PN-ABD-035

# Country Issues Paper: FEDERAL REPUBLIC OF NIGERIA

Prepared by: Pamela DeLargy
Department of Political Science
University of North Carolina
Chapel Hill, N. C. 27514

For The

International Programs Office
Carolina Population Center
University of North Carolina
University Square
123 West Franklin Street
Chapel Hill, N. C. 27514

And The

Integrated Population Development Project
Research Triangle Institute
Center for Population and Urban-Rural Studies
P. O. Box 12194
Research Triangle Park, N. C. 27709

For Further Information, Contact:

Betty E. Cogswell, Ph.D.
Director, International Programs Office
Carolina Population Center
University of North Carolina
University Square
123 West Franklin Street
Chapel Hill, N. C. 27514
Telephone: (919) 966-2159, 2150
CABLE ADDRESS: POPCENTER

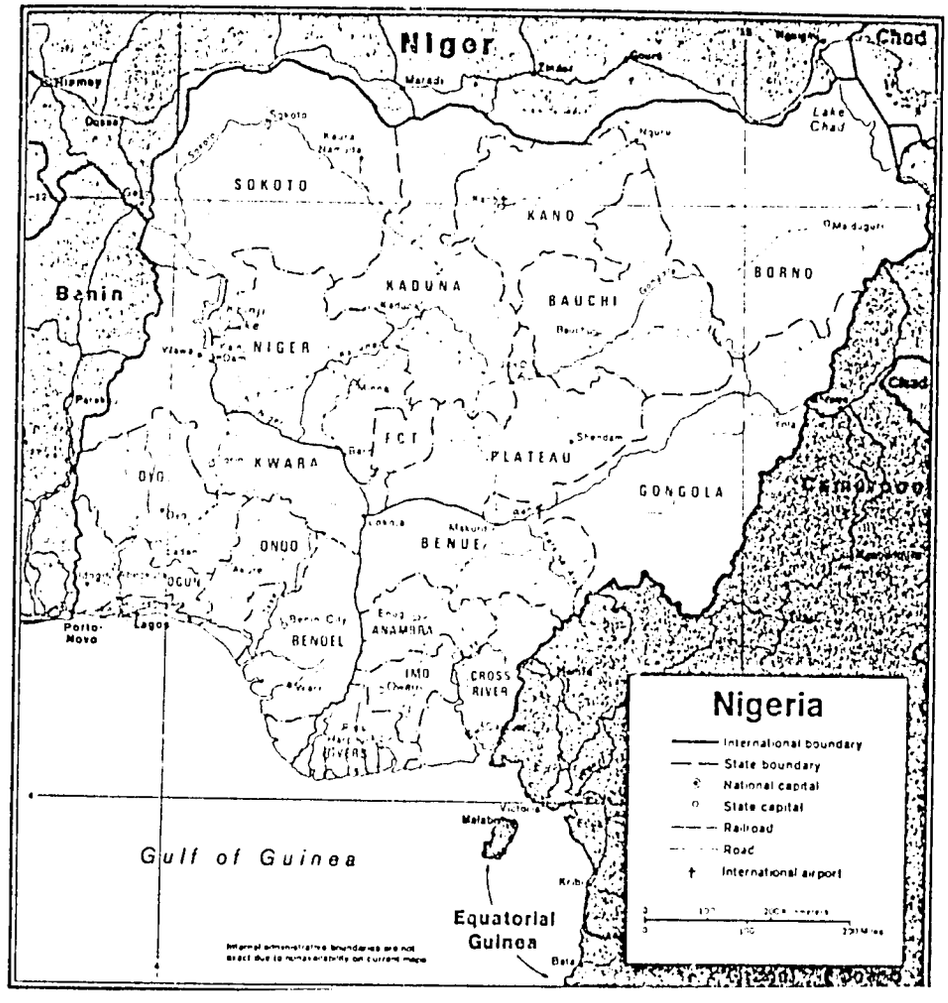
Pamela DeLargy
Carolina Population Center
International Programs Office
University of North Carolina
University Square
123 West Franklin Street
Chapel Hill, N. C. 27514
Telephone: (919) 966-2159, 2150

May 21, 1982

PN-ABD-035

From Africa Report, May-June 1982.

Countries of the World and Their Leaders Yearbook 1981.
Detroit: Gale Research Company.

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# NIGERIA

## Basic Country Data

| | |
|---|---|
| Total Population | Around 84 million (unknown) |
| Rate of Population Growth | 2.5% - 3.2% |
| Population Density | 82 persons per $km^2$ |
| % of Population under 15 Years of Age | 46 |
| Crude Birth Rate | 50 per 1000 |
| Gross Reproduction Rate | 3.4 |
| Net Reproduction Rate | 2.4 |
| Crude Death Rate | 23 per 1000 |
| Infant Mortality Rate | 157 per 1000 |
| Life Expectancy at Birth | 47 years |
| % of Population in Urban Areas | 20.4 |
| Urban Growth Rate (1975-1980) | 5.5% |
| GNP per capita | $480 - $560 |
| Average Annual GNP Growth Rate (1960-1980) | 3.6% |
| Adult Literacy Rate (1980) | 25% |
| % of Primary School Enrollment | |
| % of Labor Force in Agriculture (1978) | 56% |
| Agricultural Production as % of GNP (1977) | 34% |
| Average Annual Per Capita Agricultural Production Growth Rate (1970-1979) | 1.3% |

# Current Issues in Population and Development in Nigeria

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## I. Background

### A. Geography and Ethnicity

The Federal Republic of Nigeria is Africa's 13th largest state in area and is the continent's most populous state, with over 80 million inhabitants. The country extends over an area of 923,768 $km^2$ from the Gulf of Guinea in the south to the Sahara desert in the north. It is bounded on the west and north by Benin and Niger and on the east by Chad and Cameroon. The area is fairly densely settled (est. 72-92 inhabitants per $km^2$) and contains well over half of the total population of West Africa. In fact, one in four Africans is a Nigerian. A country of great cultural and environmental diversity, Nigeria is composed of more than 200 ethnic groups with four, the Hausa, Fulani, Yoruba, and Ibo, accounting for about 60 percent of the population. In large part because of this diversity, the country has developed a federal form of government not commonly found in Africa.

Nigeria's physical environment basically consists of four regions or vegetative and climatic zones which result from the wide variation of rainfall the country receives. Along the Atlantic coastline a narrow humid belt of swamps and mangrove forest is little developed and sparsely populated with the exception of the port cities of Lagos and Port Harcourt. Further inland is a broad zone of tropical rainforest and oil palm bush covered by many rivers and streams. More inland still is a wider belt of open woodland and grass savannah which reaches as far as the Southern Sahara. Rainfall across these belts ranges from 120 inches per year at Calabar on the Gulf to 30 inches per year in Bornu State in the North. Accompanying the variation in rainfall is a variation in soil fertility and agricultural specialization with major crops being cocoa, palm oil and rubber in the South and ground-

nuts and cotton in the North; and only very marginal development of any agriculture in the sparsely settled tsetse-fly infested middle belt.

Population density varies widely; the highest is in the southeast and southwest and some parts of the north. The largest ethnic group, the Hausa (21%) and the Fulani (8.6%) and the Kanuri (4.1%) reside in the North and have been heavily influenced by Muslim-Sudanic culture. The Yoruba (21%) the Edo (1.7%) and the Urhobo (1.2%) reside in the southwest and were founders of the former forest kingdoms. The Ibo (16.6%), the Ibibio (3.6%), the Ijaw (2%) the Anang (1.2%) and the Efik (.3%) form the village communities of the forest and coastal areas of the southwest. The sparsely populated middle belt contains the Tiv (2.5%), the Nupe (1.2%) and many other smaller tribes.

Because of the ethnic and linguistic diversity of the country, English has been chosen as the official language.

B. History and Politics

Nigeria first emerged as a geopolitical unit in 1914 when the Northern and Southern Protectorates were joined by Lord Lugard. The country gained its independence in 1960 and became a republic in 1963. Administratively it was divided into the northern, western and eastern regions, to which were added the Federal Territory of Lagos and, in 1963, the Mid-West Region. Since 1963, there have been four major political disruptions. A coup by the military in January 1966 was followed by another in July 1966 which brought General Yukuba Gowon to power. In May 1967, the Gowon government created 12 states from the existing five regions. The former Eastern Region did not accept this division and attempted to secede from the Federation. This led to a civil war which lasted thirty months and ended with a victory by Federal forces in Nov., 1969. The military government then set up the

machinery to return the country to civil rule by October 1979. The government program included the creation of the present 19 state structure. In 1978 the ban on political activities was lifted and 54 parties were formed. Only five of these were approved by the Federal Electoral Commission and these five continue to be active today. They are: The National Party of Nigeria (NPN), predominantly Hausa-Fulani; the Unity Party of Nigeria (UPN) predominantly Yoruba-led; the Nigerian Peoples' Party (NPP), mainly Ibo; the Greater Nigerian Peoples Party (GNPP), mainly Kanuri; and the Peoples' Redemption Party (PRP) a radical populist party with most support from Kano and Kaduna states. In 1979, elections were held for the Senate, the House of Representatives, the State Assemblies and Governors and for the Presidency. In October the military government handed over power to the elected civilian government led by President Alhaji Sheku Shagari, making Nigeria the world's fourth largest democracy and the first African country where the military voluntarily turned over power to a civilian government. The Nigerian constitution and governmental structure is based on that of the United States.

C. The Economy

1. Petroleum-based growth

The 1960s were a turning point for the Nigerian economy. In the past, it was dependent on the sale of agricultural products in the international market for economic expansion and development of industry. The discovery and development of petroleum extraction and export radically changed things. The economy of Nigeria during the past decade has been dominated by oil. By 1971 Nigeria had become the ninth largest oil producer in the world. The impact of the oil revenue on the country has been dramatic. In 1963 oil sales accounted for 3 percent of government revenue; this proportion increased to 17 percent in 1967 and 25 percent in 1972. By 1974 it accounted for 50 percent of government revenue and 80 percent of foreign exchange earnings. The

tremendous growth in GNP (from 1965 to 1978) led to ambitious economic plans and the initiation of expensive development programs in the 70s. A decrease in oil sales combined with a rise in imports led to a financial crisis in 1978 and development budgets in all sectors were cut drastically. Rising oil revenues and import restrictions allowed for some economic recovery and external reserves reached a record $8.68 billion in July 1980. The current oil glut and resulting decline in both price and demand, however, have slowed growth of the economy considerably. Increased demand for consumer goods has kept the level of imports high and the country is currently having financial difficulties maintaining on-going development projects as well as financing new ones. The country remains Africa's wealthiest nation, however, with a GNP over one-third of the total GNP of the 47 other black African nations combined.

Oil money has been a blessing and a curse to the country. Giant fortunes have been made by many Nigerians (and foreign investors, too) and some tremendous things have been done to strengthen the country's infrastructure--90,000 kilometers of hard-top highways built in just 20 years, for example. But the economic consequences of oil money on what was formerly a fairly simple agrarian country have been problematical and the social consequences have been serious.

2. Agriculture

Oil revenues are paid to the government and the immediate result of this is a growth in government jobs. Consequently, the number of people rushing from the countryside to the cities to get government jobs or work on government contracts or service those who do has increased dramatically. The strain on the cities to provide services and housing to rapidly growing populations has reached crisis proportions and the costs of these services has eaten up a large part of the budget. The resulting lack of invest-

ment in rural areas has contributed to the stagnation of the agricultural sector. Fifty-six percent of the labor force in the country is in the agricultural sector and Nigeria was once a major exporter of cocoa, palm oil, rubber, and groundnuts. Except for cocoa, it now imports all of these products. Also, per capita food production has dropped over 10 percent in the past decade. Nigeria is now experiencing the largest food deficit of any country in Africa and FAO projections indicate that the deficit will continue to grow. Food currently makes up over 15 percent of total spending on imports. Problems in the agricultural sector are many: low producer incentives; transportation and distribution bottlenecks; inadequate machinery for planning, coordinating and implementing a national rural development policy; insufficient qualified manpower; and shortages of improved seeds, fertilizers, chemicals, credit, and other farm inputs. On the other hand, there are opportunities for growth in the sector including: expanding markets (both foreign and domestic); an abundance of land and human resources whose productive capacities are underutilized; and the availability of improved technology which could increase yields.

The current government is very concerned with agricultural development and has stated that it is the highest national priority. A number of programs such as the National Accelerated Food Program which was designed to assist small farmers with seeds, fertilizer, etc., and Operation Feed the Nation, a similar program, have been going on in the past few years. However, due to staffing and financial difficulties, their effects have not been encouraging.

3. Manufacturing

Since Independence, manufacturing has expanded rapidly; however its contribution to the GDP is still not over 10 percent and many industries cannot keep pace with consumer demand. There remains a very high level of foreign ownership and control of industry although the government has conducted

a serious indigenization program and most profits must now, by law, remain in Nigeria. The largest group of firms are in food, drink and tobacco processing; these make up about 30 percent of the sector. Textiles make up another 16 percent. The largest concentration of industry is in Lagos but a heavy concentration is also building up in the Kaduna-Kano-Zaria triangle. Industrial activity outside these two poles is small. The manufacturing sector employs less than 15 percent of the labour force.

