

The above PHC structure for Malawi was adopted at a meeting of the Principal Secretaries on PHC held on November 29, 1989. The National PHC Committee is formed by the Principal Secretaries and Heads of NGOs from the following:

Office of the President and Cabinet (chairman), Ministry of Agriculture, Ministry of Health, Ministry of Community Services, Ministry of Works, Ministry of Education and Culture, Ministry of Local Government, Ministry of Finance, Ministry of Forestry and Natural Resources, Department of Youth and Malawi Young Pioneers, Private Hospital Association of Malawi, Malawi Red Cross Society, and Save the Children Fund of Malawi.⁶⁵

The National PHC committee orients the regional committees, which in turn orient the district teams. The district PHC staff are responsible for selecting and training the area committee members, who then train the village PHC committees and help carry out activities at the village level.

Community-based PHC activities being undertaken include: Growth monitoring of children and nutrition, immunization coverage, early treatment of diarrhea via ORS, treatment of simple illnesses such as malaria and eye infections, making compost manure, animal husbandry for income generation activities, functional literacy, protection for water wells and springs, well and latrine construction, etc.

C. Other Health Providers

a. PHAM

PHAM is a charitable non profit-making ecumenical NGO which was incorporated in 1966. The overall objective of PHAM as set out in article II of its constitution is "to develop mutual cooperation of its members in order to obtain an optimal level of health services and patient care, and in all matters to act for the benefit and welfare of the people of Malawi generally, and to facilitate cooperation between the Malawi Government and PHAM members."⁶⁶ Membership of PHAM is open to church and non-church related health care units recognized by the MOH and adhering to the objectives of the Association. The organogram of the PHAM secretariat is represented in FIG. 3-E.

PHAM brings together Roman Catholics under the Episcopal Conference of Malawi and Protestants under the Christian Council of Malawi. The two organizations are known as the mother bodies of the Association. PHAM has 16 hospitals which are comparable to MOH district hospitals, and in some cases

⁶⁵ Masanjika, John P., *A Report on Some Aspects of the Preventive Health Services of Malawi*, 1991.

⁶⁶ Ministry of Health, *Strengthening of Health Services in Malawi: Report of a study on Coordination and Collaboration between the Ministry of Health and the Private Hospital Association of Malawi*, 1992.

offer a wider scope of services, 22 rural hospitals which PHAM calls "primary health centers", 82 health centers, 20 dispensaries, 3 maternity units and 4 health posts. The health services offered by the Association are mainly curative and facility-based although more emphasis has recently been placed on preventive services and PHC. In addition, PHAM has 8 associate members which are non-religious health providers such as some agricultural estates and parastatal organizations.⁶⁷

The major PHAM hospitals include St. John's Hospital in Mzuzu of the Northern Region, Nkhoma General Hospital and Likuni Hospital in the Central Region, and Malamulo Hospital (where training of Medical Assistant and Laboratory Assistants are conducted), Mlambe Hospital, Trinity Hospital and others in the Southern Region.

PHAM hospitals account for just over one third of all in-patient admissions and for nearly half of the other health services (Tables 3-15, 3-16). PHAM facilities see about 12% of total out-patient first attendances. PHAM facilities generally charge patients for treatment except for under-fives preventive services and such communicable diseases as TB, leprosy and STDs. Around 1986, MOH contributions to PHAM income accounted for about 35%, fees 34% and overseas donations for about 30%.⁶⁸ In the 1991/92 financial year, the government grant was MK4.6 million, and on average, it contributes 38.3% of the PHAM income.⁶⁹ There is an informal arrangement between the MOH and PHAM for funding the cost of Malawian staff employed by PHAM, part of PHAM's training costs, vaccines and drugs for preventive care, cost of treatment of TB patients, seconded staff such as environmental health personnel, and transport costs for outreach U5 clinics and referral of patients to government hospitals. However, due to the limitation of funding, most PHAM units are in financial difficulties.

Currently, there is poor communication between PHAM and MOH at all levels. The MOH is not represented on the Association's Executive Committee or on any of its other committees, and there is no effective channel of communication at the central level. An attempt was made to establish a Liaison Committee but that did not last. Even among the PHAM units themselves, there is little sharing of information, ideas and experiences. Fee schedules vary for different facilities even within the same areas.

Therefore, it is not surprising that there are distortions in health service utilization with MOH services heavily utilized and PHAM units generally underutilized and relatively overstaffed (refer to Table 3-17, comparing the bed occupancy rates of MOH and PHAM hospitals). In 1990, out of total out-

⁶⁷ *ibid.*

⁶⁸ World Bank, "Staff Appraisal Report (draft)," 1986.

⁶⁹ Ministry of Health, *Strengthening of Health Services in Malawi*, 1992.

patient attendances of 11 million, 8 million (72%) visited MOH facilities whereas only 1.3 million (12%) attended PHAM facilities, although PHAM units have the capacity to treat many more patients (Table 3-18). It is not uncommon that MOH health centers refer its patients to district MOH facilities located far away, because the nearby PHAM hospitals are fee-charging. Supervision of facilities and services are also up to the individual interests of RHOs, DHOs and hospital specialists due to the lack of MOH and PHAM policies on this matter.⁷⁰

A study was done to strengthen the cooperation and coordination between the MOH and PHAM facilities to avoid the loss of valuable resources. Based on the recommendations from this study, it is hoped that standardization and integration of two systems in terms of the interventions, salary levels, training, job descriptions, staffing, etc. will take place in the coming years.

b. Local Government

Local government authorities under the Ministry of Local Government also operate health facilities. District councils operate 102 units--19 dispensaries, 76 maternity units and 9 health centers in 22 of the 24 districts of the country.⁷¹ Most health units are built adjacent to MOH facilities to complement their activities. Local authorities charge fees for their services.

With a total recurrent expenditure of about 1.3% that of MOH (based on 1981 figures), they provide poor quality services with undertrained staff and sub-standard facilities. Their revenue is partly from Treasury budget allocation and partly from fee-charging for their services. From 1991 the MOH has taken over the funding for local government health facilities except salaries. Under the support of the PHN Sector Credit of the World Bank, the MOH will help run 212 health centers of the local government.⁷²

c. Others

Other agencies, such as the army, police, estates and industries, provide curative and preventive services for their employees. There is also a small number of private practitioners, private paramedicals and nurses in the country. The work of the Government is complemented by a variety of NGOs as well, whose salaries are usually more competitive than those of the public sector.

About 5,000 TBAs and anywhere from 5,000 to 10,000 traditional healers are scattered mainly throughout the rural areas. Under the TBA training program of the Ministry, those TBAs who are well accepted in the villages are recommended for training by

⁷⁰ *ibid.*

⁷¹ World Bank, *Staff Appraisal Report*, 1991.

⁷² Masanjika, John P., *A Report on Some Aspects of the Preventive Health Services of Malawi*, 1991.

the village health committee. Unfortunately, since these experienced TBAs are from older age groups, they end up practicing for only a few years after training. The TBAs are expected to refer problem cases and to report to district health offices using pictorial checklists and recording forms, and their data are being collected and tabulated by the CHSU at the central level (see Table 3-26, more details are presented under the "Training" section).

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Tables 3-19, 3-20 and 3-21 regarding the causes of hospital admissions were included in this section to briefly illustrate morbidity patterns in Malawi as reference. The leading causes for out-patient visits are malaria, respiratory infections, symptoms related to the abdomen and gastrointestinal tract, skin conditions and accidents. Schistosomiasis and a variety of helminths are endemic. Acute infections such as pneumonia and measles, cholera and diarrhea, and chronic infections such as TB are also serious problems. STDs are common, and AIDS is spreading by epidemic proportions. Vitamin A deficiency causes blindness and iodine deficiency disorders are more widespread and severe.

D. Health Manpower

a. Health Staff

A 1988 Complement and Grading Review Report prepared by the Department of Personnel Management and Training which recommended the creation of 2,925 new professional posts to cover the immediate needs of the Health sector has been accepted by the Government.⁷³ Recent MOH projections of health manpower requirements indicate that an additional 8,500 staff would be required by 1995 to staff existing developments and improve staffing standards as recommended in the Report. However, at current rates of training intake and student dropout, only 54% of total staff requirements could be achieved by 1995, with the achievement dropping to 43% by the year 2000.⁷⁴

The ratio of one doctor to 66,000 population is the lowest anywhere in Africa and one of the lowest in the world (Table 3-22). Due to meager salaries, the spending on personnel currently accounts for only approximately 30% of the annual recurrent expenditure of the MOH in Malawi, as compared to figures of between 50-80% in other countries in the region.⁷⁵

Now, about 30 health centers are unable to open due to the lack of manpower (the ideal health institution would at minimum have one medical assistant, 2 nurses and 8 trained staff). Needless to say, the supply of health manpower need to be increased

⁷³ Government of Malawi and UNFPA, 1991.

⁷⁴ World Bank, *Staff Appraisal Report*, 1991.

⁷⁵ World Bank, "Staff Appraisal Report (draft)," 1986.

urgently at the community and first line referral levels. Training outputs must be increased, particularly for medical assistants and ENMs who form the backbone of the peripheral health services, not to mention other essential staff such as pharmaceutical and laboratory staff (refer to Table 3-23).

The reasons why such a great shortage developed over the years include the following:

- existing structure and procedures do not include adequate mechanisms for ensuring the coordination of manpower planning with overall service plans, or with decision-making on training and staff deployment/utilization;

- targets for health manpower supply are not clearly linked to health needs or based on forecasts of available financial resources, and insufficient preparation is made for the deployment of graduates following training;

- requests for increases in the number of authorized posts for the MOH are not coordinated between the different divisions nor sufficiently related to planning priorities;

- coordination of basic and in-service training is weak, and there is a lack of information on the numbers, skills and distribution of existing staff to guide manpower decision-making.⁷⁶

Some of the necessary steps to remedy the situation are already underway, such as the expansion of the Lilongwe School of Health Sciences, the schools of nursing in Blantyre and Zomba, and the Polytechnic. Measures to reduce the drop-out rates such as better career counselling, refurbished staff housing and revised curricula providing more management training are being implemented. According to the Manpower Unit of the MOH, data is being collected for a detailed manpower plan to be released in June 1992.

b. Training

The major responsibilities of manpower planning, training and deployment are divided among:

- the MOH Planning Division, which is responsible for projecting manpower requirements;
- the Clinical, Nursing and Preventive Health Services Divisions, which liaise with the relevant professional councils and training institutions with respect to basic pre-service training for their respective cadres of staff, and with hospital superintendents and DHOs to identify in-service training needs,
- the Training Division, which is responsible for administrative arrangements for training;
- the Personnel Division, which is responsible for administering the placement, conditions of service and deployment of staff.⁷⁷

⁷⁶ World Bank, *Staff Appraisal Report*, 1991.

⁷⁷ *ibid.*

The MOH policy is that all periphery health staff have to be trained to become multi-purpose workers who can perform curative and preventive activities as well as some administrative work. The idea is that PHC workers who are able to offer even the most basic help in the face of a clinical problem will be better accepted by the community in their preventive roles.

Some information about training by staff category is provided below, and the training institutions are listed in Table 3-24:

i) Medical Doctors

There are now about 200 foreign-trained doctors in Malawi: 145 under the Ministry of Health, 35 under PHAM, and around 20 in private practice. Out of all doctors, only 30 are Malawians and almost all of them are specialists. 8-10 of them are in managerial or administrative positions. Among the expatriate doctors, many are also administrators, assuming posts such as RHOs, DHOs or specialists at central hospitals. Many of them find it difficult to work at the grassroots levels as they are unfamiliar with Malawian field conditions. An estimated 1,000 Malawian doctors are working abroad, indicating the severity of brain drain.

