector Review, August 1983 (mimeo).

World Bank, Nigeria: The Industrial Incentive System, Report, No. 4272-UNI (1983).

World Bank, Macroeconomic Policies for Structural Change, Report No. 4306-UNI (1983).

World Bank, World Development Report 1984 and 1985, Washington D.C.

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