4. Infrastructure

Poor transportation and utilities have been a handicap to national development in Nigeria for many years. After the war they were particularly poor due to low investment, inadequate maintenance and war damage, particularly in the three eastern states. There has since been substantial rehabilitation but expansion has been slow. The country's infrastructure suffers from: problems of imbalance between areas and between levels of service available in areas (e.g. trunk versus feeder roads); a lack of data which results in poor planning; financing difficulties, particularly in areas of state responsibility such as water supply; and lack of qualified management.

Many roads in the country are deteriorating rapidly due to overuse and the illegal use of overweight trucks. The railway, publicly owned and operated, has been in decline due to defects in equipment, poor management and rate policies, and competition from road transport. It continually operates at a deficit. Water transport has also declined, although many rivers in the country are navigable for large parts of the year. Much of the transportation problem stems from the lack of coordination among the numerous federal and state ministries responsible for various components. There is no formal body to coordinate state/federal planning in transportation, although the government is very concerned with improving transport in the country.

The construction and operation of public water supply systems is a state responsibility in Nigeria and data on water supply are scanty. About 200 cities and towns (of which 150 are in the South) have public water supplies. Only about 23 percent of the population have access to piped water, varying from 30 to 50 percent in the South to as little as 5 percent in the northern states. Of those with access to piped water, most are served by public standpipes or selling stations; only 10 percent are served by house connections. Inadequate maintenance of facilities is a severe problem. In rural areas, water is drawn from wells, streams and rivers, is usually polluted and accounts for the high incidence of diarrhea, dysentery, cholera and gastroenteritis.

No city in Nigeria is presently served by a sanitary sewerage system. The government has built some small systems to serve its own establishments and a housing estate in Lagos and some commercial and industrial firms have small private systems. Large cities have night collection services and some dwellers use septic tanks, however the absence of a sewerage system is adding to the severe health problems in Nigeria. Incidence of waterborne disease is high all over the country and is especially a problem in the very unsanitary, crowded cities. There are plans to build sewer systems in some large cities (Ibadan and Lagos) but generally, this service has a low priority in most state planning. Few cities have any kind of drainage system and consequently flooding is unavoidable in many areas whenever it rains.

Postal services in Nigeria are very weak, largely because of shortcomings in the transportation system. Inadequacies in the telephone and cable services are a serious problem as they affect the efficiency of public administration and the economy as a whole. Demand far exceeds capacity and exchanges are seriously overloaded, especially in the Lagos area. The government is constructing many

new exchanges and hopes to more than triple telephone services within this planning period.

5. Housing

There is a severe shortage of dwelling units in the country, largely due to rapid population growth and increasing urbanization. The consequence is overcrowding and high rents--often taking up to 40 percent of the monthly income of the urban worker. The government seeks to reduce this cost to 20 percent by building 60,000-200,000 residential units for low and middle income groups. The Third Development plan stated that "housing conditions are generally inadequate in the rural areas" but then went on to say that "Nigeria's housing problem...is essentially an urban problem" (Third Plan, p. 307) and the government devoted all of the new housing investment to urban areas. The latest plan recognizes the rural problem once again but it is unclear what housing programs will be developed.

D. The Demographic and Social Setting

1. Demography

The information available on population size, composition and change in Nigeria is of uncertain quality, outdated, and rarely national in scope. In spite of the fact that the census-taking began as far back as 1863, there has yet to be an acceptable census count. Counts were only for Lagos in 1863, 1866, 1868, 1871, 1881, 1891 and 1901; in 1911, 1921 and 1931 the census was based on estimates for the country. Although the 1952/3 census was a comprehensive attempt to get demographic data on the entire country, it took so long to complete that the results are questionable. The returns from the 1963 census generated a major controversy and the data are notoriously unreliable and the 1973 census was cancelled when it looked as if there was a severely inflated accounting

of some ethnic groups. It looks as if the 1983 census will also not be undertaken. In ethnically sensitive Nigeria demography turns immediately into politics and it is the political overtones of the census exercise, more than the technical competence of the census personnel, that constitutes the greatest obstacle to having a successful census in Nigeria. The basis of the problem is that 1) inter-tribal competition is strong and 2) that regional (read, tribal) funding is allocated according to population size. Consequently, each group's interest is to over-count within it's region.

Nevertheless, the official population estimate for Nigeria in 1980 was 84.73 million. This is based on an estimate that the growth rate has been 2.5 percent per year since 1963, an underestimation of the growth rate which is probably 3.2 percent. The government projection of the 1990 population is 109 million. Population density is high--about 87 persons per $km^2$.

Besides the lack of census data, Nigeria also lacks a country-wide vital registration system. There is some registration of births and deaths in the cities but only in Lagos and Kabina province is registration complete enough to base any estimates on. Even there, events are often recorded by the month and year of registration rather than the event itself, thus making the data invalid.

If Nigeria's present rate of population growth continues the population will double by 2000. The government recognizes that the high growth rate places pressure on public services, food, etc. but believes the growth rate is satisfactory given a long-term perspective. This belief is based on the argument that short-term difficulties are outweighed by benefits of a large population which will be needed to absorb oil revenues by creating markets and supplying labor. The total fertility rate of 6.9 children per woman and the crude birth rate of

50.2 per 1,000 places Nigerian fertility among the highest in the world. The government considers these rates satisfactory although there is some concern with health implications of high fertility--short birth spacing, high infant and maternal mortality, and malnutrition. Family planning is conceived of as a health program rather than a population limitation program. Voluntary sterilization is legal but abortion is severely restricted.

Mortality remains fairly high in the country; the crude death rate is probably about 23 per thousand and has declined moderately in the past decade. Infant mortality rates vary from a high of 178 per thousand in rural areas to 79 per thousand in Lagos. The government considers levels of mortality and morbidity to be serious problems and has ambitious goals to improve health care to all citizens.

Although four-fifths of Nigerians live in rural areas, the country is urbanizing at a rate of about 5.5 percent per year. The dominant migration flows are from the north to the south and from the east to the west as rural migrants move to industrial areas around Lagos and other coastal cities which have been growing at over 10 percent per year. However, state capitals and local government headquarters are also growing rapidly. To change this population distribution the government has begun developing a new national capital, Abuja, in a remote rural area in central Nigeria. The main aim is to slow down the growth of Greater Lagos, one of the most congested cities in Africa. The government has also begun a policy of rural development designed to rejuvenate rural areas in hopes of both increasing agricultural production and stemming rural out-migration. Land settlement and colonization schemes are also underway, though they have not shown great success.

Just as in internal migration, there are no real statistics on the magnitude and flow of international migration. The country has experienced a moderate

"brain drain" and there are many foreigners--especially Americans, English and Lebanese in the country primarily serving managers and foremen of industries. Nigeria also has experienced immigration from Chad, Niger and Ghana.

Rapid population growth and lack of data on population movement and distribution have created serious difficulties in providing education and health services to Nigerians. The following sections describe educational and health conditions in the country and the government policies concerning these.

2. Education

Perhaps Nigerias' most important investment in the 1970's and 80's has been the introduction and extension of the free universal primary education program which in turn required a drastic expansion of opportunities for secondary, teacher training, and college education. The increase in school attendance at all levels has been phenomenal; primary school enrollment went up from about 3 1/2m in 1970 to over 10m now. In 1980 federal educational expenditures were 14.3 percent of total government expenditures, the largest single item. Even so, facilities are grossly inadequate. For example, Adewuyi cites that out of the 99,000 pupils qualified for admission into secondary schools in Oyo State in 1978, only 25,000 could be offered admission due to shortages of space, supplies and teachers. Universities must turn away thousands of candidates each year, as well.

With literacy at only 25 percent nationwide, education is crucial to Nigeria's development. The education-related objectives of the government include:

1) expansion of facilities to provide access to education throughout the country,
2) reform of the content of general education in line with the country's socio-economic needs,
3) improvement in the efficiency of educational financing, and

4) promotion of technical education and consolidation of higher education to meet the nation's growing demand for skilled manpower.

Indeed, the state governments have established hundreds of new primary schools and the federal government, at least 6 new universities since 1976. However, there is a severe shortage of qualified teachers, and there are large regional disparities in enrollment rates. The government is working with UNESCO advisors on developing curricula for technical, agricultural, and teacher training. There is an urgent need to develop estimates of future manpower requirements.

3. Health and Family Planning

The health status of most Nigerians is poor. It is estimated that the crude death rate is 23 per thousand and the infant mortality rate 150-175 per thousand live births. More than half of all children die before the age of six with the greatest risk under one year of age. Life expectancy is around 41 years.

Data regarding the leading causes of morbidity and mortality are unreliable. Those available are from hospitals and thus reflect unknown biases since many illnesses and deaths take place without any hospital contact. Nineteen-seventy statistics show the leading causes of illness to be malaria, dysentery, gonorrhea, pneumonia, measles and tuberculosis. Infectious disease alone, or with malnutrition, accounted for more than 70 percent of all morbidity. Infants and children accounted for more than 80 percent of cases of measles, pneumonia and diarrhea and half of the malaria, tetanus, and meningitis cases. (Clearly children were more likely to be hospitalized than adults.) Malnutrition is a serious health problem but there are no good estimates of how prevalent this malady is.

Information on maternal mortality is available only in Lagos from maternal and child welfare centers where reported cases have increased from 2.5 deaths per 1,000 total live births in 1970 to 5.2 deaths in 1974. This could mean

1) that medical services are deteriorating, 2) that record keeping is improving, or 3) that more high risk mothers are using the clinics. All are probably involved; the use of centers as a last resort is on the increase and many centers are so crowded women must share beds or stay on the floor.

There is a growing incidence of infertility and subfertility, due to either veneral disease and gynecological disorders resulting mainly from non-hygenic abortions. The national health care system of Nigeria is made up of traditional healers, midwives, etc. and a growing modern sector. The system is beset with problems. There is a shortage of medical manpower and of health service facilities which is exacerbated by geographic maldistribution, particularly as most qualified personnel and services are in urban areas. The government has recognized these problems, as well as some others, including:

- poor management and utilization of health institutions
- complete lack of data on almost all aspects of health planning including manpower available and the physical state of facilities
- the virtual non-existence of health-education
- the lack of information on health status and demand for health care.

The Basic Health Services Scheme, begun in 1974, is attempting to increase delivery of preventive and curative care in the country, particularly in rural areas but has been plagued by shortages of drugs and supplies as well as cuts in the budget for clinic construction.

Family planning is conceived of as a component of maternal and child health in Nigeria and is primarily provided to help women space births, not to limit family size. What services there are, are confined to urban areas Impetus for family planning programs began in the 1950's with the first clinic opened in Lagos in 1957. In 1964 the Planned Parenthood Federation of Nigeria was formed.

Its aims are:

- to encourage the building of health and happy families
- to protect the health of mothers and children and reduce mortality by spacing births
- to help parents understand the value of having only those children for whom they can provide adequate care, housing, a good education and clothing
- to advise and help those who want children but have none

There are PPFN branches in 11 states and the government does provide small amounts of financial assistance.

E. Manpower, Employment and Income Distribution

There is little data on employment in Nigeria although the labor force is estimated to be about 32.24m with 30.9m "gainfully employed," and thus an unemployment rate of about 4.2 percent. These figures do not represent the difficulties most Nigerians have making a living, however. GNP per capita in Africa's wealthiest country is still less than $500 and income distribution is extremely skewed. Rapid urbanization and outmigration from rural areas have led to high levels of unemployment in the urban areas to the decline of the rural areas, thus cutting employment opportunities there as well. Underemployment is extremely high, both in the cities and in rural areas, although there are sometimes seasonal labor shortages in the agricultural sector. For most city or town dwellers, employment is not acquiring and maintaining a steady job; it is most often piecing together several small income generating activities to provide a living. Even so, a worker earning the minimum wage in towns can bring in over five times the cash as the average rural dweller. The labor force is growing quickly and unemployment is likely to increase despite government efforts.

To the extent that the average educational level of the population is rising, the average worker will have more skills to offer, but will also have higher expectations with regard to the quality of employment. Currently, increases in education have been just enough to encourage new job seekers to enter the modern job areas, but not enough to enable them to qualify for most jobs. The net result has been an increase in unemployment in the urban areas as well as a substantial rise in underemployment.