A Medical School has been established at the University of Malawi in 1988, and the initial class of 14 students who have undergone most of their studies abroad are completing their final year in Malawi. Although they will be requested to practice in district hospitals after graduation and are expected to stay in the health system, the low levels of remuneration and little chance of career development in the public sector will either lead them eventually into private practice or to emigration.

ii) Clinical Officers and Medical Assistants

Due to the shortage of doctors, Clinical Officers and Medical Assistants are being trained to perform many of the clinical duties. According to the MOH, Clinical Officers and Medical Assistants who are trained in curative services by the MOH are operating below 50% and 25% of the projected requirement for such staff positions respectively at present. Only about 28 Clinical Officers can be trained each year at the Lilongwe School of Health Sciences, the training lasting for 4 years after secondary school. Now there are said to be about 300 of them in the country, but attrition rates are high. There are plans to bring in college graduates who majored in the sciences for practical training so as to supplement manpower.

iii) Health Inspectors

Health Inspectors are trained in a 3-year diploma course at the Polytechnic and they become employed as District Health Inspectors. They are equivalent to sanitarians and their main responsibility is environmental health.

iv) Health Assistants and Health Surveillance Assistants
Health Assistants must receive two years of training in a training institution and have established posts in the health centers. Health Surveillance Assistants are those who receive 6 weeks training and they are the most mobile members of the area health team, performing tasks such as home visits and community mobilization.

v) TBAs

Under the safe motherhood initiative, each district is expected to train at least 10 TBAs and the total target is 250 a year. To date, over 1,700 have gone through the 4-week courses which are conducted in Government and PHAM hospitals. TBA training is currently being funded by WHO, UNFPA, USAID and UNICEF.

During the training, the TBAs are given a midwifery kit, a simple color-coded spring balance to weigh the newborn babies, and some simple medication such as ORS, chloroquine and iron pills in the training course. They are taught about sterile delivery procedures, the risk factors for women during ante-natal period and in labor, post-natal care, growth monitoring, health education and other PHC concepts such as EPI and CS. The emphasis of their training is on the referral of problem cases to nearby health facilities, as well as taking records of the numbers delivered, numbers referred to the hospital, numbers of still-births and normal deliveries, total number of ante-natal women they see, etc. In the future, TBAs are expected to play an important role in the provision of selected CS methods.

The number of TBAs trained by district is shown in Table 3-25. Some of the information collected through the TBA reporting system from 1989 is presented in Table 3-26.

vi) Agricultural Extension Workers and Farm Home Assistants

The training of male Agricultural Extension Workers and female Farm Home Assistants is conducted from the Ministry of Agriculture through the staff of the Agricultural Development Divisions (ADDs). These workers can teach household food security, nutritional facts, food preparation, as well as give advice on appropriate family sizes. They give talks at U5 clinics. Currently, there are about 2,000 males and 500 females trained.

vii) Nursing professionals

In Malawi, Nursing and Midwifery are combined. According to the information from the Nurses and Midwifery Council given in Table 3-27, there are 610 Registered Nurses and 3,173 Enrolled Nurses as at 1991; however, there is no information about the number of nurses who are not active. According to the Ministry of Health, both the SRN and ENM posts have a 50-60% vacancy rate, with high attrition rates (especially in the PHAM system) both during and after training. The top reasons for the nurses leaving their positions include marriage, child-bearing and raising, career dissatisfaction, low salaries for long working hours, etc.

All nursing professionals must first pass the examinations given by the Nurses and Midwifery Council of Malawi, followed by registration with the Council, after graduating from training.

***State Registered Nurse (SRN)**

Government training of SRNs is under the University of Malawi, with one campus in Lilongwe and one in Blantyre. Currently, about 60 SRNs are trained per annum. In order to solve the shortage problem, the Government is planning to double the intake in these two schools (60 trained per campus).

Training is carried out in a 4-year diploma course. The curriculum includes 3 years of general nursing and 4th year of MCH, PHC, community-based healthcare and CS. The curriculum is presented below.

SYLLABUS FOR REGISTERED NURSE MIDWIFE PROGRAM
(DEC. 1981)

Nursing Ethics and Professionalism
Social Psychology
Anatomy and Physiology
Basic Applied Sciences
Nutrition and Dietetics
Microbiology and Parasitology
Pharmacology
Principles and Practice of Nursing
Control and Prevention of Communicable Diseases
Pediatric Nursing
Maternal Child Health/Community Health Nursing
Psychiatric Nursing
Principles of Management/Administration
Obstetrics and Midwifery

*Enrolled Nurse Midwife (ENM)

For ENMs, 80% are now being trained by 10 mission schools under the PHAM system, and the rest at the Zomba School of Nursing of the Government. The number trained per year is around 80-100. At the Zomba School, the number of trainees is targeted to be raised from 30-40 to about 70 within the year. The course is 3 years after 4 years of secondary school. ENMs are usually in charge of growth monitoring, EPI, ANC, nutrition, health education and mobile clinics. Below are the classroom and clinical syllabi.

CLASSROOM SYLLABUS FOR THE ENM PROGRAM

(FEB. 1991)

YEAR I

Introduction to Nursing and Healthcare
Introduction to Psychology/Sociology
Anatomy and Physiology
Nutrition
Microbiology and Parasitology
Communication and Counselling skills
Health Education
Physical Assessment
First Aid

YEAR II

Care of Adult and Child
Communicable Diseases
Applied Pharmacology
Control of Communicable Diseases
Care of Special Groups
Child Spacing

YEAR III

Midwifery
Reproductive Anatomy and Physiology
Antenatal Care
Labor and Postnatal care
Neonatal care
Child Spacing

CLINICAL SYLLABUS FOR THE ENM PROGRAM
(FEB 1991)

SUBJECT	MINIMUM NO. OF HOURS
Medical Nursing	360
Surgical nursing/ gynecological nursing	360
Pediatric nursing	360
Operating theater nursing	120
Out-patient and casualty nursing	120
Antenatal clinic	120
Antenatal ward	120
Labor ward	360
Postnatal ward	120
Neonatal nursing	180
Community health nursing including control of communicable diseases	240
Child Spacing	240
Total	2,700

Total: 4,050 hours

Minimum 2,700 hours clinical experience

Minimum 1,350 hours classroom experience

Source: Nursing and Midwifery Council of Malawi

For post basic training of ENMs, there are the programs in enrolled psychiatric nursing and community health nursing. Community Health Nurses are in charge of family medicine and home visits, in contrast to the Public Health Nurses who are responsible for EPI and preventive health. The Community Health Nurse curriculum is shown on the next page.

ENROLLED COMMUNITY HEALTH NURSE PROGRAM SYLLABUS
(FEB 1985)

SUBJECT	MINIMUM NO. OF HOURS
Introduction to Community Health Nursing	25
Introduction to Sociology	15
Introduction to Psychology	25
Communication	15
Nutrition	20
Community Health Nursing ^a	100
Child Spacing ^b	12 weeks
Mental Health and Psychiatric Nursing	20
Health Education	20
Introduction to Epidemiology	20
Control of Specific Communicable and Non-communicable diseases	20
Teaching and Management	20
Total	2,700

a. Includes Occupational Health, Environmental Health, physical assessment of clients, post-partum examination, home visiting, nutrition, etc.

b. Includes insertion and removal of IUDs.

Source: Nursing and Midwifery Council of Malawi

c. Refresher Training

Under the PHAM system, there are refresher courses and retraining in the hospitals (in-service education). The plan for 1991 was to conduct one workshop for nurses for each region, 3 refresher courses each year, but there was no funding available. In general, the nurses as well as other health staff (such as TBAs) receive retraining from time to time on new subjects such as MCH/CS, HIV prevention and safe motherhood.

4. POPULATION AND CHILD SPACING PROGRAM'

A. Policies and Strategies of the On-going CS Program

a. Policies and Strategies

i) Population Programs: Background and Policies

The Government of Malawi has not formulated any explicit population policy. It has taken the view that decision on family size is solely the responsibility of individual families and couples. In recent years, however, the Government has shown a growing concern over population-related issues and has begun to pay attention to the relationship between population growth and the socioeconomic development that is required to improve the welfare and living standards of its people.

Out of the Government's concern for the rapid rate of population growth in Malawi and its impact on development, they accepted the recommendations of the 1984 World Bank Population Sector Review mission. These included: 1) to establish a formal capacity for population policy formulation and planning; and 2) to further strengthen the child spacing (CS) component of the MCH program. As a result, a Population Planning Unit (PPU) was created in the Office of the President and Cabinet (OPC); a demographic unit was established to strengthen training in demography at Chancellor College, the University of Malawi; and the CS program was developed through funding from various donor sources, including the World Bank's Second Family Health Project.

In July 1989, the Government accepted the recommendation of the World Bank/UNFPA Population Sector mission to approve the incorporation of population education into school curricula. Since 1989, a series of seminars and workshops on population and development involving key decision makers have been held. At the 1989 Workshop on Population Development for Principal Secretaries, chaired by the Secretary to the President and Cabinet and involving the higher level government officials, it was further recommended that more effective and aggressive actions be taken to strengthen CS services and to promote smaller family norms.

In early 1990, a further important step was taken with the establishment of the PPU as a permanent part of the EP & D, under the new title, Population and Human Resources Development (PHRD) Unit. The Unit's mandate was to create an effective mechanism for coordinating and monitoring population-related activities in Malawi. In July 1990, the newly formed unit held a National Workshop on Population-Development Projects and Program Implementation. A series of recommendations were made on how the PHRD Unit's role could be made more active, as well

Note The major sources for this chapter were: UNFPA, *A Report on Population Programme Review and Strategy Development*, 1991, and World Bank, *Malawi Population Sector Study*, 1991.

as on what future activities they need to undertake. One of the recommendations stated that "the Government should initiate the process of formulating a comprehensive population and human resources development strategy and eventually establish a National Population and Development Commission."⁷⁸

In August 1990, following the workshop, a meeting of the National Population Steering Committee (NPSC) was held and a subcommittee was formed to examine the role and functions of the PHRD Unit and the NPSC. The subcommittee recommended that the NPSC should advise and oversee the PHRD Unit's activities under the new title, National Population Advisory Committee (NPAC), and that all population project committees including the Information, Education and Communication (IEC) and Family Life Education (FLE) committees, should be subcommittees under the NPAC.

It is essential that any development planning includes analyses of population-development interactions. In Malawi's development policy outlined in the *Statement of Development Policies 1987-1996* (DEVPOL), there was no section pertaining to population. Another workshop for Principal Secretaries on Population Review and Strategy Development was held in October 1991. They reiterated the recommendation that the PHRD Unit formulate a comprehensive population and human resources development policy statement as a supplement to the DEVPOL. The PHRD Unit is presently developing proposals for such a population policy statement to be issued by the end of 1992, which would eventually lead to the future establishment of a national population commission.

ii) Child Spacing Program: Background and Policies

Child Spacing (the term which has been used in Malawi to refer to family planning) has been seen primarily as a health-related measure. CS activities were first introduced in Malawi by the Ministry of Health (MOH) in the early 1960s. However, the program was stopped by the Government after only a short time, because of the general public's misunderstandings and misconceptions. It was believed by some that the Government's aim was to control the size of the population.