Nigeria has too few jobs for uneducated workers. School leavers gone to the cities seem to be most likely to be unemployed. On the other hand a major impediment to Nigeria's development is the lack of skilled personnel. The Fourth Development Plan expects that demand for skilled and semiskilled manpower, especially in the technical sectors, will exceed supply for many years to come. Basing its estimates on the "Study of Nigeria's Manpower Requirements, 1977," the plan states that the manpower shortage, as reflected in staff vacancies for most of the high and intermediate level technical jobs, is between 40 and 55 percent. Also a problem is the 15-30 percent vacancy rate in administrative jobs. The Plan estimates demand for many technical skills from land surveying accounting and presents a pessimistic picture. Probably most critical are shortages of agricultural specialists, irrigation engineers and technicians in the agricultural sector; engineers and surveyors in the construction sector, and teachers of basic and technical skills and medicine in the education sector. A rapid expansion of polytechnic schools is called for in the plan and staffing for these is crucial. Because of the gap between supply and demand of manpower the government sees it necessary to "continue to facilitate free inflow of qualified expatriate personnel, particularly in scientific and technical occupations." (West Africa, March 1981).

## II. Summary of Population/Development Issues

The previous discussion of the economy and demography of Nigeria describes central issues in the relationship between population and economic development in the country.

The major population/development issues in Nigeria today can be summarized as follows:

1. It is clear that the lack of reliable data on demographic factors such as population size, density, structure and movement combined with the lack of basic statistics on the labor force and employment, housing, health and education prevents the Nigerian government from conducting any kind of planning for social and economic development since the demand for services cannot be evaluated or projected. As the UNFPA Needs Assessment states:

> it may be stated without reservation that numbers, rates, and measures, relating to the fundamental demographic characteristics and processes in Nigeria are, at best, crude estimates subject to many qualifications but are, at worst, grossly inadequate...Thus, an overriding theme of this report is the need for better quality data in almost all areas, and for an improvement in the capability to interpret these data when they become available.

Data is also non-existent or inadequate on agriculture, industry, foreign trade, prices, public sector accounts and financial and monetary aspects of the economy. For instance, the latest report of the central bank of Nigeria on the government's accounts stated:

> At the time of writing this report (April 1981) no actual data on federal government revenue and expenditure was available for 1980: the situation as usual was worse for state governments. External trade data in respect of 1980 similarly were unavailable...the data situation has in fact continued to deteriorate rather than improve. (By the end of 1981, the data was still not available) (The Economist, January 23, 1982)

These data deficiencies have many causes. The lack of nationwide population data is largely due to political reasons, however, many of the other problems are due to lack of funds, lack of qualified personnel to collect and analyse data, lack of coordination among ministries and institutions involved, and in demography, the difficult logistics involved in surveys in the country.

2. Population growth is rapid in Nigeria but it is unclear whether the actual size of the population is a problem in the short run. On the other hand, population distribution is clearly a major issue in the country. Nigeria is already the most urban country in Africa, with 20 cities over 100,000 and 90 over 20,000. Greater Lagos is extremely crowded, unsanitary, and disease-ridden. With an urban growth rate of over 5 percent per year, the government cannot possibly provide basic services for Nigeria's cities. Costs for sanitation, housing, water supply, communication, and electricity would be phenomenal and even if the cities could be improved, it would be (as in the past) to the detriment of the rural areas where the majority of Nigerians still reside.

Clearly a contributor to urbanization is the high level of rural urban migration in the country. Migrants, as in other low income countries, tend to be young, slightly educated and male; they often end up unemployed although it is still a better investment for a rural family to send a son to the city where his odds of full-time employment are low than it is to keep him at home. The decline of rural areas and the lack of employment opportunities (and in some cases, land) "push" migrants to cities; the superior

services and jobs (created by urban-biased government policies, in part) "pull" them. As cities grow and take more funds for maintenance and expansion of services, the less will be available for investment in rural areas. It is a vicious cycle occurring in many other African countries but it is probably the most visible in Nigeria.

3. Related to outmigration from rural areas is the agricultural stagnation the country has been experiencing in the past decade. Productivity has been declining, exports decreasing. As stated earlier, Nigeria no longer exports palm oil or rubber, two of its traditional primary income-draining exports. Production of food crops such as millet, cassava, yams, etc. has also not increased as the population grew. Consequently, much of the oil money which could be spent on development programs is spent on food imports. There are food shortages and in some areas, what there is, is too expensive for low-income families. Consequently, there is a growing degree of malnutrition.

Reasons for the decline of agriculture are many: overuse of land; lack of seeds, fertilizers, machinery and credit; lack of agricultural education; inappropriate pricing mechanisms; declining soil fertility in some areas; and problems in marketing (and transporting) produce.

The government is concerned about rural decline and is instituting a number of programs for rural development, including expansion of extension services, creation of rural health clinics and schools, increased provision of credit for farmers, and establishment of cooperatives. Planners see that despite massive oil revenues,

the country's economy is still largely agricultural and its industrial/manufacturing sector which is largely made up of food, drink, tobacco and textile processing plants, relies on agricultural productivity for its growth, as well. There is an ample supply of fertile but unused or uncleared land in the country, especially in the central area. Eradication or control of the tsetse fly there would open up substantial agricultural opportunities.

4. Nigeria is a resource-rich country, has been experiencing an economic boom and is much less debt-ridden than other African countries. However, the majority of Nigerians are extremely poor, unhealthy, and uneducated. In part because of high fertility and short birth spacing, infant and maternal mortality rates are very high. Infectious disease is rampant, and in combination with malnutrition, takes its toll in high mortality rates and in lowered productivity. Poor sanitation in urban and rural areas is a primary cause of disease. Health education is practically nonexistent and family planning information and services (for purposes of maternal and child health) are only available in urban areas. Availability of health services is one of the "pull" factors in rural-urban migration. In short, health status and health services are major factors in the demography of Nigeria.

5. There are powerful pro-natal forces within Nigerian society. Beyond the religious views of Moslems (47%) and a sizeable Catholic minority, there are strong rivalries among the major tribes. Tribal size is seen as important to tribal power within the federal system of government and states are largely established

along tribal lines. Besides this, all of the groups traditionally have valued large families (the average number of children desired by women in the country is 6-8).

Since there is strong cultural pressure for having large families in Nigeria, high infant mortality leads to high fertility in order for couples to be certain that the desired number of children survive. In this way, poor health status contributes to high fertility.

Such high fertility has its own health implications and with the decline in mortality contributes to the very young (and growing younger) age structure of the population. By 200 over 50 percent of the Nigerian population will be under 15 years of age. This places a tremendous burden on health and education services which are insufficient already and on the food supply, which is declining. With such a rapid increase in the number of youth, it is unclear whether the school enrollment ratios will even remain at their current levels despite heavy government investment in education.

6. Probably the most significant constraint on Nigeria's development is the lack of trained personnel. Major industries and government ministries are chronically short-handed and routine maintenance of physical assets of all kinds is a major problem. The government is attempting to alleviate the shortage by investing heavily in education but it will take many years before the country has an adequate supply of qualified scientists, administrators, technicians, planners, or teachers. Lack of data on population and social factors makes it difficult, if not impossible to project manpower

needs in the future and thus to design an appropriate education, and training programs to help meet these needs. The government needs to have more detailed information on employment, current growth, and expected growth in each sector for any realistic manpower planning. Until this occurs, the country's human resources will be underutilized at the same time as foreign workers, technicians and managers are brought in to meet the shortage of skilled labor.

## III. Research on Population/Development Issues in Nigeria

Despite the lack of trained personnel in many other areas, Nigeria is well supplied with trained demographers, population economists and geographers and scholars of other disciplines which relate to population. The country has the largest number of demographic specialists of any African country and a long history of demographic research. The literature on population in Nigeria is extensive. In fact, even the number of published bibliographies of research on population issues in Nigeria is astounding.

### A. Institutional Research Development (derived from Okonjo, "Demographic Research and Training in Nigeria")

The Universities, as is to be expected, have been the prime movers in the field of research. This is especially so at the University of Ibadan where considerable work has been done. The need to coordinate this work and accelerate the pace at which research results were being obtained led in January 1965 to the establishment at the University of a Centre for Population Studies. Although the hopes raised by the establishment of the Centre have since then not been fully realised, work has continued in the various departments of the University.

The Department of Geography has a long interest in population mapping and distribution, urbanization and the rather neglected field of Nigerian demography--migration. Workers in the Department of Sociology have interested themselves in the socio-economic variables affecting fertility and have collaborated with the economists in work on this. They have in addition conducted a number of Knowledge, Attitude and Practice Surveys in Western Nigeria. The Ibarapa Community Health Project, designed as a teaching and research project to bring the medical student in contact with the problems of the rural environment in Nigeria, has continued to generate large quantities of research data while work in the Department of Psychiatry and Neurology as well as in the Department of Preventive and Social Medicine has given an insight into some of the demographic characteristics of selected rural communities especially their vital rates. A most welcome development was the establishment of a physical planning unit in the Nigerian Institute of Social and Economic Research (NISER) in the University. This Unit has produced a study on the geographic aspects of the distribution, growth and movement of population in Nigeria and hopes among other things to construct demographic models which would reveal the location and areal extent of the principal zones of development in terms of population statistics. NISER has also been engaged in very extensive research on the population of the area, which has had to be evacuated as a result of the formation of a lake following the damming of the River Niger at Kainji.

The University of Ife followed the lead of the University of Ibadan in setting up a special research unit on population by establishing in 1969 with the help of the Population Council, New York, a Demographic

Research and Training Unit as an independent unit in the Faculty of Social Sciences. This Unit works very closely with the Department of Sociology and Demography whose Head of Department is also the Director of the research unit. The unit has conducted a number of KAP surveys, a family planning communications survey, an age statement project and has also organized a national seminar on population problems and policies. It collaborated with the Faculty of Law in a research project which set out to investigate the impact of the 'received law' and 'marriage system' on Nigerian family life and society. It has an extensive research and training programme and serves as a clearing house for much of the work in demography at the university. The Department of Geography, like other geography departments in the country, has worked on the phenomenon of urbanisation and some of its associated problems. It has in addition attempted to evolve measures for estimating over-population as also the pressure of population of land.

In doing this, it has followed the lead of the Department of Geography of the Ahmadu Bello University, Zaria, which very early in its inception, began to make extensive studies of land use patterns and the pressure of population on land in the closely settled zones of Northern Nigeria. The department has also collaborated with the Rural Economy Research Unit of the Department of Agricultural Economics, which has interested itself not only in a series of farm management surveys spread over villages in five provinces of Northern Nigeria but also in geographical phenomena like dry-season migration in Sokoto Province. The necessity for this inter-disciplinary approach to population problems is stressed by the interest which the Institute of Administration of the University has taken in the problems of urbanisation in Kano and Zaria. In fact its work in Kano is supported by

the Greater Kano Planning Authority (GKPA) because of its practical relevance for town planning and development.

The necessity to eradicate the epidemics of small-pox, measles and cerebro-spinal meningitis, which are endemic in certain sections of Northern Nigeria has forced the Department of Community Medicine into work on population. Having decided to extend the benefits of relatively cheap preventive medicine to the generality of the population of the areas affected by these diseases, it has as a consequence had to worry for example about the effects of a very active measles and small pox eradication programme on infant mortality and population growth.

Work at the University of Lagos has understandably been on urban problems and the demographic characteristics of urban populations. The Department of Community Health has taken a lead in this work and has undertaken, in 30 randomly selected areas of the City of Lagos with a population of 15,000 persons, longitudinal studies of various demographic indices. The Faculty of Business and Social Studies on the other hand has concerned itself with the socio-economic variables which influence urbanisation and their inter-relationships with the demographic characteristics of the urban population under study.

Before the civil war, very active research on urban phenomena was being undertaken at the University of Nigeria, Nsukka, especially in the Department of Geography and its Institute of African Studies. The war interrupted this research but the Univdrsity has as a result of the disturbances in Nigeria in 1966 experienced a net in migration of persons interested in demography and population problems. As a result, research on population is much more active than before the war, most of the work

being done being in the Faculties of Social Studies and Medicine and in the Institute of African Studies.

In the Department of Economics work is going on, on population movements and the demographic characteristics of urbanisation in Nigeria. The Department of Geography has already made an intensive study of the population geography of Nsukka division and is now extending this work to other divisions and urban agglomerations in the three eastern states. The sociologists have on the other hand taken a special interest in demographic variables in their study of urban problems. The Department of Mathematics which includes a Sub-Department of Statistics has used theoretical models to estimate vital rates for all the provinces of Nigeria using material from the 1952-53 censuses. Even the Faculty of Law has a project which has examined abortion law in Nigeria with a view to suggesting its amendment. However, by far the most ambitious of all the projects under study at the University of Nigeria is that of the Institute of African Studies, which set itself the task of studying the peoples inhabiting Southeastern Nigeria and has interested itself specifically in demographic problems both of a historical and current nature. It has succeeded in harnessing the efforts of members of the Department of History in the study of migratory patterns and the migratory history of the peoples now inhabiting the region. These many and varied projects in the University have raised for years the question of communication and coordination and efforts have been made towards the establishment of a central clearing, coordinating and research unit, for which foreign assistance would be sought.