MOH, however, continued its efforts to see how best the program could be re-introduced. In 1982, following their recommendations, the Government authorized the re-establishment of the National Child Spacing Program as part of the Maternal and Child Health (MCH) program.

In 1983, a National Child Spacing Coordinating Committee (NCSCC) was set up to plan and coordinate the implementation of CS activities. The NCSCC formulated a 4-year workplan (1984-1987) covering activities in the areas of IEC, service

⁷⁸ PHRDU, *Report of the National Workshop on Population-Development Projects and Programme Implementation*, Vol. 2, 1990.

delivery, research, monitoring and evaluation. In 1983 and 1984, CS services were introduced in the Central hospitals in Blantyre and Lilongwe, the General Hospital in Zomba and district hospitals in Mulanje, Kasungu and Rumphi. These hospitals also served as training centers for CS service providers, initially only doctors but eventually also nurses and midwives. Services were later extended to other district hospitals and lower-level facilities.

As part of the 1986-95 National Health Plan, the MOH launched a National Child Spacing Program Five Year Plan, 1988-1992. Its overall aim was to increase the range and scope of CS services, and its goals included a CPR of 10 percent by 1992 and a reduction of the TFR to 5.0 by 1992. The implementation of this plan is being assisted principally by the World Bank, USAID and UNFPA, as well as other smaller-scale donors. Looking to the future development of the CS program, a further five-year National Child Spacing Program for 1992-1996, has been written.

The principal objective of the CS program as set by the Government was to improve MCH in order to reduce infant and maternal morbidity and mortality. This was to be achieved by allowing the mother to rest adequately between pregnancies so that she regained her strength before the next child, and by allowing the mother adequate time to look after the nutritional and health needs of her children.⁷⁹

The philosophy of the program did not explicitly aim at limiting the size of families or the growth rate of the population. It aimed only to promote the health of the mother and the child by reinforcing the traditional practices of spacing pregnancies with modern methods.⁸⁰ On the other hand, although there is as yet no official population policy, the Government considers both population growth and fertility levels as too high, and consequently, the promotion of CS services and the integration of population and demographic variables into development planning are recognized as the key factors to the country's overall development.⁸¹

Currently, there is a positive environment for developing policies for the CS program. In November 1990, the National Family Welfare Council of Malawi was officially established, through an Act of Parliament, as a parastatal of the Ministry of Community Services. Its mandate was to develop and strengthen the national CS program, thereby minimizing the duplication of efforts and maximizing the use of scarce resources.

⁷⁹ Ministry of Health, *National Child Spacing Programme 1992-1996*.

⁸⁰ *ibid.*

⁸¹ Ministry of Community Services, "A Proposal for Donor Support for the National Family Welfare Council of Malawi," 1991.

Another constructive step taken by the Government to encourage the practice of CS was the amendment made to the Malawi Public Service Regulation 1:541 which took effect from 1st April 1991, which grants female civil servants paid maternity leave only if three years have elapsed since her last child's birth (refer to Chapter 1, Section D for more details).

b. Targets/Goals

i) Population Programs

Malawi's population has grown rapidly from 5.5 million in 1977 to the present level of 8.7 million (estimate), as a result of 1 million refugees from Mozambique and a 3.2 percent annual growth rate. The rapidly increasing population amidst Malawi's limited land area (see Table 4-1) and natural resources, and the country's landlocked position worsened by the disruption of the traditional external transport routes through Mozambique, have resulted in several problems. These are: the stagnation of per capita income, increased poverty due to land pressure and food insecurity, and the rising cost of social services needed to cover the growing population.

In light of the above and the recommendations made at the Workshop for Principal Secretaries on Population Review and Strategy Development in October 1991, a comprehensive population and human resource development policy statement, as a supplement to the DEVPOL, is now being prepared by the PHRD Unit. It is expected to be finalized by the end of 1992.

The policy statement is expected to cover the following areas of concern⁸²:

1. Population and Development--integration of demographic factors into the socio-economic planning process, and promotion of training of Malawian nationals in population-development planning and research studies on population-development interlinkages.
2. MCH/CS--development of policy proposals to reduce the shortage of trained manpower in CS service delivery and to raise and diversify the number and range of health facilities providing CS services.
3. IEC: development of IEC strategies encompassing formal and non-formal channels and focused IEC programs for the rural population, and the promotion of population education as an integral part of the school and teacher training curricula.
4. Women, Population and Development--to incorporate a clear policy statement on Women in Development (WID).
5. AIDS--to incorporate policies to curb the spread of the HIV virus and to establish cost-minimizing methods of treating and counselling AIDS victims.

⁸² A paper on "DEVPOL Review" obtained from the Population and Human Resources Development Unit, EP&D.

ii) The Child Spacing Program

The National Child Spacing Program Plan 1992-1996, which was prepared by the MOH, has set the following goals and objectives⁸³:

The program's major goal was to raise the level of health and welfare among women of reproductive ages, as well as among men and children in Malawi. The five-year plan of action is expected to achieve the following:

1. Increase in the contraceptive prevalence rate to 10% from 3% by 1995 (The earlier target was set at 12% by 1996).
2. Reduction of the Total Fertility Rate from 7.6 to 5 by 1994.
3. Reduction of the number of early marriages and teenage pregnancies.

The specific objectives of the program are:

1. To continue to provide both technical and managerial skills in CS to all cadres of health personnel.
2. To accelerate the expansion of CS services to families and the community as an integral part of MCH services.
3. To strengthen the IEC aspects of the program.
4. To continue with research and evaluation activities, which will assist in the overall effectiveness and efficiency of the program.

In order to accelerate the expansion of services provided by the MOH, and to introduce community-based distribution (CBD) and the social marketing of contraceptives, planned activities include:

- the procurement of CS commodities so as to ensure country-wide availability of contraceptives;
- the strengthening and expansion of hospital facilities so as to provide adequate space for integrated MCH and CS services;
- the establishment of CS clinics in additional health centers throughout the country, at a rate of at least four per district per year, or a national total of 100 per year;
- the training of traditional birth attendants (TBAs) and community volunteers as motivators and CBD agents;
- the initiation of a feasibility study on the social marketing approach for contraceptive distribution.

⁸³ There exist several versions of the *National Child Spacing Programme 1992-1996* with revisions on the targets. The following targets, objectives and activities are derived from: House, W. J., "An Application of the Target-setting Model to Malawi's Child-Spacing Programme," ILO Population and Human Resources Adviser, PHRDU.

To achieve the above goals, objectives and activities, the MOH intends to involve other agencies participating in development programs, so that CS is integrated into all development plans related to family welfare. It is also their intention to involve community leaders and other influential individuals to assist in making CS more community-based. Furthermore, the MOH will give full support to the various organizations (government and non-government) for their efforts to include CS promotion in their work.

It is expected that the newly established National Family Welfare Council will take up the role of coordinator for all CS and population related activities in the country.

c. Organization and Personnel

i) Population Programs

The PHRD Unit, as mentioned earlier, was established in early 1990 within the Department of Economic Planning and Development (EP & D). The EP & D is responsible for the country's overall planning and is located in the Office of the President and Cabinet (OPC), the country's central policy-making institution. The Unit's function is to coordinate and monitor all population-related activities in Malawi. It convenes the NPAC and acts as its chair and secretariat.

The Government has shown a clear commitment to the overall objectives of the PHRD Unit by providing a core of senior-level local staff. The Unit is being funded by the UNFPA, with the ILO as its advisory body. However, staff levels, particularly experienced professionals, are still low. Once UNFPA assistance stops, Government funding will be necessary, if the Unit is to achieve its goals and objectives.

The National Population Advisory Committee (NPAC) was formed in 1989 and is made up of the ministries and departments involved in population-related activities, including the National Council for Social Welfare, a coordinating body for NGOs, and the Malawi Broadcasting Corporation, a parastatal body. The NPAC, which meets quarterly, facilitates the work of the PHRD Unit and gives policy guidelines for the monitoring and evaluation of population projects.

ii) Maternal Child Health and Child Spacing Programs

The MOH plays a major role in delivering MCH and CS services. The NCSCC, set up in 1983, is responsible for coordinating all CS services within the MOH. The committee's main responsibilities have included service delivery, logistics, and commodity supply and distribution.

Figure 4-A shows the implementation structure of the CS program by MOH. At the national level, the CS program is managed by the Family Health Section under the Preventive Health Services Division of the MOH. The Family Health Section covers nutrition, EPI, safe motherhood (including the TBA program) as well as CS. The National Family Health Coordinator is

responsible for coordinating and implementing the family health services in the Section, assisted by the Deputy Coordinator and four officers: the Technical Adviser, the Logistics Officer, the Health Education Specialist and the Statistician. (At the time of the mission's visit in March 1992, the position of the National Family Health Coordinator was vacant.)

At the regional level, the Regional Family Health Advisor (Regional MCH Coordinator) is responsible for family health services under the Regional Health Officer, and gives technical advice and support to the districts through training and supervision. At the district level, the District Public Health Nurse is responsible for family health services, assisted by one or two MCH Coordinators. At the health center level, a Medical Assistant is in charge of service delivery with Enrolled Nurse Midwives (ENMs) (usually two, but with staff shortages, sometimes only one) mainly responsible for family health services, including MCH and CS.

The paramedical personnel most involved in the provision of CS services are Registered Nurses and ENMs, with the support of Medical Assistants, Clinical Officers, Health Assistants, Health Inspectors and Health Surveillance Assistants (HSAs) who motivate the community to use the services. CS motivation is also provided by Traditional Birth Attendants (TBAs).

Most of the family health activities are clinic-based with a limited number of outreach and mobile clinics. At the grassroots level, therefore, only some kinds of family health activities can be conducted. These include growth monitoring and food supplementation carried out by village volunteers, and the promotion of safe deliveries by trained TBAs. These activities are backed by the Village Health Committees and staff from the health center and hospitals (refer to Chapter 3, B-d). It is planned that the distribution of contraceptives will soon be included in the list of activities.

In addition to the health staff of the MOH, there are grassroots workers working under other ministries; e.g. female Farm Home Assistants (Ministry of Agriculture), Community Development Assistants (Ministry of Local Government), and Home Craft Workers (Ministry of Community Services). These people could also be mobilized to work as CS motivators.

As shown in Figure 4-B, the National Family Welfare Council of Malawi (NFWCM), which was established recently by the Government as a parastatal of the Ministry of Community Services, is expected to take up the role of coordinating CS services, as well as developing IEC activities on CS and population issues and expanding outreach CS service networks.

d. Financing

CS services in Malawi are delivered through the health service network. All CS services are free except for programs of NGOs and those under pilot CBD and social marketing schemes. There

are no plans to change this current system. The financing of the CS program must therefore be considered in relation to the country's overall health budget.

The actual amount spent by the MOH to date specifically on the CS program is impossible to determine exactly, due to the MOH's current expenditure classification system. Most CS services have been delivered as part of the primary health care (PHC) programs. According to the MOH expenditure classification, PHC programs are included under the category "District and Other Hospitals" without further breakdown.

Based upon the MOH expenditure for 1987/88, "District and Other Hospitals" accounted for approximately 30% (MK 12.5 million) of the total MOH expenditure (MK 40.8 million). According to the 1983 health financing study using data from 6 rural districts, only about 12% of the total MOH budget went to PHC activities. If we took a more conservative estimate of 10% and applied it to 1987 figures, PHC activities for 1987/88 would have claimed only about MK 4.0 million. This indicates that the amount spent on the CS program was only a tiny fraction of the overall MOH expenditure.⁸⁴

A substantial increase in the CS spending level is anticipated to cover the costs for the national CS program for the period 1992-96. According to the MOH estimate, it is projected that the program will spend US\$9 million over the next 5 years. This will mean a rise in the annual expenditure from US\$1.5 million in 1992 to US\$2.2 million in 1996 (this is based on the target set for the increase in contraceptive prevalence of 4 to 12%). Contraceptive commodities make up about 35% of the total spending, personnel about 19% and training about 16%.⁸⁵

According to World Bank estimates, the unit cost per CS user will fall from around US\$20 in 1992 (a typical developing country cost) to around US\$8 by 1996, as fixed program costs such as training are spread out over a larger pool of CS users. However, there is little hope for further reductions in the unit cost, since contraceptive commodities will make up nearly half the recurrent unit cost and two-thirds of the total unit cost by 1996.⁸⁶

The projected CS program costs do not include any spending on the newly-established National Family Welfare Council of Malawi. They amount to US\$4.5 million for the first 5 years, 80% of which is anticipated to come from donors.⁸⁷ This high

⁸⁴ World Bank, *Malawi Population Sector Study*, 1991.

⁸⁵ *ibid.* (There is another version of the *National Child Spacing Programme, 1992-1996* with the total estimated budget of US\$10 million.)

⁸⁶ *ibid.*

⁸⁷ House, William J., "An Application of the Target-setting Model to Malawi's Child-Spacing Programme," PHRDU, 1991.

level of estimated spending on CS activities, even if initially financed by donors, will necessitate firm and sustained Government commitment to the program.

e. Government's Responses to Foreign Assistance

Population and CS programs have been largely financed by donors. As will be described later in the chapter, the program has been supported by various multilateral and bilateral donors, of which the three major agencies are the World Bank, UNFPA and USAID. Assistance has been coming from a wider range of donors and the funding has been increasing in step with the Government's heightened interest in this area. A good relationship has been established between the Government and the donor group.

With the implementation of the present National Child Spacing Program 1992-1996 and the establishment of the NFWC, the Government has relied heavily on foreign assistance. The Government has particularly emphasized the training of health personnel on CS, contraceptive supply, equipment and facilities for CS services, IEC activities and the development of community-based services for donor support.

B. Indicators for Population and Child Spacing

a. Institutional vs. Home Delivery

Safe motherhood has been one of the priority areas in Malawi. Research has shown maternal mortality figures ranging from 100-460 deaths per 100,000 live births. The official rate accepted by the MOH is 250 deaths per 100,000 live births.⁸⁸

No current nation-wide data on institutional and home deliveries were available at the MOH. Tables 4-2 and 4-3 are from the Family Formation Survey 1984, and the figures for Table 4-4 were obtained from the District Health Offices in Blantyre and Salima during the mission's visit.

According to the 1984 survey, the percentage of institutional deliveries (hospital or clinic) was 54.4%. This figure was much higher in the urban areas (84.7%) and among women with higher education (95.6% for those with secondary or more education). Among the total non-hospital births, 65.4% were attended by a family member and only 9.6% by TBAs (Table 4-3). According to more recent data from Blantyre and Salima, the percentage of births attended by hospital or health center maternity staff was higher in Blantyre (69.2% in 1989) than in Salima (29.8% in 1989). It should be noted, however, that Blantyre district has a large urban population. In Salima district, nearly one half of the deliveries were attended by untrained personnel, highlighting the current situation in rural Malawi.

⁸⁸ Government of Malawi and UNFPA, 1991.

Two previous studies (one hospital-based, the other community-based) found the main causes of maternal deaths to be illegal abortion, obstructed labor, puerperal sepsis and hemorrhage. Childbirth has traditionally taken place at home, and there is still a reluctance among women to deliver at hospitals. Considering these factors, the training of TBAs remains crucial for the promotion of safe motherhood.

b. Child Spacing Practice

i) Contraceptive Prevalence Rate for Modern Methods

At present, no firm estimate of the CPR for modern methods is available. Only limited studies have been conducted so far on CS practices. The general consensus in official circles is that only 3 to 4% of the women in reproductive ages are now using modern methods. The Demographic Health Survey, which is scheduled to take place in 1992, is expected to provide more insights into these matters.

With regard to CS practices, these three sources of information were particularly valuable to the mission: the CS Services Report of the MOH, the 1984 Family Formation Survey, and the 1988 Survey Report by the Demographic Unit in Chancellor College entitled *Traditional and Modern Methods of Child Spacing in Malawi: Knowledge, Attitude and Practice*.

Tables 4-5 to 4-9 show the data from the above-mentioned sources. According to Table 4-5, the number of new acceptors has grown dramatically since the program began in the early 1980s. In 1984, 2,975 new acceptors were reported, and in 1990, the number had reportedly grown to 83,570. However, the following should be taken into consideration when interpreting these figures:

- It is estimated that nearly one half of the health facilities failed to send in regular reports. The actual figures are therefore undoubtedly much higher than the reported figures (*Reference Tables 1988* published by the MOH reported that completion of CS reports was 51%.)
- Failures on the monitoring and follow-up of users have been pointed out; e.g. a woman who fails to return to the clinic to collect her supplies at the expected time, but does so a short while later, is reported as a new acceptor.⁸⁹

Table 4-9 shows the data on new acceptors and revisits with the adjustments from MOH's CS Report, 1991.

According to the two previous surveys, the practice of CS using modern methods was at a low level of 3.3% in 1988, but it had seen a nominal increase from 1.1% in 1984 (Table 4-8). Both

⁸⁹ House, W. J., "An Application of the Target-Setting Model to Malawi's Child Spacing Programme," PHRDU, 1991.

surveys showed a greater practice rate in urban areas and among those with higher levels of education (Tables 4-7 and 4-8).

ii) Modern Methods of Child Spacing

According to the 1984 Family Formation Survey, the method used most often was abstinence (3.5%), followed by traditional medicine (1.7%). The modern method users were negligible (Table 4-8). Similar results were found in the 1988 survey by the Demographic Unit with the pill ranking as the highest (1.4%) among the modern methods used. According to health personnel, there exists a lot of misconceptions regarding modern contraceptive methods (e.g. harmful effects on health such as infertility or discomforts during sexual intercourse), which has become obstacles in the promotion of modern CS methods. The MOH has been making efforts to eliminate these misconceptions.

The methods offered in the CS program include a wide range of options, such as the pill, IUD, injections (Depo Provera), sterilization and barrier methods such as condoms, diaphragms, spermicidal foams and jellies. According to the MOH, the distribution of methods was reported as: the pill, 40%; Depo Provera, 15%; IUD, 10%; sterilization, 4%; foaming tablets, 6%; and condoms, 24% (1990).⁹⁰

It has been reported that the popularity of the pill and IUD is declining. However, acceptors of Depo Provera and sterilization are anticipated to increase. The demand for condoms seems to be on the rise, partly in response to the AIDS epidemic in Malawi, where 10% of the adult population are believed to be HIV positive. So far, condoms have been rather unpopular, particularly among men. According to the 1988 study conducted by the Demographic Unit, there were differences in attitude towards condom use between men and women. Men tended to consider condoms as a disease prevention device while women regarded them as a CS device.

iii) Traditional Methods of Child Spacing

There are many traditional beliefs concerning abstinence from sexual activity and/or the encouragement of such activity relating to child-bearing. In the traditional setting, the social customs for sexual abstinence served as a means of CS whether deliberate or not. Tables 4-10 to 4-13 show the results of the 1988 survey conducted by the Demographic Unit, University of Malawi on the traditional methods of CS in Malawi.

The survey identified eleven traditional customs listed in Table 4-10 which required men and women to abstain from sexual intercourse. These were:

- 1) Death in the Family
- 2) Family Member Ill

⁹⁰ *ibid.*

- 3) Postpartum Amenorrhea: A woman should abstain from sexual intercourse until she resumes her menstrual cycle after the birth of a child.
- 4) Breastfeeding: While the woman is breastfeeding, she should abstain from sexual intercourse.
- 5) Wife Pregnant: When the wife is pregnant, the husband should abstain from sexual intercourse with other wives, if he has more than one wife.
- 6) Death in the Village
- 7) Epidemic in the Village
- 8) Family Member Away
- 9) Grandmother Status: After becoming a grandmother, a woman should abstain from sexual intercourse.
- 10) Famine Period
- 11) Drought Period

Table 4-10 shows the awareness, perception and practice of these traditional customs for sexual abstinence. It is noted that a high percentage of the people are aware of these customs and that one third have practiced them for reasons such as a "family member being ill", "postpartum amenorrhea" and "breastfeeding."

In addition to these customs, there are traditional methods which people follow to avoid pregnancy or to space births. Table 4-11 shows awareness and practice of such traditional methods. "String" is the most well-known traditional method, which involves the wearing of a herbal string and beads tied around the waist. It is believed to prevent fertilization and therefore pregnancy. Herbal juice is also taken as a contraceptive.

While the majority of Malawians supported modern CS methods, 12.9% of men and 7.6% of women still approved the traditional methods (Table 4-12). Prolonged breastfeeding is commonly believed to be an effective birth-spacing method. The 1984 Family Formation Survey noted that the mean duration of breastfeeding was 17.5 months with the figures lower in the urban areas and among the educated (Table 4-13). Figure 4-C shows the mean duration of postpartum sexual abstinence from the results of the 1984 survey. This indicates that the actual observed period of postpartum abstinence is fairly short at 6.4 months, and that women are very quickly exposed to the risk of another pregnancy. It also reflects a decline in the practice of sexual abstinence according to traditional customs.

iv) Induced Abortion

Abortion is illegal in Malawi. According to the Penal Code of the *Laws of Malawi* (Chapter 7:01), any attempt to undergo an abortion is considered a criminal act with the following punishments:

Attempts to procure abortion: (149)

"Any person who, with intent to procure a miscarriage of a woman, whether she is or is not with child, unlawfully administers to her or causes her to take any poison or other

noxious thing, or uses any force of any kind, or uses any other means whatever, *shall be guilty of a felony and shall be liable to imprisonment for fourteen years.*"

The like by women with child: (150)

"Any woman who, being with child, with intent to procure her own miscarriage...*shall be guilty of a felony, and shall be liable to imprisonment for seven years.*"

Supplying drugs or instruments to procure abortion: (151)

"Any person who unlawfully supplies to or procures for any person any thing whatever, knowing that it is intended to be unlawfully used to procure the miscarriage of a woman, whether she is or is not with child, *shall be guilty of a felony and shall be liable to imprisonment for three years.*"

Although abortions are illegal, they are being conducted behind the scenes in reality. There was no current data available on the number of abortions performed per year. According to the MOH in-patient report for 1990 (see Table 2-33, Chapter 2), out of the top ten causes of hospital attendance with subsequent death, abortion ranked as eighth with a total of 11,938 cases 11,938 and 62 deaths. Considering the sensitivity of this issue, the true figures maybe much higher.

v) Knowledge and Attitudes towards Child Spacing

Tables 4-14 to 4-17 show the knowledge and awareness of CS methods from surveys carried out in 1984 and 1988. In 1984, the percentage of women aged 15 to 49 knowing any method was 26.6%, and 29.6% among women currently married. Among men aged 20-54, it was 35.2%. In 1988, the awareness of at least one CS method was 76.8% for women and 79.4% for men.