While universities have been the major setting for research, other institutions have also contributed. The Federal Office of Statistics Rural Demographic Sample Survey 1965-66 (35) provided vital rates and other

demographic information for rural Nigeria. The Lagos Ministry of Works and Planning made a social survey of Surulere, partly to assess population factors for planning. Other planning projects in Kano and Kaduna have provided the same type of data (41,87). The Family Planning Council of Nigeria (now the Planned Parenthood Federation of Nigeria) which provides funds for most of the family planning services, produces yearly reports on clinic attendance, and has a Research and Evaluation Department. The PPFN has produced a family planning film evaluated under its sponsorship (73), and a study on ways of convincing men about the benefits of family planning.

B. Some Specific Projects and findings

A listing of specific major research projects, their dates, executing and funding agencies and of any publications relating to them is attached to this paper as Appendix A. This information was consolidated by IPPF and also includes a table with data on sample sizes and population investigated. Appendix B lists other relevant major works. Smaller studies of population in development number in the hundreds and this paper will not attempt to describe these; citations to recent relevant research are contained in the reference section.

The following are research findings concerning fertility and urbanization and education cited as relevant by an IPPF evaluation of Nigerian demographic research:

1. Fertility and Urbanization

There is evidence to suggest that processes associated with modernization and urbanization may have caused some increase in fertility. Olusanya's rural migration data, his Ife-Oyo study, and Morgan's Lagos study point this out. Ekanem (26) found a differential in urban and rural fertility in the East Central State, where total fertility for the urban sample was 6,700 per 1,000 women compared to a rural sample rate of 6,285. He hypothesized that this was due to a pseudo-urbanization process whereby large segments of essentially rural residents had high fertility in the urban area. The findings of Morgan and Lucas in Lagos substantiated this proposition. Morgan (50) found a very high level of fertility among the rural migrant population in comparison to the urban. Lucas (42) implied an equalization of the sex ratio in Lagos where wives had joined husbands presumably leading to increased birth rate.

Olusanya and Ekanem suggested that the breakdown of traditional customs and practices in urban areas would increase fertility. The breaking of the

abstention taboo, a more limited breastfeeding period in combination with bottle feeding and early weaning might shorten pregnancy intervals. The higher level of polygamy in rural areas might also decrease fertility. Olusanya proposed that the progressive reduction of pregnancy wastage with better medical care in urban and some rural areas might be a main factor. Morgan estimated an average of 5.7 surviving children and 1.6 children lost (fetal and child mortality) per mother in Lagos, while in rural Nigeria 3.5 children survive and 2.1 children are lost on average. The average family size in Lagos would then be about seven children compared to slightly less than six in the rural area.

2. Fertility and Education

Though education is considered a prime force in modernization, educated mothers do not necessarily have fewer children as in Europe and America. Olusanya (Ibadan) found that educated wives had an "average size family somewhat more than that of the uneducated and largely custom-oriented ones. An explanation was found in the relatively more rapid family-building among the educated wives." (74, p. 372). His results were substantiated in some other studies, the most illuminating being that by Trevor of the Fulani-Hausa women in Sokoto. She found educated mothers had an average of 2.39 children per women while uneducated women had about 1.5 children. She believed this was due to less stable marriages among uneducated women with more time spent outside a marital relationship, pregnancy injuries due to very early marriage and child-bearing, and stricter adherence to abstention taboos.

Ohadike and Okediji disagreed with the positive relationship between education and fertility. Lucas on the other hand, believed that the lower fertility of the uneducated women was due to some of the factors producing lower rural fertility, namely, prolonged breastfeeding and poor health and

nutrition. Educated women having thrown off some of the cultural proscriptions connected with child rearing, increased their number of children.

Higher fertility of educated women was not to be expected from the studies under review, education having been positively associated with attitudes favouring smaller families, awareness of disadvantages of large families and advantages of small families, and knowledge of contraception. Olusanya believed the main reason to be lack of a small family norm. "Lack of social support for a particular innovation tends to discourage those who, by virtue of their education, have been quick in recognizing its advantages (74, p. 374). This is partially supported by some evidence from Okediji and Ogionwo, and from Lambo and Bakare. Absence of a small family norm, Olusanya believed, put guilt and pressure on the potential innovator, since sex and reproduction are only talked about between husband and wife when absolutely necessary; there may even be some guilt in the public purchasing of contraceptives, since it implies immoral behaviour in a society that places heavy emphasis on large families.

C. Research Needs: Topics, publication and funding

Nigeria is in the unusual position of having more demographic researchers than data to work with. Since nationwide statistics on population dynamics do not seem forthcoming, survey research must focus on villages, towns, and regions. Research is needed in many areas. Generally, analysis of migration has been the most neglected area of research, largely due to the methodological difficulties of such analysis. Of particular relevance for Nigeria would be studies in the determinants of migration (both rural-urban and rural-rural), the migration "cycle," the role of remittances in rural areas, the employment of migrants, and the fertility and health of migrants.

Research is also needed on fertility, health, and education issues such as:

- the role of women in the urban and rural labor force
- household consumption and expenditure patterns
- the impact of schooling on migration
- the impact of education on use of family planning
- the impact of family structure on fertility
- the relationship between education and health
- the role of credit access to migration of farmers
- the impact of changing population density on land use and productivity
- labor utilization in rural areas.

An interesting aspect of agricultural production and land use is the land tenure system in Nigeria. In many areas land is tribally or communally owned, with plots being assigned by a village leader or claimed through past use. Some economists have hypothesized that an individual farmer is less likely to invest much in long term improvements on land which does not really belong to him. This is unclear but it is clear that such farmers, since they are not legal owners of the land they work, cannot use the land as collateral for loans. The implications of the various land tenure systems on productivity, household income, and migration is an important research area.

A major problem in Nigeria is that, because of difficulties in publishing research plans or findings, much research falls through the cracks and is never utilized as a base for more study. Consequently, there is probably considerable near duplication of work. Also, because of the lack of communication and coordination among research institutes, there could easily be three or four very similar studies going on at one time with each investigator ignorant of the others. This thwarts valuable scientific dialog and is a

costly way to gather information and build theory.

The considerable research activity in Nigeria has had to be carried out with one severe constraint--the lack of a local journal in Nigeria, or in Africa for that matter, devoted solely to work in demography. This has meant that results have to be published either in overseas journals, in local journals in related fields, in monographs of the relevant university or research institute, in a house journal, as a chapter of a book or as a government report or the results read as a paper at an international conference. None of these methods is wholly satisfactory. When the decision is made to publish in an overseas journal, the prestigious Population Studies is often the choice. Alternatively a prestigious journal in an associated field like geography, sociology or anthropology is chosen. Thus articles on Nigerian demography can be found in journals like Africa, the Journal of Modern African Studies, or the Scottish Geographical Magazine. When the findings are published in a local journal this is usually done in the Nigerian Journal of Economic and Social Studies, which until 1967 was the only major Nigerian journal catering to social scientists. Articles dealing with topics which have some relationship with geography can usually be found in the Nigerian Geographical Journal.

The house journal or the monograph series of a research institute of a university has also been used for publishing. It is unsatisfactory in many respects as very often the very wide circulation necessary for a scientific dialogue is not achieved. The best known house journal as well as monograph series which serves this purpose is the proceedings of the annual conferences of the Nigerian Institute of Social and Economic Research at the University of Ibadan and its occasional monograph series. Other conference proceedings also provide vehicles for publication. The first African Population Conference

held at the University of Ibadan in January 1966 enabled a number of papers on Nigerian demography to be published in book form, as part of the proceedings of that conference. A similar venture at the University of Ife in March 1971 has brought together some 80 research papers on various aspects of Nigerian demography.

Funding for work in demography has not been as difficult in Nigeria as in other African countries. Small projects are usually financed from the research budgets of the universities or the research institutes. Governments, statutory corporations and other public bodies like town planning authorities like the Lagos Development Executive Board, the Greater Kano Planning Authority or the Town Planning Divisions of the various Ministries of Lands and Surveys have not hesitated to finance projects which deal with matters within their area of competence. Another avenue through which government funds have been chanelled into research projects has been through the University of Ibadan based Nigerian Institute of Social and Economic Research, an Institute devoted to research in applied economics which is of relevance to Nigerian planning. Projects can be submitted by individuals to the Institute, which can decide to fund them, if they fall within its research programme or prove particularly attractive scientifically. Funding usually guarantees that NISER has the first choice of rejection for publication of the findings of the investigation which usually appears in its occasional publications series. The Federal Government has also through NISER financed an impressive amount of demographic work in respect of the population which has had to be resettled as a result of the lake formed on the damming of the River Niger at Kainji.

The larger research and training projects have had to depend on outside support. Thus the Ford Foundation has supported the longitudinal studies of the Department of Community Health of the University of Lagos. The

Rockefeller Foundation in turn made the founding of the University of Ibadan Centre for Population Studies possible with a handsome grant. At Ife, the Population Council has been active giving both technical and financial assistance to the Demographic Research and Training Unit, while Ahmadu Bello University has had the programmes of its Research Unit in the Department of Agricultural Economics supported by the Ford Foundation. The Nigerian Family Planning Council has also had support from the Ford Foundation, the United States Agency for International Development and the International Planned Parenthood Federation.

D. Research Capabilities and Current Activities

Nigeria has some of the strongest institutions and least trained staff for demographic research in all of Africa. As can be deduced from sections A and B, there are a number of universities with demographic research interest and experience. There are also government agencies as well as private foundations with research capabilities. The 1980 UNFPA Needs Assessment is the best published source for information regarding current research and research capabilities within these institutions. The following information comes from this source.

1. The University of Ibadan

The University of Ibadan is the country's oldest and has a long-standing tradition of research excellence in many fields. Population-related research has been accomplished in many departments including Sociology, Geography and Economics. In addition, the Nigerian Institute of Social and Economic Research (NISER) is located in the Ibadan campus. Perhaps most importantly, there is considerable cross-fertilization of research ideas across departments and co-authorship between researchers in the different departments is not uncommon.

Historically, the Department of Sociology placed the emphasis on demographic research in the 1960's focusing on the inter-relationships between social and psychological variables and fertility. Over the past few years, the Department, in collaboration with the Australian National University, and under the auspices of the Population Council (U.S.), has been involved in the Nigerian component of the "Changing African Family Project", a cross-cultural research project focusing on the potential determinants of fertility change in Africa. In addition, over the last few years, staff members in sociology have engaged in limited research on family planning knowledge, attitude, and practice as well as on the determinants of migration. Current research interests includes research on the occupational status of women, the characteristics of women in industry, breast feeding practices among urban women in Ibadan, as well as women's roles and male methods and dominance of fertility control.

At present, the Department of Sociology includes several faculty members including the department head with research and teaching interests in population. Undergraduate teaching in population is extensive with six courses offered as part of the social science curriculum. The courses include demographic techniques, population development and planning, population dynamics in Africa, and demographic aspects of the labour force. A graduate programme in demography is available but currently includes no students.

There is also some interest in population research in the Departments of Economics, Geography, and Preventive and Social Medicine although not to the same extent as in Sociology. The Department of Geography includes researchers who have done a significant portion of the pioneering work in urbanization and migration in tropical Africa. At present, there is considerable interest in examining the dynamics of migration patterns of the Ibadan area, a study currently constrained by lack of funds. Research in the Department of Preventive and Social Medicine includes a re-evaluation of the basic data from the 1965-1966 Rural Demographic Survey.

While there is currently no demographic research being undertaken within the Department of Economics, economic studies with an important demographic component abound within the Nigerian Institute for Social and Economic Research. The NISER, which is a research arm of the Federal government, gives considerable emphasis to manpower-related research. At present, there are two demographers on the staff. Priority research for the 1979-1981 period includes studies on child spacing patterns and differentials, the dynamics of the labour force, and the educational and training content of manpower requirements in the economy.

Aside from the specific research interests indicated above, there is a strong inter-disciplinary desire within the social science and NISER staff members to establish a population laboratory for Oyo State under the auspices of the social science faculty. This laboratory would provide the basic social, economic and demographic data needed not only for the construction of basic demographic indicators, but in addition, for a wide range of research on the relationship between demographic and socio-economic factors. At present, the major impediments to effectively utilizing demographic resources at Ibadan are the limited funds for small-scale research projects (with no internal university funds currently available) and the fact that the University's computer is often inoperative and is in need of spare parts. The research community in Ibadan is in the incongruous situation of having considerable research talent but limited capability for completing research because of these severe financial, computer and programming constraints.

## 4. The University of Ife (Ile-Ife)

The University of Ife may be considered as the principal training ground for new demographers at the undergraduate level in Nigeria. Its population programme, initiated with the assistance of the Population Council (U.S.) in 1969, is centered in the Department of Demography and Social Statistics, and leads to a bachelors degree in demography. At present this department has seven faculty members with two additional prospective staff members studying overseas for Ph.D's in Demography. Expansion of the programme is currently under way with a planned objective of producing about 15 graduates a year. The programme includes courses such as Introduction to population study, Sources of data, and data evaluation, as well as dissertation requirements. Students also should take courses in related disciplines.

The research programme is far-reaching with a strong emphasis on migration-related research, and mortality as well as work on the labour force and manpower. In recent years, a major research effort of the Department, which at that time existed as the Institute of Population and Manpower Studies, was a national survey on Fertility, Family, and Family Planning, which has produced several research publications. In addition, the former Institute carried out research concerning family planning and has sponsored several seminars including one on population statistics in 1970, another on population policies and development (1971). Internal migration was the topic of a seminar in 1976 and, most recently, the department organized a planning session on research priorities in the area of mortality.

The University of Ife has an I.B.M. 370 computer which is operative most of the time, and generally accessible to demographic researchers. The Ife Computer Centre, to some extent, also serves researchers from the University of Ibadan whose computer problems have already been noted. There is a demography library in the department which has serious gaps, particularly with respect to the availability of demographic journals. As in Ibadan, funds for small research projects are difficult to obtain and no internal funds for research are available. This has made it difficult for researchers to hire research assistants or programmers.

Another severe constraint is a shortage of funds for actually printing research papers which have been completed. This problem is a source of frustration among researchers at several universities in Nigeria. Because of the recent escalation in printing costs, research undertaken two, three and four years ago is systematically under-budgeted if budgeted at all, for printing and reproduction costs. As a result, a substantial proportion of recently completed demographic research in Nigeria cannot be widely disseminated.

Aside from the Department of Demography, there also is a relevant research interest in the Departments of Geography, Economics and Agricultural Economics. Staff members in the latter department have researched extensively the relationship between migration and various economic factors. The research includes an assessment of the socio-economic implications of migration on rural areas.

3. The University of Lagos

The teaching of demography at the University of Lagos consists of year-long undergraduate courses in the Departments of Economics and Sociology, and two graduate courses in the Sociology Department. At present, there are two demographers in the Department of Sociology, one of whom is the Dean of the Social Science Faculty and the other is temporarily on study leave overseas. The Department of Economics has a visiting U.N. expert in economic demography and two staff counterparts who are studying overseas for their Ph.D. There is also one demographer in the Geography Department and one newly-arrived demographer in the Human Resources Research Unit.

The research orientation of the demographers is quite heterogeneous, running the gamut from basic demographic research to policy oriented research in the manpower and education field. Population related research has been mostly concentrated in the Human Resources Research Unit, an interdisciplinary research unit within the Faculty of Social Sciences. This unit, founded in 1965, was until recently supported by funds and technical assistance from the Population Council. Its population-related research over the years includes rural demographic surveys in several locations throughout Nigeria, a number of topics on the relationship between population, school enrollment requirements, and educational "wastage", and on manpower, employment, migration, and social conditions in the Lagos metropolitan area. Current and recent research in the unit includes a health and demographic study, studies on labour mobility, the economic cost of having and raising children in Nigeria, employment-related research, particularly relating to the informal sector in Lagos, and the relationship between polygyny and fertility. The unit includes several full time staff members with demographic interests as well as a number of assistants who also have affiliations with other departments.

Staff members in the Department of Sociology are also involved in demographic research. The research interest of the Dean is centred on the basic demographic trends, patterns and inter-relationships. Another staff member is a demographer who has concentrated on the areas of divorce and working life. In the Department of Economics, there is ongoing research on the relationship between family structure and family decision making. Finally, a demographer within the Department of Geography, has researched the impact of breast feeding on fertility within the Lagos metropolitan area.

The problems in carrying out research at Lagos are quite similar to those already noted for the other universities. Computer availability is difficult and in the case of Lagos, there also are bureaucratic constraints related to access to a computer. A major problem is a virtual lack of funds for the printing and dissemination of research already completed. In this instance, a relatively small sum of money would result in the dissemination of a considerable amount of research findings.

4. Other universities

The University of Nigeria (Nsukka) and Ahmadu Bello University in Zaria are two "older" universities in which population-related research and teaching activities have diminished in recent years. Both these universities received considerable outside assistance in the development of population programmes in the early and mid-1970s. At Nsukka, only one optional demography course is offered, although there are several faculty members, primarily in economics, with demographic expertise. Research interests include manpower problems and research on the value of children, and age at marriage. Little active research is under way.

Ahmadu Bello University offers three population courses at the undergraduate level within the Department of Geography. Whereas there was an active research programme in the early 1970s under Population Council auspices, the data collected have never been published or generally disseminated. There apparently is no current demographic research.

The principal demographic focus of the newer universities has been on the teaching of demography at the undergraduate level. The University of Ilorin has two undergraduate courses in population in the Geography Department. Because it is one of the newer universities, internal funds are made available for small research projects. A study on knowledge, attitudes and practices of contraception in the Ilorin area has been completed and a study focusing on rural out-migration is under way. There is a need for funds for training young graduates abroad, an important mechanism for assuring future staff for the university.

A demographic teaching programme at the University of Jos is provided by the Department of Geography. There are three staff members, including the department head, with demographic training, who offer two population courses at the undergraduate level and three courses at the graduate level. While research funds are available from the University, there is as yet no significant discernible demographic research activity.

The University of Benin has staff members in several departments with interests in demographic research including the topics of urbanization, mortality, and migration. The University of Port Harcourt has one demographer in the School of Social Sciences, who is involved in research on fertility and family planning in the area including the old East Central State. Calabar University, established as a separate institution in 1977, has two faculty members with demographic interests in the Faculty of Social Sciences.

The Bayero University in Kano was also founded in 1977 and is thus also at a relatively early stage of institutional development. Because of its newness, the structure of the University is still fluid and the potential for instituting population-related activities is considerable. The location of the University makes it a candidate for consideration as a population-research centre from the northern part of Nigeria. It is located in the principal transportation and communication centre for all of northern Nigeria and, in addition, is perhaps the cultural centre for the Nigerian Muslim Community

At present the Bayero University offers population courses at the undergraduate level through the Departments of Sociology and Geography. The only demographer on the staff is in the Department of Sociology, although there are faculty members in the Department of Geography with interests in population research and teaching. It is anticipated that a masters programme to be shortly instituted in sociology and geography will allow for a specialization in population studies. Current population research include projects on the fertility of migrants in Kano and education and on social change in the same city.

It is generally acknowledged that the northern areas of Nigeria have been neglected when it comes to demographic research. Most generalizations with regard to the population of Nigeria are uncertain because of these serious data gaps. For this reason, consideration should be given to the development of a small interdisciplinary population unit within the social sciences faculty of Bayero University. It is anticipated that the university will have a fully operative computer within the next year and a computer services director is already on staff in anticipation of this event. Funds for the development of a population library are urgently needed and, during the first years of the existence of such a population unit, outside technical assistance (a resident demographer) would be required. There is considerable interest in such an institucional development among all the department levels within the Faculty of Social and Managerial Sciences. Most importantly, the acting Vice Chancellor enthusiastically supports such a project.

## B. Government-based research activity

The principal government activity in the demographic area has been data collection. Analytical work has consisted of preliminary analysis of the data collected or else tabular results published with brief descriptions, geared towards government programme and policy implication. The major government demographic research has been the analysis of the 1963 Census and the 1965-1966 Rural Demographic Survey. Also, on a fairly regular basis, Lagos State has issued reports analysing the vital registration and health statistics for the State.

The National Manpower Board has over the years issued reports relating to manpower supply and requirements. There have also been studies focussing on wage levels in the private sector and employment expenses of recent school leavers. More recently, there have been several surveys focussing on the characteristics of the labour force which have been only partially analyzed. In this regard, the Manpower Board is collaborating with several universities in order to maximize the utilization of these data sets.

With the placing of the responsibility for demographic data collection and analysis with the newly formed National Population Bureau, prospects for a more effective utilization of government collected data appear good. It is planned that a national demographic survey, and the fieldwork for the Nigerian component of the World Fertility Survey programme, will soon be carried out. It is anticipated that much of the analysis for these surveys will be carried out by the demographic analysis unit of the Bureau. Experiences in other countries suggests that the research wing of the Bureau should be exempted as much as possible from the day to day administrative tasks of the Bureau. Otherwise, the constant pressure of these day to day activities will act as a constraint on the ability of the research staff effectively to accomplish their mission.

Other current data collection procedures of the Bureau include the collection and preparation of data on international migration in and out of Nigeria, passport statistics, education statistics, and ultimately, vital statistics. Presumably, as time permits, the Bureau will prepare reports based on those data sets.

The strength of the Bureau is, first of all, the large cadre of demographers on its staff. The Bureau also has an operative IBM 370 computer, and a direct line responsibility to the National Population Commission. Its weakness include the gross inadequacy of the library, the limited time of the staff for in-depth research and, as of now, the lack of an effective mechanism for the publication and dissemination of information. It is recommended that the Bureau should consider developing strong ties with demographic researchers throughout the Nigerian academic world with a view to encouraging these researchers to analyze demographic data as it becomes available. The Bureau also is in an optimum location for acting as a clearinghouse for Nigerian demographic research. On a quid pro quo basis, the Bureau could take on the role of publicizing demographic research completed within the academic community in turn for a guarantee that researchers send the Bureau copies of all their completed research papers as well as details about their data sets. (For additional information about the Bureau, see: paras. 68-72.)

## C. Other organizational frames and requirements

There are several other activities concerning population research in Nigeria, which need to be mentioned, because their actions can directly affect either positively or negatively, the research capability of the government and the academic research community.

The recently inaugurated Population Association of Nigeria (PAN) could be a catalyst for the implementation of mechanisms for at least partially resolving some of the constraints to research noted in this chapter. This association, which currently includes about fifty members more or less evenly distributed between the academic and government employees was scheduled to

held in April 1980, its inaugural conference in Benin City on the theme: "Population Data Assessment in Nigeria". The meeting included sessions on the role of population experts in national development plans, population census data, vital statistics, demographic sample surveys, population policy and population and development planning. In the years ahead, this association could fill several important needs aside from the obvious one of "lobbying" the government for increased funds and data for research in the population area. It could assist in the evaluation of proposals for demographic research submitted for funding both internally and by international organizations and, perhaps most importantly, help structure the priorities for demographic data collection and research within the country.

## REFERENCES


Adepoju, Aderanti. 1977. "Demographic and Socio-Economic Considerations in the Development of Migration Policy in Nigeria." Legon, Ghana: Population Dynamics Programme, University of Ghana.

_____. February 1977. "Migration, Agricultural Activity and Socio-Economic Change in Ife Division of South-West Nigeria." Dakar, Senegal: U.N. African Institute for Economic Development and Planning.

Adewuyi, Alfred A. 1978. "Population Growth and Economic Development in Nigeria," Nigerian Behavioral Sciences Journal 1(1):39-47.

Andoh, Emmanuel Kenneth. January 1980. "Response Variability in African Demographic Survey Data: A Case Study of a Nigerian Village," Philadephia, Pa.: University of Pennsylvania, Population Studies Center.

Bamezon-Toulan, Didi. November 6, 1981. A trip report on a visit to Nigeria September 28-October 4, 1981 for the Research Triangle Institute, 10 pp.

Fapohunda, Olanreqaju J., and Frank Mott. 1974. Projections of School Enrollments in Nigeria 1970-1990 and Their Manpower Implications. Lagos, Nigeria: University of Lagos.

Igun, Adenola A. March 6, 1976. "Planning Without Facts (The Tragedy of Development Projects Failure in Nigeria)." 37 pp.

Ilori, Felicia Adedoyim. 1977. "Urbanization and Fertility: A Case Study of Western Nigeria." Legon, Ghana: Population Dynamics Programme, University of Ghana.

Kraus, Jon. March 1982. "Nigeria Under Shagari," Current History, Pp. 106-110, 136.

Lucas, David. July 1974. "Some Aspects of Marriage, Fertility, and Migration Among Women in Lagos." Research Bulletin No. 3/001, University of Lagos, Human Resources Research Unit. Research Project 3. Occupation, Marriage and Fertility Among Nigerian Women in Lagos.

McWilliam, John, and Chukwudum Uche. May 1976. Nigeria: Selected Studies. London: International Planned Parenthood Federation.

Mott, Frank L. April 1976. "Some Aspects of Health Care in Rural Nigeria," Studies in Family Planning 7(4):109-114.

"Nigeria." May-June 1982. Africa Report. P. 27.

"Nigeria, The Most African Country." January 23, 1982. The Economist.

Nigeria: Options for Long-Term Development. 1974. A World bank Country Economic Report. Baltimore: The Johns Hopkins Unviersity Press.

"1. The Nigerian Government and Population Planning," p. 8. March 22, 1976. In U.S. Development Aid Programs in West Africa. Washington: U.S. Government Printing Office.

"Nigeria's budget: blueprit for the future," African Business, p. 17. February 1981.

"Nigeria's Fourth National Development Plan," West Africa.

Norman, David W. April 1974. Inter-Disciplinary Research on Rural Development. OLC Paper No. 6. Washington, D.C.: Overseas Liaison Committee, American Council on Education.