It should be noted that the two findings are not comparable. In the 1984 survey, the information collected was based on a spontaneous answer, while in 1988, the reply included those aided by an interviewer. However, it can be said that there was a substantial increase in the awareness of CS methods between 1984 and 1988, although this was not reflected in the actual practice of modern CS methods, since the CPR in the 1988 survey was only 3.3%.

Table 4-17 shows the sources of information of those who indicated that they knew some type of modern CS method. The majority of people obtained the information from a hospital, followed by friends.

Looking at Tables 4-18 and 4-19, we can see that the desire for a large family is very strong in Malawi. In the 1984 survey, the mean desired number of children was 6.0 for women and 6.3 for men. The figure did not differ significantly between rural or urban areas, by region, by sex or by level of education except for the slightly lower number of 4.6 among better educated women. In 1988, 4 or 5 children was the desired number for the majority of respondents.

A birth interval of less than two years puts a woman in a high reproductive risk category. Tables 4-20 and 4-21 show the mean desired length of a birth interval from the 1984 and 1988 surveys. The desired interval is comparatively shorter being a little over 2 years. According to the 1984 survey, slightly more than one-third interviewed had an average interval of 24-35 months in practice, while 23.6% had a birth interval of less than two years. Clearly, the importance of a two-year spacing between births needs to be further emphasized.

Tables 4-22 to 4-25 show the results of the 1984 and 1988 surveys of people's attitudes towards CS. According to Table 4-22, among the non-pregnant women aged 15-49, about 60% of the women expressed a desire to have either no children or to have them later. Even among the younger age groups (15-19, 20-24, 25-29) over half expressed a wish to have children later. This suggests a possible willingness to accept CS. According to Table 4-23, nearly 70% of men stated that they would like to use CS methods either now or in future and would like their wife to use them as well. Even among those never married, 67.6% would like to use CS methods in the future.

According to the 1988 survey, 88.6% of men and 84.1% of women showed positive attitudes towards CS (Table 4-24). Table 4-25 shows the reasons why women approved or disapproved of CS. Interestingly, "care to each child" was the highest response given, by both men and women, as the reason for approval. "Large family desired" ranked highest as the reason for disapproval.

The above findings suggest that favorable motivation for the use of CS methods exists among the people, even among men. This could indicate an increase in potential demand for modern CS services. Considering the low CPR, it will be a challenge for the program to develop and provide services to those whose needs are currently unmet.

C. Study and Research

In the areas of reproductive health and contraceptive technology, research has not been very well developed. The Medical School at the University of Malawi has only begun producing graduates this year.

In the area of demography and social research, a Demographic Unit was established in 1985 at Chancellor College, University of Malawi, with the assistance of UNFPA for the purpose of population training and research. The Unit provides undergraduate and in-service courses in demography. The Unit has also undertaken a wide range of research studies. The following are some of the studies relating to CS being undertaken by the Unit.

- "Attitudes Towards Condoms, Names, Packs and Concepts in Malawi; A Focus Group Exploration" in collaboration with the Center for Social Research, under the request of the MOH, as a component of the Social Marketing of

Contraceptives (SOMARC) Project in Malawi, under funding from USAID,

- "The Value of Children and CS Practices in Malawi," as a part of the UNFPA-supported MCH project (MLW/85/P01),
- "Traditional and Modern Methods of CS in Malawi: Knowledge, Attitude and Practice," a large-scale survey carried out for the MOH in April 1988.

In addition to the Demographic Unit, the Center for Social Research, also attached to Chancellor College, has undertaken several socioeconomic studies with PHRDU and UNICEF, one of which is the Situation Analysis of Poverty in Malawi.

The Demographic Health Survey, with the assistance of USAID, is expected to be undertaken in 1992 by the MOH. It is hoped that the result of the DHS will provide detailed information in health-related areas, including MCH and CS.

D. System of Implementation for Population/CS Programs

a. Roles and Functions of Concerned Government Agencies

i) Population Programs

Data Collection and Analysis

As explained in Chapters 1 and 2, Malawi has no universal vital registration system. Therefore, demographic data are primarily collected through population censuses and demographic and other population related surveys, and the National Statistical Office (NSO) is responsible for the collection, compilation, analysis and dissemination of demographic statistics for the country.

Population and Development Planning

The Population and Human Resources Development (PHRD), as mentioned earlier, has been responsible for the coordinating and monitoring of population-related issues in Malawi. The Unit's major activities have included:

- 1) Technical Secretariat to the the National Population Advisory Committee (NPAC) and convenor/secretariat for the IEC sub-committee;
- 2) Integration of population and human resource concerns in the development planning process through workshops and seminars on population-related issues;
- 3) Training of national planners in population-related areas;
- 4) Policy-related research activities on the inter-relationships between demographic and socioeconomic factors.

ii) The Child Spacing Program

As mentioned earlier, the MOH has taken a major role in the provision of CS services, as part of MCH. The CS program has been expanded in recent years with the support of various donor agencies. However, there are other government agencies as well as NGOs working in the area of CS, such as, the Ministry of Community Services, the Ministry of Agriculture, the Department

with the support of UNFPA and USAID. The following are the two attempts, initiated recently in this area:

***CBD Program**

The MOH sent study teams to a number of countries to examine their CBD systems (including neighboring Zimbabwe which has a very strong CBD program), and possible systems which could be developed in Malawi. As a result, a pilot CBD scheme is being set up in one district, where HSAs will act as CBD agents, with the assistance of community contraceptive depot holders.

***Social Marketing**

In 1987, USAID-funded consultants from SOMARC came at the request of the MOH to assess the feasibility of a social marketing approach for selling contraceptives in Malawi. Based upon their recommendations, a social marketing program for condoms sold at a subsidized rate through existing commercial outlets was launched in August 1991.

Another area which has needed attention in CS service provision has been the involvement of the private sector. Employee health services are already being provided by many industrial establishments (mines, factories, etc.), plantation estates and corporations. Some have even extended services to neighboring communities. The involvement of these organizations in providing CS services needs to be explored by the Government. The potential for private health practitioners in this area also needs future study.

Training within the CS Program

The training of health personnel in CS services has been a priority area of the MOH. Before the reintroduction of the CS program in 1984, CS training began in 1983 when a group of doctors, Clinical Officers (COs) and nurses were sent to a number of other countries for training. Upon their return, the trainees formed the core group which was involved with the first established CS services in the Blantyre, Lilongwe and Zomba hospitals. Later, the training program was expanded to cover all categories of health personnel with assistance from USAID, executed by Howard University of Washington, D.C.

The major components of the program are:

- 1) CS pre-service training at the Lilongwe School for Health Sciences, targeting ENMs, Medical Assistants and Health Assistants.
- 2) Family health training, focusing on in-service training of RNs and ENMs as CS service providers and paramedical personnel as CS motivators. There are 7 family health training centers in Malawi; one in the Northern Region, 2 in the Central and 4 in the South. (According to an MOH official, the one in the Northern Region has been closed, due to administrative problems.) The length of training differs depending upon the rank of the health personnel, e.g. ENMs--12 weeks, RNs and COs--10 weeks, and MAs--6 weeks.
- 3) Development of curricula for the integration of CS in the pre-service training programs of RNs, ENMs, COs and MAs.

of Information, Malawi Young Pioneers, the Ministry of Education and Culture (in the area of population education) and NGOs (PHAM, CCAM, Banja La Msogolo).

Child Spacing Service Delivery

At present, CS services are not easily available due to the limited service delivery capacity. As described in an earlier chapter, there are 742 health institutions serving the country. Out of these, 210 (15 of which are PHAM) provide CS services.⁹¹ The Roman Catholic institutions, under PHAM, are opposed to modern CS methods, supporting only the use of natural methods. CS clinics are held every working day at district hospitals, and elsewhere usually only twice a week. Most lower-level health facilities are unable to provide CS services due to the lack of adequate space for privacy, equipment and trained staff.

Initially, CS activities were only provided by doctors. With the increase of trained paramedical personnel (ENMs, RNMs, Community Health Nurses), the number of providers has increased. Yet there is still a shortage, and even after training, many of them lack confidence and commitment. At the health center level, the ENMs are in charge of CS as well as MCH services. Due to the heavy work load and the general shortage of manpower, CS is often given a low priority, particularly when compared to the Under-5 clinics and antenatal care. It has been reported that the length of waiting time at clinics may also have contributed to a lack of interest among potential users.

In addition to offering modern CS methods, information is also available on voluntary female sterilization. Sterilization services are, however, limited to a few clinics. Contraceptive commodities such as pills and condoms are also available in pharmacies in large urban areas, but health facilities are the only supplier of contraceptives in rural areas.

It has been pointed out that the guidelines for the CS Program (*Family Health Protocol* prepared by Protocol Committee for the MOH, May 1988) to which health workers are currently adhering are too rigid and difficult to implement. Recognizing such complaints, the MOH is currently reviewing and revising the protocol. (For example, there are no guidelines for single adolescent girls, hence, it is taken for granted that they are not eligible for CS services. The guidelines for Depo Provera limit its use to women over 35 years of age.)

CS service provision has largely been facility-based. The MOH recognizes the need to develop more outreach services. Under the 1988-1992 National CS Program, the introduction of CBD and the social marketing of contraceptives was explored by the MOH

⁹¹ Government of Malawi and UNFPA, 1991. (At the time of the mission's visit, according to the MOH, 230 out of 748 health institutions provide CS services.)

According to the MOH, there are currently over 2,000 ENMs and 400 to 500 RNs in active duty in the country, out of which 904 have received training in CS and 512 are engaged in actual service provision.

The USAID extended funding for training till the end of 1991 for the Family Health Training Centers and the end of 1992 for the Lilongwe School of Health Sciences. The MOH intends to continue these training programs after USAID assistance has been phased out.

More recently, the training of TBAs as CS motivators has been initiated under the present National CS Program, with assistance from the World Bank. In the development of CBD programs, training will also become necessary for HSAs, CDAs and Extension Workers.

There are a number of problems and constraints which have been identified by the World Bank and UNFPA studies. The Government has fully recognized these issues, which include:

- pre-service training in CS for RNs has been limited to theory;
- the inadequacy of the training facilities and the lack of trainers;
- the general reluctance by the Catholic missions to provide CS training in their training centers;
- difficulties for trainers and trainees to be absent from their posts for the lengthy CS in-service training;
- lack of supervision, guidance and follow-up for trainees after completion of training courses.

Supplies and Logistics in the CS Program

Contraceptives for the CS program are obtained from donor agencies, mainly USAID and UNFPA, except for Depo Provera which comes from ODA (ODA is also planning to provide Norplant in the future). The logistics system for the CS program has been managed by the MOH and its Central Medical Store (CMS) located in Blantyre. Quantities needed are determined and ordered by the MOH in Lilongwe and CMS receives and distributes them for the entire program. Some weaknesses have been identified in the logistics system, which have caused periodic shortages of commodities at service delivery points. These have included, inadequate recordkeeping in the CS program, making it difficult to monitor and forecast demand; lack of coordination between the MOH and CMS; the ordering system by MOH based upon past shipment patterns, which has failed to adapt to changes in the pattern of demands or program priorities. In light of these weaknesses, the MOH is trying to initiate a contraceptive logistics monitoring system and to decentralize the supply system by establishing three regional CMS depots in Mzuzu, Lilongwe and Blantyre.

iii) IEC Programs

Previously, IEC activities for population and CS have not been well coordinated among the various government and private

agencies. The IEC Subcommittee for CS and family life education in the National Population Advisory Committee was therefore established as an advisory body for IEC programs.