Okediji, Francis O. 1974. "Socio-Economic and Demographic Aspects of Nigeria's Second National Development Plan, 1970-74," pp. 435-447. In Population in African Development (ed. by Pl Cantrelle, et al.). Belgium: Ordina Editions.

Okediji, Francis Olu, John Caldwell, Pat Caldwell, and Helen Ware. May 1976. "The Changing African Family Project: A Report with Speical Reference to the Nigerian Segment," Studies in Family Planning 7(5):126-136.

Okonjo, Chukuka. November 5, 1971. "Demographic Research and Training in Nigeria." 16 pp. A paper prepared for the African Population Conference, Accra, Ghana, December 9-18, 1971.

Oyedipe, F.P.A. April 1977. "Interrelated Changes in the Productive Activities and Demographic Characteristics of an African Population: A Study of trhe Impact of the Kainji Dam (Nigeria)." Dakar, Senegal: U.N. African Institute for Economic Development and Planning.

Stamper, B. Maxwell. 1977. Population and Planning in Developing Nations, A Review of Sixty Development Plans for the 1970s. New York: The Population Council.

Stillman, Dave. September 25, 1972. "Ideas on Manpower Studies at University of Ife, Nigeria, by Igun under USA-II," memorandum to Betty Cogswell.

Uche, Chukwudum. 1977. "Nigeria's Population Policy: An Introductory Guide." Legon, Ghana: Population Dynamics Programme, University of Ghana. (P. 5).

U.N. Fund for Population Activities. 1980. Nigeria, Report of Mission on Needs Assessment for Population Assistance. New York: UNFPA.

The World Bank. 1981. Accelerated Development in Sub-Saharan Africa. Washington, D.C.: The World Bank.

## APPENDIX A: LISTING AND CLASSIFICATION OF MAJOR RESEARCH PROJECTS IN NIGERIA*

Table I: Projects and Funding Sources

Table II: Research Methods Used

Table III: Vital Rates Given in Selected Research Projects

Bibliography/Citations of Publications of Project Results

* McWilliam, John, and Chukwudum Uche. May 1976. Nigeria: Selected Studies. London: International Planned Parenthood Federation.

## Table I: Projects and Funding Sources

| Study and Date | Disciplinary Emphasis | Study Area | Research Institution | Financing or Executing Agency | Bibliography Reference Number |
|---|---|---|---|---|---|
| Nicol (1954-58) | 1, 5 | North and East States | Federal Medical Dept | | 59 |
| Chudike (1964) | 1, 3 | Lagos City | | | 63-65 |
| Okediji (1966) | 3, 2, 1 | Ibadan | NISER | Rockefeller NISER | 67-72 |
| Lusanya : Ibadan (1969) | 1, 3, 2 | Ibadan | NISER | NISER | 74 |
| Lusanya : Ife-[illegible] (1966) | 1, 3, 2 | Ife and Oyo | NISER | NISER | 75, 79-84 |
| Lusanya : Rural Migration (1967) | 1, 9 | Western State | NISER | NISER | 78, 80, 85 |
| Rural Demographic Sample Survey (1965-66) | 1, 9 | Nation-wide | FOS | Nigerian Government | 55 |
| Caldwell and Wright (1964) | 2 | Lagos & North Central State | Community Health Dept. LU | PC | 23 |
| Caldwell and Igun (1969) | 2 | Lagos, Western, Kwara & Kano | IPMS, Ife | PC | 21 |
| Ishan Rural Family Planning Evaluation Project (1969-71) | 2, 9 | Mid-West State | IPMS, Ife | PC | 2, 6, 17, 29, 35 |
| Fertility, Family, & Family Planning Survey (1971-73) | 1, 2, 3 | Nation-wide | IPMS, Ife | PC | 1-2, 26-28 30 |
| Socio-Economic Survey of Women Seeking Advice on Family Planning (1970) | 2, 3 | Nation-wide; though mainly West & Lagos States | IPMS, Ife | PC | 2 |
| Survey of Family Planning Clinics (1970) | | as above | IPMS, Ife | PC | 2 |
| Hartfield (1965-68) | 4, 5 | Western State | Wesley Guild Hosp.Ilesha | IPPF | 32-33 |
| Akinla (1966) | 4 | Lagos | LUTH | FPCN | 12 |
| Akingba and Gbamgbo (1963-67) | 5, 4 | Lagos | Dept.Ob. & Gyn. LUTH | FPCN | 11 |
| Akinla and Adayemi (1963-67) | 5 | Lagos | LUTH | WHO | 16 |

Table I (continued)

| Study and Date | Disciplinary Emphasis | Study Area | Research Institution | Financing or Executing Agency | Bibliography Reference Number |
|---|---|---|---|---|---|
| Gbaja Family Health Nurses' Project (1967-72) | 2, 5 | Lagos | Community Health, LUTH & Johns Hopkins | US AID | 36, 89 |
| Lagos Family Health Project (1967-68) (Morgan) | 9, 1, 2, 5 | Lagos | Community Health, LUTH | Ford; IPPF; L.U. Med. College | 47-51 |
| Sokoto Family Health Project (1973) | 9, 1, 2, 5 | Sokoto, N.W.State | Inst. of Child Health, LU | Fed.Government, Pathfinder | 86 |
| Trevor (1971) | 3 | Sokoto | Exeter UK & ABU | Carnegie; Ford; PC | 88 |
| Lambo and Bakare (1971) | 8 | Western State | BSRU, UI | | 18-19, 3[illegible] |
| Okediji and Ogionwo (1971) | 7, 8 | Western State | Sociology UI | IPPF; FPCN | 73 |
| Lucas (1973) | 1, 9 | Lagos | HRRU, LU | PC | 42 |
| HRRU Research Project 2: Population, Employment & Living Conditions in Lagos (1972) | 9, 6 | Lagos | HRRU, LU | PC | 34 |

**Codes**

1 Fertility
2 KAP
3 Sociology
4 Medical (Clinical)
5 Medical Sociology
6 Economics
7 Population Education
8 Psychology
9 General demographic orientation

**Abbreviations**

ABU - Ahmadu Bello University
BSRU - Behavioural Sciences Research Unit
FOS - Federal Office of Statistics
FPCN - Family Planning Council of Nigeria
HRRU - Human Resources Research Unit
IPMS* - Institute of Population and Manpower Studies, University of Ife
LU - Lagos University
LUTH - Lagos University Teaching Hospital
NISER - Nigerian Institute of Social and Economic Research, UI
PC - The Population Council, New York
UI - University of Ibadan

*Department of Demography and Social Statistics since 1975.

Table II Research Methods

| Projects | Population | Sample Size | Sample Plan | Data Collection | Evaluation |
|---|---|---|---|---|---|
| Rural Demographic Sample Survey | Rural population | 1st round 337,520 | 3-round survey of 204 villages selected on basis of '63 census, stratified by agricultural characteristics; enumeration of all households in villages | Basic demographic data by formal census-type questionnaire | Vital rates; life table |
| Caldwell and Igun | Men over 15 yrs.<br>Women over 15 yrs. | 4,200<br>4,200 | Multi-stage; stratified random sample of 22 areas; quota sample for respondents | Formal interview; 23 KAP questions | Cross-tabulation |
| Fertility, Family and Family Planning Survey | Currently married women below 50 yrs.& husbands | Western 3,013 h'hold<br>Eastern 1,731 h'hold<br>Northern 4,300 h'hold | Multi-stage; stratified random sample of cities, towns, rural; systematic selection of households; no. of respondents not yet known | Formal interview; 3 KAP questionnaires for h'holds & couples | Not yet fully evaluated |
| Nicol | Northern Nigeria (rural) | 594 | Full enumeration of 6 villages in probability sample | Food consumption and demographic questionnaire | Vital rates: ratios |
| Olusanya's Rural Migration Study | Ever married Women | 689 | Total coverage of 5 villages; probability sample in Western State | Formal interview; 3 questionnaires for household head & women ever-married | Cross-tabulation |
| Ishan Rural Family Planning Evaluation Project | Currently married women 15-44 yrs. | Rounds<br>1st 5,278<br>2nd 5,183<br>3rd 1,500<br>4th 1,500 | Multi-stage; stratified selection of clans; quota sample for respondents; Sample plan same for first 2 rounds, but altered for Last 2 | Formal interview; KAP & fertility questionnaire | Frequencies; cross-tabulation, means, no final report yet |

Table II Research Methods (continued)

| Projects | Population | Sample Size | Sample Plan | Data Collection | Evaluation |
|---|---|---|---|---|---|
| Ohadike | Currently married women | 596 | Random Sample | Formal interview | Frequencies; cross-tabulations; means |
| Daramola | Mothers in Surulere Lagos<br>Mothers attending health clinics | 642<br>319 | One random sample; three probability samples | Formal interview; KAP questions | Frequencies |
| Morgan (Lagos Family Health Project) | Population of Lagos<br>Married Women 15-49 years | Rounds<br>1st 13,141<br>2nd 12,886<br>3rd 13,026 | Multi-stage; random cluster sample 3 rounds; full population enumeration; sub-samples drawn randomly from 30 sample blocks | Formal interviews, household data, health statistics<br>KAP sub-study | Frequencies; chi square; correction factors; vital rates |
| HHRU Research Project 2: Population, Employment & Living Conditions in Lagos | Population of Lagos | 19,709 (2,515 h'holds) | Final report will include this information; special sample drawn of employed and unemployed (N=3,459) | Formal interview | Frequencies |
| Lucas | Females 15-49 in Lagos | 1,600 | Multi-stage; random selection of areas; systematic quota sample for respondents | Formal interview | Frequencies; means |
| Okediji | Currently married women | 700 | Social area sampling; availability sample for respondents | Formal interview | Frequencies; cross-tabulations |
| Olusanya | Currently married women | 261 | Total coverage of two sub-communities | Formal interview | Frequencies; cross-tabulations |

Table I. Research Methods (continued)

| Projects | Population | Sample Size | Sample Plan | Data Collection | Evaluation |
|---|---|---|---|---|---|
| Olusanya | Currently married women | Ife 2,484<br>Oyo 2,160 | Area probability sample; towns divided into 4 primary segments of equal population size; each then divided into 10 segments, from which one was randomly chosen | Formal interview | Frequencies; rates; chi-square; cohort analysis; brass techniques |
| Trevor | Fulani-Hausa women 24-30 & 40-44 yrs. and husbands | 100 educated married women, 67 uneducated married women, 96 husbands of these women | Matched sample | Participant observation; interviews | Frequencies; cross-tabulations |
| Socio-Economic Survey of Women Seeking Advice on Family Planning | Women 15-50 yrs. attending FP clinics | 2,223 | Random sample of 30 clinics supported by FPCN | Formal interview | Frequencies; cross-tabulations |
| Hartfield | Women using Lippes loops | 400 | Availability sample | Evaluation of clinic records & follow-up | Frequencies; means; rates |
| Akinla | IUCD Acceptors | 1,147 | Full coverage of cases over 2 year period at LUTH | Evaluation of clinic records | Frequencies |
| Akingba & Gbajumo | Abortion patients 12-20 yrs. (700) | 155 | No data on how 155 patients were drawn from 700 abortion patients admitted to LUTH 1963-67 | Evaluation of clinic records | Frequencies; histogram |
| Akinla & Adadevoh | Abortion patients (656) | 158 | Availability sample from LUTH | Evaluation of clinic records | Age breakdown |
| Gbaja Family Health Clinic 1967-70 | Mothers attending Lagos clinic | 615 | Systematic random sample | Formal interview; KAP questionnaire | Frequencies |
| Gbaja Family Health Clinic 1971-72 | Mothers at GFH Clinic | 453 | Systematic random sample | Formal interview | Frequencies |
| Lambo & Bakare | Married couples in Western State | 300 | Availability sample of 3 villages; no data on sampling of respondents | 7 instruments used; formal int. | Scales; correlation matrix |
| Okediji & Ogionwo | Pop. 15 yrs. & above | 350 | Stratified proportional random sample of two villages | Census; pre & post formal interviews | Frequencies; cross-tabulations % change |

Table III Vital Rates Given in Selected Research Projects

| Project and reference number | Crude Birth Rate per 1,000 | Crude Death Rate per 1,000 | Rate of Natural Increase (%) | Gross Reproduction Rate | General Fertility Rate per 1,000 | Total Fertility Rate per 1,000 | Infant Mortality Rate per 1,000 |
|---|---|---|---|---|---|---|---|
| Nicol (59) | 56 | | | 2.57 | 205 | | 292 |
| Olusanya (80,p.368) Ife<br>Oyo | 45<br>41 | | | 2.87<br>2.60 | 166.9<br>166.2 | 5,842<br>5,277 | |
| Olusanya Rural Migration (78,p.51) | 46.3 | 15.0 | 3.13 | 2.83 | 201.1 | 5,742 | 113.9 |
| Lagos Family Health project (Lagos) (50) | 52.9 | 12.4 | 4.05 | | | | 109.2 |
| Fertility, Family and Family Planning Survey 1-2, 26-28,30<br>Ekanem's analysis of East Central State (26)<br>IPMS analysis of South-western Nigeria (30) | 50<br>52 | 19 | 3.3 | 3.2 | 200 | 6,500<br>7,200 (adjusted)<br>6,200 | |
| Nigerian Estimate from 1952 Census (78,p153) | 50.1 | 28.4 | 2.17 | | | | |
| Nigerian Estimate from 1963 Census (78,p.153) | 51.4 | 21.4 | 3.0 | | | | |
| Rural Demographic Sample Survey 1965-66 (55) | 50.2 | 26.9 | 2.33 | 2.7 | | 5,600 | 178 |

# BIBLIOGRAPHY


Acsadi, Gyorgy T.: Fertility Change and Stability in Sub-Saharan Africa: Toward a Working Hypothesis of Demographic Transition. Paper presented at the Meetings of the Population Association of America, New York, April 1974.

Acsadi, Gyorgy T., Igun, A.A., and Johnson, G.Z.: Surveys of Fertility, Family and Family Planning in Nigeria, Ile-Ife Institute of Population and Manpower Studies, Publication No. 2, University of Ife, November 1972. 306pp.

Adadevoh, B.K.: Effects of Small and Large Number of Children on the Welfare and Health of Individual Families. Micro-Case Study: Nigeria. Paper presented at the African Population Conference, Accra, Ghana, December 1971.

- (editor): Sub-Fertility and Infertility in Africa. Ibadan; The Caxton Press, 1974.

Adadevoh, B.K., and Akinla, O.: "Postabortal and Postpartum Tetanus." The Journal of Obstetrics and Gynaecology of the British Commonwealth 77(11): 1019-1023/November 1970.

Adeokun, L.A.: Problems of a Family Planning Evaluation Project in a Rural Area. Paper presented at the Seminar on Population Problems and Policy in Nigeria. Institute of Population and Manpower Studies, University of Ife, March 1971.

Adepoju, J.A.: Some Aspects of Migration and Family Relationships in South-West Nigeria. Paper presented at the Second Inter-Disciplinary Family Research Seminar, Institute of African Studies, University of Ghana, Legon, June 1972.

8 – Internal Migration in South-West Nigeria: A Demographic and Socio-Economic Study of Recent In-Migration into the Towns of Ife and Oshogbo. Ph.D. thesis, University of London, September 1973.

9 Akingba, J.B.: The Problems of Unwanted Pregnancies in Nigeria Today. Lagos: University of Lagos Press, 1971. 126pp.

10 – "The Nigerian Attitude to Unwanted Pregnancies." Journal of the Nigerian Medical Association 1(3): 179-183/July 1971.

11 Akingba, J.B., and Gbajumo, S.A.: "Procured Abortion: Counting the Cost." Journal of the Nigerian Medical Association 7(2), 17-28/April 1970.

12 Akinla, O.: "Experience with the Plastic Intra-Uterine Contraceptive Device in Lagos: Its Effectiveness, Acceptability and Safety. West African Medical Journal 17(6), 118-222/December 1966.

13 – "The Problem of Abortion in Lagos." Proceedings of the VI World Congress of Fertility and Sterility. Tel Aviv, Israel, 1968. The Israel Academy of Sciences and Humanities, Jerusalem, 1970.

14 – "Abortion in Africa." In Abortion in a Changing World, Vol.1, edited by R.E. Hall, New York. Columbia University Press, 1970.

15 – "Africa, Abortion and the Law." Nigerian Medical Journal 3(3): 128-130/July 1973.

16 Akinla, O., and Adadevoh B.: "Abortion - a Medical-Social Problem." Journal of the Nigeria Medical Association 6(3): 16-22/July 1969.

17 Arowolo, O.O.: "Preliminary Report on Rural Family Planning Evaluation Scheme 1969-70: Ishan Division, Mid-Western State of Nigeria." Institute of Population and Manpower Studies, University of Ife, (unpublished) 1970.

18 Bakare, C.G.M.: "Instrumentation Problems in the Psychological Studies of Family Planning: A Nigerian Experience." In Proceedings of the Conference on Psychology and Family Planning, edited by H.P. David, pp.105-110. Silver Springs Maryland Transnational Family Research Institute, American Institutes of Research, 1972.

19 Bakare, C.G.M. and Lambo, T.A.: "An Experimental Study of the Effects of Persuasive Communications of the Acceptance of Family Planning in a Nigerian Rural Environment." Programme of Social Science and Legal Research on Population Policy, University of Ibadan, Behavioural Science Research Unit.

20 Caldwell, J.C.: The Study of Fertility and Fertility Change in Tropical Africa. Paper presented at the Meetings of the Population Association of America, New York, April 1974.

21 Caldwell, J.C. and Igun, A.A.: "Anti-Natal Knowledge and Practice in Nigeria." In Population Growth and Economic Development in Africa, edited by S.H. Ominde and C.N. Ejiogu, pp.67-76. London, Heinemann, 1972.

22 Caldwell, J.C. and Okonjo, C. (ed): The Population of Tropical Africa, London, Longmans, 1968.

23 Daramola, T. and Wright, R., et.al.: "Survey of Attitudes in Nigeria Towards Family Planning." In The Population of Tropical Africa, edited by J.C. Caldwell and C. Okonjo. pp.401-409. London, Longmans, 1968.

24 Disease and Demographic Survey Pilot Project North-Central State, Nigeria. United States Department of Health, Education and Welfare, Public Health Centre for Disease Control, Atlanta, Georgia 30333, 1973.

25 Edozien, F.U., and Adadevoh, B.K.: The Evaluation of Family Planning Programmes: Adverse Metabolic Effects of Contraceptive Devices. Paper presented at the Seminar of Population Problems and Policy. Institute of Population and Manpower Studies, University of Ife, March 1971.

26 Ekanem, I.I.: Fertility in Eastern Nigeria. Paper presented at the Workshop on Population Dynamics Analysis Research in Africa, Lomé, 1973.

27 – "Corrélates of Fertility in Eastern Nigeria." Nigerian Journal for Social and Economic Studies (forthcoming).

28 Ekanem, I.I. and Farooq, G.: "Fertility and Mortality Conditions in Southwestern Nigeria." Institute of Population and Manpower Studies Working Papers. University of Ife, forthcoming.

29 Farooq, G. and Adeokun, L.: "Influence of a Viable Rural Family Planning Programme on Anti-Natal Knowledge and Practice: A Time Series Study of Ishan Division, 1969-1972." Institute of Population and Manpower Studies Working Papers, University of Ife, forthcoming.

30 Farooq, G., and Ekanem, I.I.: "Urban-Rural Fertility Differences and Influences for Southwestern Nigeria." Institute of Population and Manpower Studies Working Papers, University of Ife (forthcoming).

31 Galletti, R., Baldwin, K.D.S., and Dina, I.O.: Nigerian Cocoa Farmers. London, Oxford University Press, 1956.

32 Hartfield, V.J.: "The Role of Paramedical Personnel in Family Planning Programmes - With Particular Reference to Intra-Uterine Devices." Western African Medical Journal 17(6): 225-226/December 1968.

33 – "Experience with the Lippes Loop in a Provincial Hospital." West African Medical Journal 18(4) 125-135/1969.

34 Human Resources Research Unit. "Characteristics and Changes of Lagos Population, 1972." Research Bulletin 2/001, University of Lagos.

35 Igun, A.A. and Acsadi, G.T. Evaluation of the Rural Family Planning Project in Ishan: A Preliminary Report. Paper presented at the Seminar on Population Problems and Policy in Nigeria, Institute of Population and Manpower Studies, University of Ife, March 1971.

36 Institute of Child Health. Family Health Project (Gbaja Clinic). Operational Report and Project Evaluation, July 1971 - December 1972. University of Lagos.

37 Lakeru, A.A.: Abortion in Lagos - As Seen at the Lagos Island Maternity Hospital, Nigeria. Paper presented at the Conference on the Medical and Social Aspects of Abortion in Africa, Accra, Ghana, December 1973.

38 Lambo, T.A. and Bakare, C.G.M.: "The Psychological Dimensions of Fertility: An Intensive Study in Western State, Nigeria." Rural Africana 14.82-88/Spring 1971.

39 Lesi, F.E.A.: "The Incidence of Prematurity in Lagos, Nigeria." West African Medical Journal 16: 132/134 August 1967.

40 Lesi, F.E.A. and Lesi, A.O. Some Aspects of Perinatal Problems in Lagos, Nigeria. Lagos College of Medicine of the University of Lagos, 1969.

41 Lock, Max and Partners.: Kaduna, 1917, 1967 2017: A Survey and Plan of the Capital Territory for the Government of Northern Nigeria. London, Faber, 1967.

42 Lucas, D.: "Some Aspects of Marriage, Fertility, and Migration Among Women in Lagos." Research Bulletin 3, Human Resources Research Unit, University of Lagos, 1974.

43 – "A Demographic Study of a South-Eastern Ibibio Village." Research Paper 2, Human Resources Research Unit, University of Lagos, July 1974.

44 – "Ibibio/Kwale Survey." Lagos Notes and Records V:65-67/August 1974.

45 McWilliam, John.: "Preliminary Report of a Survey on Knowledge of Population and Attitudes Toward Family Formation and Family Planning of a Sample of Ahmadu Bello University Students."

46 McWilliam, John and Lucas, David.: A Survey of Nigerian Population Literature. Human Resources Research Unit, University of Lagos, 1976.

47 Morgan, R.W.: "Family Planning Acceptors in Lagos, Nigeria." Studies in Family Planning 3(9): 221-226/September 1972.

48 – "Traditional Contraceptive Techniques in Nigeria." In Culture, Natality and Family Planning edited by J.F. Marshall and S. Polgar. Carolina Population Center, University of North Carolina forthcoming.

49 – Migration as a Factor in the Acceptance of Medical Care. Paper presented at the Social Science and Medicine Third International Conference, Elsinor, 1972. Forthcoming in Social Science and Medicine.

50 Morgan, R.W. and Kannisto, V.: "A Population Dynamic Survey in Lagos, Nigeria." Social Science and Medicine 7(2): 1-30/1973.

51 Morgan, R.W. and Ransome-Kuti, O.: The Relationship Between Health Systems and Population Factors in Nigeria, Department of Community Health and Institute of Child Health, University of Lagos, forthcoming.

52 Mott, R.: "The Dynamics of Demographic Change in a Nigerian Village." Research Monograph No.2, Human Resources Research Unit, University of Lagos, July 1974.

53 – "Demographic Change and Social Policy for Nigerian Village." Research Bulletin, Human Resources Research Unit, University of Lagos, July 1974.

54 Nicol, B.M.: "Fertility and Food in Northern Nigeria" West African Medical Journal 8(1): 18-21/February 1959.

55 Rural Demographic Sample Survey 1965-1966. Federal Office of Statistics, Lagos, Nigeria. October 1968.

56 Nylander, P.P.S.: "The Significance of Secondary Amenorrhea in Nigeria." West African Medical Journal 17(6): 208-209/December 1968.

57 – "The Frequency of Twinning in A Rural Community in Western Nigeria." Annals of Human Genetics 333(1): 41-44/July 1969.

58 – "Maternal Age and Parity Distribution in Rural and Urban Communities in Western Nigeria." African Journal of Medical Sciences 1: 285-289/1970

59 – "Twinning in Nigeria." Acta Geneticae Medicae et Gemellologiae (Rome) 19(3): 457-464/1970

60 – "Ethnic Differences in Twinning in Ibadan." Journal of Biological Sciences 3(2): 151-57/April 1971.

61 – "The Incidence of Triplets and Higher Multiple Births in Some Rural and Urban Populations in Western Nigeria." Annals of Human Genetics 32:409-415/1971.

62 Ogunlesi, T.O. and Adekunle, Lola.: Igbo-Ora Infant Perinatal Morbidity and Mortality Survey - A Case Study of Record Linkage Technique in a Rural Community. Paper presented at the Inaugural Conference of the Population Association of Africa, Ibadan, May 1974.

63 Ohadike, P.O. "Normative and Attitudinal Transformation in Family Size Values and Birth Control in a Modernizing African Community." Proceedings of the 22nd Congress of the International Institute of Sociology, Rome, September, 1969.

64 – "A Demographic Note on Marriage, Family and Growth in Lagos, Nigeria." In The Population of Tropical Africa, edited by J.C. Caldwell and C. Okonjo, pp. 379-392. London, Longmans, 1968.

65 – "The Possibility of Fertility Change in Modern Africa: A West African Case." In International Population Conference 1969, Vol. 1, pp 801-811, Liege, Belgium: the International Union for the Scientific Study of Population, 1971.

66 Ojo, O.A. "The Male Factor in Infertile Marriages in Nigeria." West African Medical Journal 17(6): 210-211/December 1968.

67 Okediji, F.O.: "Some Social Psychological Aspects of Fertility Among Married Women in an African City." Nigerian Journal of Economic and Social Studies 9(1): 67-79/March 1967.