Furthermore, the newly established NFWC is expected to have an IEC department. With its advocacy role, the Council is expected to promote positive changes in attitudes and policies (such as through promotional campaigns) towards CS to make CS services more accessible to the people. When fully developed, the Council is expected to coordinate IEC activities currently being implemented by various organizations.

***The Ministry of Health**

IEC activities in the CS program fall mainly under the responsibility of the Health Education Unit (HEU) of the MOH. This Unit was set up in 1969 originally to produce IEC materials for MCH, but later its responsibilities were extended to include the coordination of the entire health education program, with emphasis on PHC.

The following information was gathered at the HEU during the mission's visit. The HEU is currently organized into 6 Sections: Mass Media, Materials Production, School Health Education, Community Health Education, Research, Planning and Evaluation, and the Secretariat. Unfortunately, despite the widely recognized significance of IEC in CS promotion, the HEU has little power within the MOH and is understaffed. Recently, 3 regional and 24 district level positions (District Health Education Officers) have been created under the initial funding of USAID.

Two of the Sections, Mass Media and Materials Production, are active in the HEU. Mass Media has two sub-sections: Radio, and Band and Drama. The Radio sub-section has been active since 1969 and has written scripts for radio programs. They now have a slot of 7 minutes per week with the Malawi Broadcasting Corporation (MBC) to spread CS messages. The Band and Drama subsection has a band group made up of a band leader, musicians and singers. It has built up a repertoire of over 200 songs and several plays, including one on CS. They travel around the country in a van to mobilize people with music and dramas. In 1991, a quarter of a million people were reached by the group. They also provided training for local bands and drama groups (over 100 exist in the country).

Most of the IEC materials being produced are printed materials, such as posters, booklets, flip charts, etc.. The only kind of audio-visual material produced so far has been audio cassette tape back-ups for health staff training manuals. The HEU also produces the bi-monthly "Moyo" (health) magazine for health workers, which has a print order of 3,000 copies. A "Family Health Newsletter" is also published on an ad hoc basis. Although there are needs for more educational materials, the production capacity is still limited due to the lack of funding, equipment and trained staff.

Presently, the HEU is developing new posters on CS. Pre-testing has already been conducted and they are now ready for mass printing. The posters cover topics such as the benefits of CS, problems of teenage pregnancies, CS services, male involvement, etc. HEU plans to produce 100,000 copies of each and display them at public places such as markets, community halls, schools, as well as health facilities.

***The Ministry of Education and Culture**

The Government of Malawi agreed in 1989 to the inclusion of population education in formal school curricula. The Ministry of Education and Culture has revised the primary school curriculum to contain information on the environment as well as population, and this has been tested in schools. The new curriculum will be used starting October 1992.

***The Department of Information (DOI)**

The DOI sees itself as a central information agency for all Government Ministries and Departments in delivering mass media services. Administratively the Department is part of the OPC, but its headquarters are located in Blantyre. Its main function is to inform and educate the public about issues and policies concerning development, as well as to foster their participation in development programs.

The DOI is divided into the following sections: the News Agency, the Film Unit, the Publications Section and the Technical Section. The DOI has also cooperated with other agencies in producing posters, newscasts, films and publications to spread population-related messages. It has also been involved in the IEC component of the EC-funded Second Family Health Project of the MOH. Recently, the DOI has become more directly involved in population issues with the establishment of a UNFPA-funded Family Life Education Project.

***The Malawi Broadcasting Corporation (MBC)**

The MBC is a parastatal organization which receives subvention from the Government. It runs a single channel 19-hour broadcast that is received by 70% of the population. It is closely working with the DOI in their family life education program.

Other Government Organizations

***The Extension Aids Branch (EAB), MOA**

The EAB provides well-organized media support to the MOA's agricultural and rural development extension networks. It has an overall staff of 135, of whom about 100 are technical. Its headquarters are in Lilongwe, but there is an EAB Unit in each of the eight Agricultural Development Divisions (ADDs) which covers the entire country. The EAB produces extremely large amounts of IEC materials that are well-researched, written and produced; e.g. 200 publications with a total circulation of 1.5 million copies annually, 6 radio programs weekly for MBC, at a total of over 5 hours of broadcast which reach 30% of the farmers, and 6 to 8 films a year (the single biggest film

producer in the country). The EAB also possesses 21 Landrovers fully equipped with IEC equipment such as public address systems, film projectors and VCRs, making it the most powerful film exhibitor in the country.⁹²

Agricultural Extension Education Services, MOA

The MOA has nearly 2,000 Field Assistants (1 per 800 farmers) and a network of 250 female Farm Home Assistants. These workers carry out education services in a variety of topics at the community level including health and sanitation but not yet on CS.⁹³

The network for IEC in the MOA is undoubtedly the most effective and well-organized networks in Malawi; therefore, it should be utilized to the fullest extent for spreading CS messages.

*The Ministry of Community Services

Next to the MOA, the MOCS has the largest number of field workers in rural areas. There are approximately 200 female Community Development Assistants (CDAs) who supervise and assist the 750 Home Craft Workers (HCWs) who work with rural women through the home craft classes they organize and teach. It is estimated that the network reaches about 1,700 groups including 34,000 women.⁹⁴

UNFPA supports the incorporation of family life education (especially on CS and the dangers of teenage pregnancies) into the CDA and HCW classes to educate parents. The Functional Literacy and Women's Programs, which have been conducted since September 1989 under the support of the EC, have also been used as channels to promote CS.

*Department of Youth and Malawi Young Pioneers

Malawi has a youth program directed towards both literate and non-literate young men and women, aged 15-30. The Department of Youth and Malawi Young Pioneers, a department under the OPC, conducts youth leadership training and vocational training. Since 1988, they have also begun to give family life education within income-generation programs which target girls, with the support of the World Bank and IPPF.

b. Role of NGOs

The activities of NGOs have been limited except for the religious organizations involved in health provision. There is now a rising recognition on the part of the Government that NGOs should be encouraged to take an active role in population-related activities including CS.

⁹² World Bank, *Malawi Population Sector Study*, 1991.

⁹³ *ibid.*

⁹⁴ Government of Malawi and UNFPA, 1991.

NGOs in Malawi are concentrated in the social sectors. The funding base of non-religious national NGOs, not subsidiaries of larger international NGOs, is comparatively weak. The limited number of national NGOs makes it difficult for international NGOs to enter into partnerships with them. Nevertheless, while there is still some ambivalence about the Government's position to endorse donor financial support to NGOs, the amount of donor assistance channeled through NGOs or implemented in coordination with NGOs is increasing.

The Council for Social Welfare Services in Malawi (recently renamed by the Council for NGOs in Malawi) was set up by the Government in 1985 as the umbrella organization for NGOs, attached to the Ministry of Community Services. It became operational in 1987 and began to implement its activities in February/March 1989. It was aimed to provide a system for the effective collaboration and coordination of NGO activities in the country with the intention of generating more and better-managed social development projects. The Council's capacity as well as programs are still in the development stage.

It is hoped that the recently established National Family Welfare Council of Malawi will encourage NGO participation in population and CS programs particularly in the IEC sector.

The activities of the major NGOs in the field of population/CS are:

***PHAM**

As explained in the earlier chapters, the facilities under PHAM covers 40% of the country's health services. PHAM hospitals and health facilities are also involved with MCH/CS programs. One of the CS training centers is located at a PHAM hospital. One difficulty is that the Roman Catholic hospitals and health institutions are unwilling to provide modern CS methods and only promote natural family planning.

***Chitukuko Cha Amayi M'Malawi (CCAM)**

CCAM is an NGO founded in 1985. CCAM, which works closely with the League of Malawi Women, is responsible for promoting and increasing women's participation in development activities through the provision of various training programs. Their efforts are geared toward the training of women farmers in agricultural production and income-generating activities. CCAM has also been engaged in CS motivation and awareness programs. With the support of IPPF, CCAM conducts a CS motivation training program in 12 districts. They also have a program on safe motherhood and family welfare management supported by Family Care International.

***Banja La Mtsogolo (BLM)**

Banja La Mtsogolo (literally means "Family of the Future") is an NGO which has recently become relatively well-known for its CS outreach activities targetting men. Established in 1987, it aims to complement Government services in the area of MCH with particular emphasis on CS in urban and peri-urban areas.

BLM has a Family Welfare Clinic in Blantyre, which is funded by the ODA's joint funding scheme through Marie Stopes International. In running the Clinic, they have emphasized the importance of counselling and motivation, quality care and the fulfillment of their clients' needs. After three years since its inception, the clinic receives more than 1,000 clients every month (according to their report, their total attendance was 12,035 in 1990 and 23,475 in 1991). The clinic also has a facility for female sterilization (14 new acceptors in 1991). Fees are levied from service provision at a subsidized rate compared to the commercial rates, and they contribute 67% of the running cost. They are now preparing to open 4 more clinics including one in Lilongwe and Zomba under ODA funding.

Recognizing the decision-making role of men in Malawian society, BLM's male motivation program, which is gathering much attention, consists of company-based health education talks and film shows which include CS information.

With the co-operation of the MOH and the DOI, BLM developed a film on CS to sensitize the public on "Phindu La Kulera"--the benefits of CS.

c. Trends of Foreign Aid

The population and health programs in Malawi has attracted many donors. Major donors include: USAID, the World Bank and UNFPA. There is a good cooperation between donor agencies in this area since the Population Sector Review in 1989, which was conducted by a mission composed of members of the Government, the World Bank, UNFPA, UNICEF and USAID under the coordination of the World Bank and UNFPA. At this time, it was agreed that UNFPA would act as the central coordinator between population sector donors and the Government.

The Health and Population Donors Group, which meets monthly, has fostered an on-going sense of collaboration among both multilateral and bilateral donors. The National Family Welfare Council benefits from this collaboration as it is being co-funded for its first two years by the World Bank, UNFPA, USAID and ODA. The EC, UNICEF and UNDP have indicated interest in future support to the Council..

The major activities of the major donors in the population and CS are as follows (see Chapter 5 for the summarized list of donors and projects):

*The World Bank

The World Bank has been involved in the Health sector in Malawi since 1971, though health had been taken up only as an integral part of agricultural projects for the first ten years. The Population Health Nutrition Sector Credit, which was launched in July 1991, provides \$74.3 million over a five-year period through contributions from the EC, the Netherlands/WHO and the

Government. The Sector Credit includes the following components relating to population and CS:

- 1) PHC and MCH: training the HSAs to become outreach-oriented and village-based service providers; rehabilitation and/or construction of rural health centers; provision of rural housing and some vehicles;
- 2) CS: launching of the National Family Welfare Council and the expansion of the MOH's CS program;

*UNFPA

UNFPA started its activities in Malawi with its assistance to the 1977 population census, and in the following year, its assistance was extended to the MCH program. About US\$3 million was spent in the first five-year (1983-1987) program, while expenditures for the second four-year (1987-1990) program totalled approximately \$3.4 million. 1991 expenditures were estimated at \$1.4 million and would have been substantially higher if funding for all requests had been available. The rising levels of expenditure reflects a major shift in the Government's attitude towards population issues.

Actual UNFPA expenditures for the 1987-1990 country program were:

Category	1987-1990 UNFPA Expenditures (US\$)
MCH and CS	1,339,928
IEC	607,896
Basic Data Collection and Analysis	291,267
Population Dynamics	801,793
Population Policy Formulation	223,554
Un-programmed	162,825
Total	3,427,263

The third UNFPA Country Program for 1992-1996 has been prepared. with the following objectives:

To develop a population policy statement which will be incorporated into the agendas of various Government agencies and NGOs;

To increase the CPR from 3.5% to 10%, to reduce the TFR from 7.5 to 7.15, to reduce the MMR from an estimated 400 to 200 per 100,000 live births, and to decrease the number of adolescent pregnancies;

To increase the demand for CS services through enhanced awareness-creating activities;

To increase women's status and to improve the participation of women in development.

To increase knowledge and enhanced awareness of population-environment-development linkages.

To incorporate population issues into donor-funded programs aimed at poverty alleviation.

The major areas and budget of the proposed program for 1992-1996 are:

(US\$)	UNFPA Regular Resources	Other Sources	Total
MCH/FP	3,000,000	1,300,000	4,300,000
IEC	2,000,000	1,200,000	3,100,000
Data collection and analysis	200,000	200,000	400,000
Population policy formulation	400,000	500,000	900,000
Population training and research	200,000	100,000	300,000
Women, population and development	300,000	500,000	800,000
Population supplements	200,000	200,000	400,000
Program reserve	200,000	-	200,000
Total	6,500,000	4,000,000	10,500,000

***USAID**

As one of the biggest donors in population and health programs, USAID provides assistance to a substantial number of projects which cover the following major activities:

- upgrading the skills of Malawian health personnel;
- improving rural health care facilities;
- providing child survival services, including ORT, immunizations, anti-malaria interventions, and vitamin A supplementation;
- providing potable water and community-based health and sanitation training;
- providing contraceptive commodities and CS services.

USAID is the main provider of contraceptives to Malawi's CS program. As far as condoms are concerned, USAID anticipates providing approximately 6 million condoms annually to the MOH's AIDS Control Program in addition to the 5 million condoms (\$220,000) which are supplied annually for the CS program and 2.3 million condoms (\$62,000) for the Social Marketing Project.

***Overseas Development Administration (ODA)**

The United Kingdom, through ODA, has provided technical and material support to census data processing activities and intends to support efforts to make data available to, and usable by, district and local level personnel. The NGO involved in CS activities, Banja la Mtsogolo, has been receiving financial assistance from ODA through Marie Stopes International. ODA also supported the MOH by supplying Depo Provera, which UNFPA could not fund due to financial constraints.

*European Communities

The EC provided support as part of the Second Family Health Program for the development and dissemination of CS messages with the Ministry of Community Services. The main objective of the project is to disseminate CS messages (obtained from the MOH) as rapidly as possible to the rural population through the functional literacy and home economics programs of the Ministry of Community Services. The project was initiated in August 1989 and activities began in February 1990 following the orientation of the multi-sectoral decision makers. Since then, the first batch of front-line workers has been trained, and these include HCWs and Functional Literacy Instructors.

*UNDP

UNDP's Fifth Country Program has been prepared for the period 1992-1996 with the Government. UNDP seeks to focus the Fifth Country Program (CP) on one of the key aspects of the country's development strategy, namely the reduction of poverty, under the theme of "Human Development: From Poverty to Self-reliance." The Fifth CP includes population and environment as a cross-program strategy, and population interventions are included in the 21 components of the four programs: smallholder agriculture production, small enterprise development, social development and management for development.

The total resource package for the 1992-1996 CP is estimated at US\$107.4 million (excluding special refugee funding).

5. MAJOR SOURCES OF FOREIGN ASSISTANCE TO POPULATION AND CS PROJECTS

Table 5-1 shows the main population and CS-related projects in Malawi which are either on-going or are beginning this year. The information comes from the international (World Bank, UNFPA, UNICEF, UNDP, etc.) and bilateral agencies involved (USAID, ODA, etc.). The following points should be noted:

- (1) The table does not list all projects, only the major ones.
- (2) The main agencies such as the World Bank, UNDP, UNFPA, USAID and UNICEF are just beginning or planning to begin new program cycles from 1992. Therefore, the details of those projects were not available at the time of the mission's visit.
- (3) Almost all of these projects have multi-objectives and are difficult to categorize as multi- or single-purpose; therefore, these distinctions are not made in the table.

APPENDIX I

AGENDA FOR THE JICA MISSION

Mission Members:

Dr. M. Muramatsu, Team Leader

Mr. Y. Uehara, JICA

Ms. R. Nishida, Consultant for Population and Family Planning

Ms. S. Aibe, Consultant for Public Health

Feb 29 (Sat) Tokyo - Amsterdam by KL 362

Mar 1 (Sun) Amsterdam - Lilongwe by KL 567

Meeting at JICA

Dinner with JICA staff and JOCV members

Mar 2 (Mon) Courtesy call on the Ministry of Finance

Mr. H. Kawonga, Deputy Secretary

Meeting at the Ministry of Health

Chairperson: Dr. P. Chimimba, Chief of Health Services

Members present:

Dr. Kure, Controller of Preventive Health Services

Dr. W. B. Mukiwa, Principal, Lilongwe School of Health Sciences

Dr. N. G. Liomba, Manager, AIDS Control Programs

Mr. F. R. Mwambaghi, Principal Health Planning Officer

Mr. K. N. R. Madise, Health Planning Officer

Dr. D. S. Nyangulu, Acting Chief of Community Health Officer

Mr. P. S. P. Tembo, Chief Pharmacist

Mr. F. K. Bangula, Primary Health Care Coordinator

Mr. H.M.J.B.S. Shaba, Deputy Primary Health Care Coordinator

Mr. G. Chipwaila, EPI Manager

Mr. W. G. Bomba, Chief Health Education Officer

Mr. P. A. Chindamba, Chief Public Health Officer

Mr. D. E. Banda, statistician

Dr. L. Chitsulo, Acting Principal Parasitologist, Head of CHSU

Mrs. M. Kasonda, Deputy Family Health Coordinator

Mr. B. Chandiyamba, Health Education Special Program Coordinator

Mr. W. E. Limbe, Mental Health Coordinator

Meeting with UNICEF

Dr. Stewart Tyson, Head of Health Program

Meeting with WHO

Dr. M. Chuwa, Resident Representative

Mar 3 (Tue) National Holiday

Mar 4 (Wed) Meeting with World Bank

Mr. Noel Kulemeka, Economist/Program Officer

Visit to the Kamuzu Central Hospital

Dr. Kayambo, Senior Medical Superintendent

Mrs. Mphaya, Chief Matron
Mrs. Kanjere, Senior Executive Officer

Visit to the Community Health Science Unit
Dr. L. Chitsulo, Head of CHSU

Visit to the Malawi Red Cross
Mr. Kalira, Deputy Executive Secretary
Mrs. Hassan, PHC Co-ordinator

Dinner hosted by the Team Leader for MOH
Officials

Mar 5 (Thu) Wrap-up Meeting at the Ministry of Health
Dr. Nyangulu, Dr. Chitsulo, Mr. Bangula, Mr.
Chipwaila, Mr. Shaba, Mr. Matsumoto, Mr. Madise,
Mr. Limbe, Mrs. Kasonda, Mrs. Chingura

Visit to World Bank Library (consultants only)

Visit to WHO
Mrs. Thresa Mwale, Health Information Assistant

Dr. Muramatsu departs for Tokyo

Visit to the Ministry of Agriculture
Mr. M.J.K. Mughogho, Deputy Chief Planning
Officer
Mr. I. Kumwenda, Senior Economist
Mr. J. K. Nyasulu, Principal Agricultural
Officer responsible for cereals, grain legumes
and oil seeds production
Mrs. Ruth Butao Ayoade, Principal Food and
Nutrition Programs Officer
Mrs. Catherine Chibwana, Senior Agricultural
Officer/Women's Programs

Ministry of Education and Culture
Dr. B. Mgomezulu, Acting Principal Secretary
Mr. Frank Malata, Planning Officer

Ministry of Labor
Mr. B. B. Mwambakulu, Principal Secretary

Ministry of Community Services
Mr. M. T. Chiundira, Deputy Secretary
Mr. D. M. Manda, Controller of Community
Services
Mrs. Chrissie Sinoya, Principal Community
Development Officer

Mar 7 (Sat) Holiday

Mar 8 (Sun) Mr. Y. Uehara of JICA leaves for Zambia

Mar 9 (Mon) Meeting with United Nations Development Program
and the United Nations Population Fund
Mr. Michael Heyn, Resident Representative

Mrs. Carolyn Benbow-Ross, UNFPA Country Director

Collecting information at FAO

Collecting information at the UNICEF Library

Meeting with Private Hospital Association of Malawi (PHAM)

Mr. Maurice Zulu, Acting Executive Secretary

Ms. Ellen Chirambo, Nurse/Midwife consultant

Leave Lilongwe for Zomba

Mar 10 (Tue)

Visit Chancellor College, Demographic Unit
Dr. W. R. M'Manga, Research Fellow in Demography
Mr. Chiweni Chimbwete, Lecturer

Visit the National Statistics Office
Mr. T. P. Zamaere, Assistant Commissioner for
Census & Statistics, Demography and Social
Statistics

Purchasing books at the Government Press

Leave Zomba for Blantyre

Visit Banja La Mtsogolo
Mr. Tikhala Chibwana, Project Director
Mrs. Lingly Vinyo, Coordinator
Mrs. Winie Chinthiti, Registered Nurse

Mar 11 (Wed)

Visit the Regional Health Office, Southern
Region
Dr. David Jacka, Regional Health Officer

Visit the District Health Office, Blantyre
Mr. Katawa Msowoya, Regional Health Inspector
Dr. M. Wielinga-Bom, District Health Officer
Mrs. Ellah S. Mbawa, District Matron
Mrs. Sabbina Mlusu, District Registered
Community Health Nurse
Mrs. Jane Mwahilenia, District MCH Coordinator

Visit Government Health Center in Chileka

Visit the Chileka Seventh Day Adventist Health
Center
Mr. Flyen P. Yeruwa, Medical Assistant

Visit Puli Village, Blantyre
Village Headman Puli
Mr. A. Labana, Secretary, Village PHC Committee
Mr. Kapyepye, Treasurer, Village PHC Committee
Mrs. E. Kamungo, Traditional Birth Attendant
Mr. Molesi, Area Chairman of the Malawi Congress
Party
Mrs. E. Limula, Adult Literacy Teacher and PHC
Volunteer

Leave Blantyre for Lilongwe

Mar 12 (Thu)

Leave Lilongwe for Salima
Visit Salima District Hospital
Mr. S. L. Mbeya, Acting DHO
Mrs. C. Ngalande, Senior Sister
Mrs. F. E. Nichata, Acting Registered Public Health Nurse
Mr. P. M. K. Phiri, Hospital Secretary
Mr. L. J. Kagona, Health Inspector
Mr. J. T. Masiano, Health Inspector
Mr. M. D. G. Mtika, Health Inspector
Mr. Balton B. L. Mwale, MCH Coordinator, Male
Mrs. D. E. Lazaro, MCH Coordinator, Female

Visit Chinguluwe Health Center (Government)
Mr. Benson Chigonambwinja, Medical Assistant
Mrs. O. Gopani, Nurse Midwife all other staff

Leave Salima for Lilongwe

Mar 13 (Fri)

Meetings with Ministry of Health officials

Planning Unit

Mr. Mwanbaghi, Principal Health Planning Officer
Mr. H. M. K. Nkhoma, Economist

Primary Health Care Unit

Mr. Bangula, Primary Health Care Coordinator

Family Health Unit

Mrs. Kasonda, Deputy Health Coordinator

Nursing Unit

Mrs. Joan Makoza, Chief Nursing Officer

EPI Unit

Mr. Chipwaila, National EPI Manager
Mr. J. Chikakuda, EPI Programme Manager, UNICEF
Mr. Nasim Ahmed, EPI Logistics and Cold Chain Officer, UNICEF

Meeting with the Nurses and Midwifery Council

Mrs. S. Sagawa, Registrar
Miss C. Nyirenda, Deputy Registrar
Mr. F. Tembo, Administrator
Mrs. M. Juma, Senior Accountant

Meeting with Economic Planning and Development Dept.