68 – "Married Women in the City of Ibadan and Family Planning." Nigerian Opinion 3(3): 177-179/1967.

69 – "Attitudes, Knowledge and Practice of Family Planning Techniques Among Married Women in the City of Ibadan." West African Medical Journal 17(6): 210-218/December 1968.

70 – "Some Social Psychological Aspects of Fertility Among Married Women in an African City: Rejoinder." Nigerian Journal of Economic and Social Studies 10(1): 125-133/1968.

71 – "Differential Fertility in an African City: Its comparative Implications for Studying Population Change in Other African Societies." In Proceedings of the Eighth International Congress of Anthropological and Ethnological Sciences 3, pp.459-465. Tokyo and Kyoto: Scientific Council of Japan, 1968.

72 – "Socio-economic Status and Differential Fertility in an African City." Journal of Developing Areas 3 339-354/1969.

73 Okediji, F.O. and Ogionwo, W.: Experiment in Population Education and Attitude Change: An Evaluation of the Film, "My Brother's Children" in two rural Nigerian Communities. Ibadan, University of Ibadan Press, 1973.

74 Olusanya, P.O.: "The Education Factor in Human Fertility: A Case study of the Residents of a Suburban Area in Ibadan, Western Nigeria." Nigerian Journal of Economic and Social Studies 9(3): 351-374/1967.

75 – Urban Fertility Patterns in Western Nigeria: A Study of Reproductive Behaviour and Some Factors Affecting it in Selected Yoruba Towns. Ph.D. thesis, University of London, 1968, 397pp.

76 Olusanya, P.O.: "The Case for a National Family Planning Programme in Nigeria." Nigerian Opinion 4(7-9): 344-346/1968.

77 - "Some Social Psychological Aspects of Fertility Among Married Women in an African City: Comments." Nigerian Journal of Economic and Social Studies 10(1): 117-123/1968.

78 - Socio-Economic Aspects of Rural-Urban Migration in Western State Ibadan, Nigerian Institute of Social and Economic Research, 1969.

79 - "Nigeria: Cultural Barriers to Family Planning Among the Yoruba." Studies in Family Planning 1(37): 13-16/1969.

80 - "Rural-Urban Fertility Differentials in Western Nigeria." Population Studies 23(3): 365-378/1969.

81 - "A Note on Some Factors Affecting the Stability of Marriage among the Yoruba of Western Nigeria." Journal of Marriage and the Family 32(1): 150-155/1970.

82 - "Status Differentials in the Fertility Attitudes of Married Women in Two Communities in Western Nigeria." Economic Development and Cultural Change 19(4): 641-651/July 1971.

83 - "Modernisation and the Level of Fertility in Western Nigeria." In Proceedings International Population Conference 1969, Vol. 1, pp. 812-840. Liege, Belgium: the International Union for the Scientific Study of Population, 1971.

84 - "The Problem of Multiple Causation in Population Analysis, with Particular Reference to the Polygamy - Fertility Hypothesis." Sociological Review 19/1971.

85 - "Urban-Rural Contacts and the Diffusion of Anti-Natal Attitudes Among a West African Peasant Group: The Case of Western Rural Nigeria." In Symposium of Implications of Population Trends for Policy Measures in West Africa edited by H.O. Addo. pp 147-156, Ghana Population Studies No. 3, Legon: Department of Sociology, University of Ghana 1972.

86 Ransome-Kuti, O.: The Family Health Clinic-Sokoto, May to November 1973, Institute of Child Health, University of Lagos, 1974.

87 Trevallion, B.A.W.: Metropolitan Kano - Report on the Twenty-Year Development Plan, 1963-1983. Kano, Newman Neame, 1966.

88 Trevor, J.: "Family Change in Sokoto: A Traditional Moslem Fulani/Hausa City." In Population Growth and Socio-Economic Change in West Africa edited by J.C. Caldwell. Chapter 10. English edition forthcoming.

89 Wellman, J.: The Gbaja Family Health Nurse Project, Lagos, Nigeria, 1967-1970: An Examination of Its Family Planning Impact. D.P.H. thesis, The Johns Hopkins University, Baltimore, Maryland, 1971. 163pp.

# Appendix B: Additional Major Research Projects

RECENT RESEARCH PROJECTS OF DIRECT RELEVANCE TO THE STUDY OF POPULATION AND FAMILY PLANNING

The table below lists research projects directly relevant to the study of population and family planning research, but not included in the report. Some have only just been undertaken or completed, so that published data on them are scarce.

| Project | Main Researchers | Research Institution |
|---|---|---|
| Western State Rural Survey (1974) | Dr. Frank Mott | Human Resources Research Unit, University of Lagos |
| Ebendo Village Study (1973) | Dr. Frank Mott | Human Resources Research Unit, University of Lagos |
| Survey of Student Ideas About their Future (1973-74) | Dr. Frank Mott | Department of Sociology, University of Lagos |
| Socio-Economic Determinants of Fertility, Family Size, and Labour Force (1973) | Dr. O. Fapohunda | Human Resources Research Unit, University of Lagos |
| Costs of Children Survey (1973) | Dr. O. Fapohunda | Human Resources Research Unit, University of Lagos |
| Ibibio-Kwale Survey (1971-72) | Dr. David Lucas | Human Resources Research Unit, University of Lagos |
| Interaction Survey (in suburban Lagos) (1972) | Dr. Margaret Peil | Department of Sociology, University of Birmingham, U.K. |
| Igbo-Ora Infants Perinatal Mortality and Morbidity Survey | Prof. T.O. Ogunlesi<br>Mrs. L. Adekunle | Faculty of Medicine, University of Ibadan |
| Internal Migration in Nigeria (1973) | Dr. Judith Harrington | University of Michigan, U.S.A.; Department of Economics, University of Ibadan |
| The Beginning of Family Limitation (1973) | Prof. F.O. Okediji<br>Prof. J.C. Caldwell<br>Dr. Helen Ware | Department of Sociology, University of Ibadan.<br>Department of Demography, Australia National Univ., Australia. |
| The Value of Children (1973) | as above | as above |
| The Achieved Small Family (1973) | as above | as above |
| Ilesha Fertility and Family Planning Project | Prof. F.O. Okediji | Department of Sociology, University of Ibadan |
| Social Influence on Population Education in Nigeria (Re-evaluation of the film, My Brother's Children) | Prof. F.O. Okediji<br>Dr. W. Ogionwo | Department of Sociology, University of Ibadan |
| The Social Organization of Family Planning in Nigeria, Special Reference to Lagos and Ibadan | Mr. Joseph Ottong | Department of Sociology, University of Ibadan (presently Mr. Ottong is in the Department of Sociology, Ahmadu Bello University) |
| Mortality Differentials and Health Facilities | Mr. Israel Orubuloye | Department of Sociology, University of Ibadan |
| Study of Rural-Urban Migration | Dr. J.A. Adepodu | Department of Demography and Social Statistics, University of Ife |
| Study of the Role, Function and Demographic Characteristics and Attitudes toward Training in Maternal Child Health and Family Planning of Indigenous Midwives in Southeastern State (1974) | Dr. I.I. Ekanem | Department of Demography and Social Statistics, University of Ife |
| Survey of Household Structure, Female Employment and Small Family Ideal, Lagos (1973) | Dr. P.O. Olusanya | Department of Sociology, University of Ife |
| 'Migrant Farmers' Survey (1974) | Dr. P.O. Olusanya | Department of Sociology, University of Ife |
| Zaria Characteristics and Fertility Survey (1972-73) | Dr. A.M. Zikry | Department of Community Medicine, Ahmadu Bello University |
| Migration Survey of Zaria (1973) | Mr. H. Knoop | Department of Sociology, Ahmadu Bello University (presently Mr. Knoop is UN demographer at CLADE, C/o UNDP, Bucharest, Romania) |
| Student Survey on Knowledge of Population and Attitudes toward Family Formation and Family Planning (1974) | Mr. John A. McWilliam | Department of Community Medicine, Ahmadu Bello University |

| Project | Main Researchers | Research Institution |
|---|---|---|
| Urban planning studies of Northeastern State (1973-) | Max Lock and Partners | Max Lock and Partners, London |
| Disease and Demographic Survey, Pilot Project North Central State (1973-) | | United States Department of Health, Education and Welfare, Public Health, Centre for Disease Control, Atlanta, Georgia |
| Infant and Child Mortality: A Sociological Study (1976) | Dr. C. Uche | Department of Demography and Social Statistics, University of Ife |
| The Next Child: Decision-making in a non-contracepting society. | Dr. L.A. Adenkun | Department of Demography and Social Statistics, University of Ife |

Source: McWilliam and Uche

Appendix C

(Code key on following page)

SUMMARY OF WORK BEING DONE IN TEACHING, TRAINING AND RESEARCH IN DEMOGRAPHY IN NIGERIA

| Institutions | Department | Teaching | Research | Training | Publications | External Research Funds |
|---|---|---|---|---|---|---|
| 1. Ahmadu Bello University | Agricultural Economics | L | D | X | S | FF |
| | Community Medicine | L | D | X | - | |
| | Economics | X | - | X | - | |
| | Geography | S | D | X | S | GKPA |
| | Inst. of Administration | X | R | X | - | |
| | Sociology | D | - | X | - | |
| 2. University of Ibadan | Agriculture | L | P | X | S | RF, FF |
| | African Studies | X | R | X | R | |
| | Centre for population Studies | X | D | X | R | RF, PC |
| | Chemical Pathology | X | D | X | S | RF, WHO |
| | Economics | D | D | D | S | |
| | Geography | D | D | X | S | |
| | Medicine | L | D | X | S | RF |
| | Nigerian Institute of Social and Economic Research (NISER) | X | D | X | S | FC, FF |
| | Political Science | L | X | X | X | |
| | Preventive & Social Medicine | S | D | X | S | |
| | Psychiatry and Neurology | X | P | X | S | WHO |
| | Sociology | D | D | X | S | |
| 3. University of Ife | African Studies | X | - | X | X | |
| | Demographic Research & Training Unit | D | D | D | S | PC |
| | Economics | D | P | X | S | FF, FC |
| | Geography | D | P | X | S | |
| | Institute of Administration | X | X | L | X | |
| | Law | X | D | X | - | |
| | Political Science | D | - | X | X | |
| | Sociology and Demography | D | D | X | S | |
| 4. University of Lagos | Community Health | L | D | D | - | FF |
| | Faculty of Business & Social Studies | L | D | X | - | |
| | Geography | L | D | X | S | |
| 5. University of Nigeria Nsukka | African Studies | X | D | X | S | |
| | Agriculture | L | D | X | S | WHO |
| | Economics | D | D | X | S | |
| | Economic Development Institute | X | D | X | R | FF |
| | Geography | D | D | X | S | MIC |
| | Home Economics | L | X | X | X | UNICEF |
| | Law | X | R | X | X | |
| | Mathematics | L | R | - | R | |
| | Medicine | L | - | - | - | |
| | Obstetrics and Gynaecology | L | - | - | - | |
| | Sociology and Anthropology | D | D | X | S | |
| 6. Institute of Technology Benin | - | - | - | - | - | |
| 7. Federal Office Demographic Division of Statistics Lagos | Demographic | X | L | D | S | UNDP |
| 8. Family planning Council, Lagos | | X | X | L | S | FF, USAID [illegible] |

## Key to the Codes

1. Teaching

D = Full demography course examined by at least one separate paper.
S = A special series of lectures on demography constituing part of a larger course and examined with this larger course.
L = Some demographic lectures or content in some course or courses.
X = No teaching Demography
– = Not known

2. Research

D = Now, or in the past, a considerable research programme on population.
P = Now, or in the past, a considerable amount of work on the distribution of population and population characteristics.
R = At least one piece of research on population
X = No research
– = Not known

3. Training

D = Considerable amount of training given, now or in the past.
L = Some training given, now or in the past
X = No training
– = Not known

4. Publications

S = Several publications
R = At least, one known publication
X = No publication
– = Not known

5. Abbreviations

| | | |
|---|---|---|
| FF | = | Ford Foundation (Has supported work at Ahmadu Bello and Lagos Universities). |
| FG | = | Federal Government of Nigeria |
| GKPA | = | Greater Kano Planning Authority, (a local government authority financing a series of projects.) |
| IPPF | = | International Planned Parenthood Federation |
| MLS | = | (Town Planning Division)Ministry of Lands and Surveys, Enugu. |
| PC | = | Population Council (Financed the Ife Demographic Research and Training Unit). |
| RK | = | Rockefeller Foundation (Financed the Centre for Population Studies, Ibadan). |
| USAID | = | United States Agency for International Development. |
| UNDP | = | United Nations Development Programme |
| UNICEF | = | United Nations Children's Fund (Has after the war supported the Department of Home Economics of the University of Nigeria). |
| WHO | = | World Health Organization. (A survey for yaws and small-pox was carried out in Nsukka under WHO direction and collected some demographic information). |

Source: Okonjo, " Demographic Research and Training in Nigeria."