Dr. William House, Economist/Demographer, ILO
Population and Human Resources Adviser
Mr. George Zimalirana, Principal Economist,
National Project Coordinator, PHRDU

Meeting with the National Family Welfare Council

Mrs. R. Chinyama, Executive Secretary

Mr. Adam Nkunika, Interim Executive Secretary

Mar 14 (Sat) Holiday

Mar 15 (Sun) Holiday

Mar 16 (Mon) Meeting with CCAM (Chitukoko Cha Amayi M'Malawi)
Mrs. Kawalewale, Principal Secretary

Visit to the Delegation of the Commission of the
European Communities
Mr. Jurgen Lovasz, Economic Adviser

Overseas Development Administration/British
Development Division in Southern Africa
Ms. Stephanie Simmonds, Senior Health and
Population Adviser

USAID
Mr. Gary Newton, Officer for Health

Mar 17 (Tue) Meeting with the Department of Youth and Malawi
Young Pioneers
Mr. Patrick Chakholoma, Senior Planning Officer
Mr. Felix Ndeketya, Planning Officer
Mr. Gabriel Chiguma, Deputy Health of Training
and Inspection Div.

Meeting with the Ministry of Justice
Mr. E. M. Singini, Solicitor General

Visit to UNFPA and business lunch
Ms. Carolyn Benbow-Ross, Country Director

Visit to the UNICEF Library and the Dept. of
Culture

Dinner hosted by JICA

Mar 18 (Wed) Visit to the Bottom Hospital to observe MCH/FP
activities
Mrs. Mary Tsamwa, Senior Matron

Meeting with the Health Education Unit
Mr. R. G. D. Ngaiyaye, Health Education Officer-
in-charge

Meeting at CHSU
Dr. L. Chitsulo, Head
Dr. Michael Olivar, Epidemiologist

Meeting with Dr. J. G. Kigundu, WHO Medical
Officer

Meeting with Mrs. Kasonda, Family Health Unit

Meeting with the Manpower Development Unit
Mr. N. N. Kalanje, Principal Manpower

Development Officer
Dr. Mary Stephano, Manpower Development Advisor
Mr. B. Mbwana Phiri, Training Officer

Mar 19 (Thu) Wrap-up meeting with Ministry of Health
 officials

 Meeting with JICA

 Leave Lilongwe for Amsterdam by KL 564

Mar 20 (Fri) Leave Amsterdam for Tokyo by KL 861

Mar 21 (Sat) Arrive in Tokyo

APPENDIX II

LIST OF ABBREVIATIONS

ADB	African Development Bank
ADD	Agricultural Development Division
ADF	African Development Fund
ADMARC	Agricultural Development and Marketing Cooperation
AIDS	Acquired Immune Deficiency Syndrome
ANC	Antenatal Care
ARI	Acute Respiratory Infection
ASFR	Age-Specific Fertility Rate
AV	Audio Visual
AVSC	Association for Voluntary Surgical Contraception
BLM	Banja la Mtsogolo
CBD	Community-Based Distribution (of Contraceptives)
CBR	Crude Birth Rate
CCAM	Chitukuko Cha Mai M'Malawi (Women in Development, Malawi)
CCCD	Combatting Childhood Communicable Diseases
CDA	Community Development Assistant
CHSU	Community Health Sciences Unit
CIDA	Canadian International Development Association
CMS	Central Medical Stores
CPR	Contraceptive Prevalence Rate
CS	Child Spacing
DANIDA	Danish International Development Agency
DC	District Commissioner
DEVPOL	Statement of Development Policies, 1987-1996
DHI	District Health Inspector
DHO	District Health Officer
DHS	Demographic and Health Survey
DOI	Department of Information
EAB	Extension Aids Branch, MOA
EC	European Community
ENM	Enrolled Nurse Midwife
EP&D	Department of Economic Planning and Development
EPI	Extended Program of Immunization
FAO	United Nations Food and Agriculture Organization
FFS	Family Formation Survey
FHA	Farm Home Assistants, MOA
FLE	Family Life Education
GDP	Gross Domestic Product
GNP	Gross National Product
HA	Health Assistant
HCW	Home Craft Worker
HEU	Health Education Unit
HI	Health Inspector
HIS	Health Information System
HIV	Human Immuno-Deficiency Virus
HSA	Health Surveillance Assistant
IEC	Information, Education and Communication
IFAD	International Fund for Agricultural Development
ILO	United Nations International Labor Organization
IMR	Infant Mortality Rate
IPPF	International Planned Parenthood Federation
IUCD	Inter-Uterine Contraceptive Device
IUD	Inter-Uterine Device
JICA	Japan International Cooperation Agency

KAP	Knowledge, Attitudes and Practice
KCH	Kamuzu Central Hospital
MA	Medical Assistant
MBC	Malawi Broadcasting Corporation
MCH	Maternal and Child Health (Care)
MCP	Malawi Congress Party
MIS	Management Information System
MMR	Maternal Mortality Rate
MOA	Ministry of Agriculture
MOCS	Ministry of Community Services
MOE	Ministry of Education and Culture
MOH	Ministry of Health
MOLG	Ministry of Local Government
NCSCC	National Child Spacing Coordinating Committee
NCWID	National Council for Women in Development
NDS	National Demographic Survey
NFWC (M)	National Family Welfare Council (of Malawi)
NGO	Non-Governmental Organization
NMR	Neonatal Mortality Rate
NPAC	National Population Advisory Committee
NPSC	National Population Steering Committee
NSO	National Statistical Office
ODA	Overseas Development Administration (of UK)
OPC	Office of the President and Cabinet
ORS	Oral Rehydration Salts
ORT	Oral Rehydration Therapy
PHAM	Private Hospitals Association of Malawi
PHC	Primary Health Care
PHRDU	Population and Human Resource Development Unit
PMR	Perinatal Mortality Rate
PPU	Population Planning Unit
PVO	Private Voluntary Organization
QECH	Queen Elizabeth Central Hospital
RHO	Regional Health Officer
SOMARC	Social Marketing for Change Project
SRN	State Registered Nurse
STD	Sexually-Transmitted Diseases
TB	Tuberculosis
TBA	Traditional Birth Attendant
TFR	Total Fertility Rate
TTV	Tetanus Toxoid Vaccine
U5	Under Five
UNCDF	United Nations Capital Development Fund
UNDP	United Nations Development Program
UNESCO	United Nations Educational and Cultural Organization
UNFPA	United Nations Population Fund
UNICEF	United Nations Children's Fund
USAID	United States Agency for International Development
VHC	Village Health Committee
WHO	World Health Organization
WID	Women in Development
WL	Women's League of the MCP
WRA	Women of Reproductive Age

APPENDIX III

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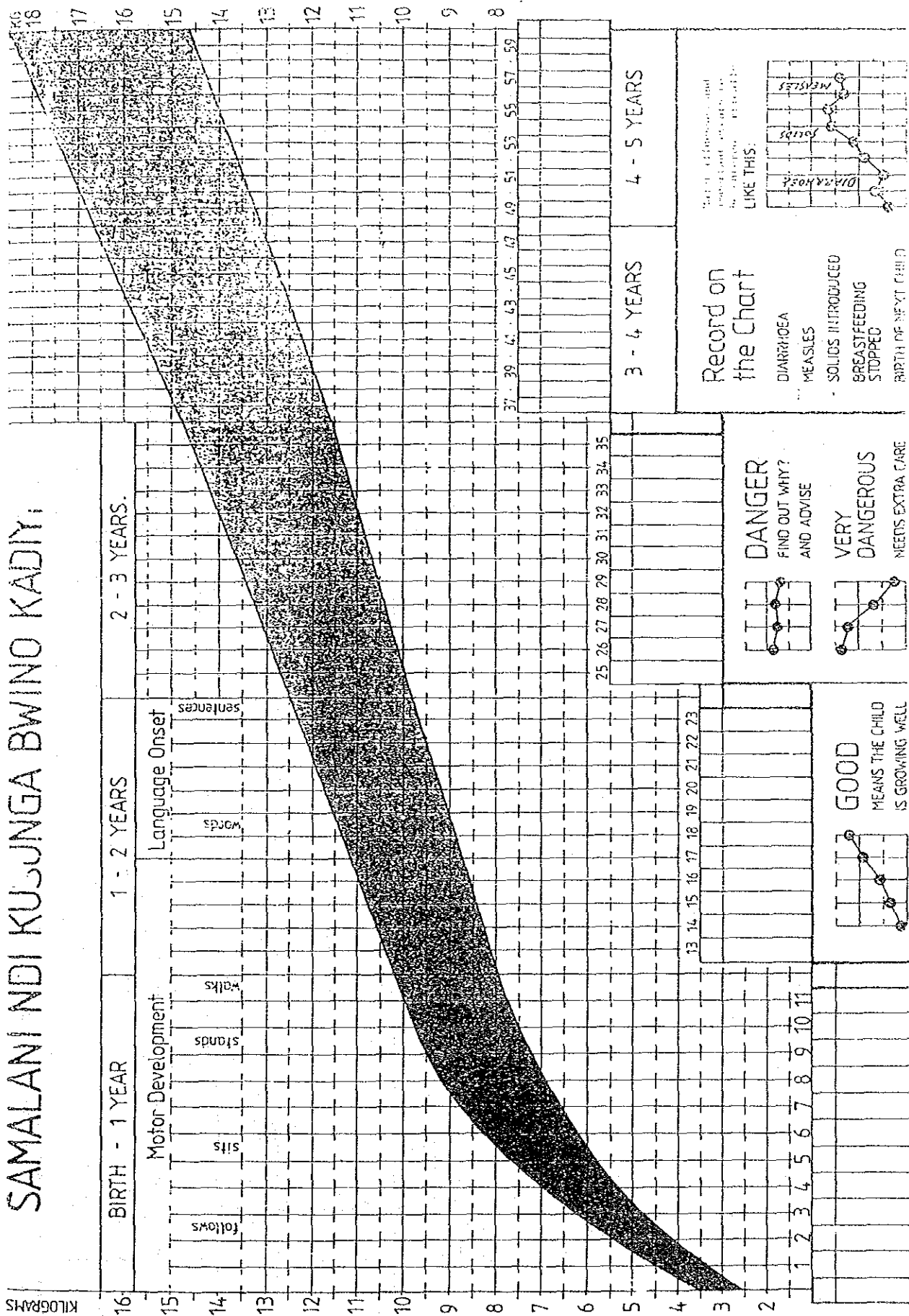
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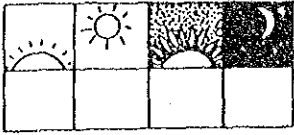

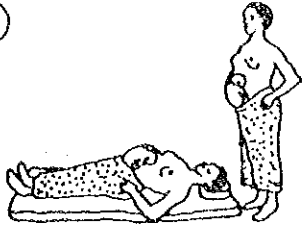


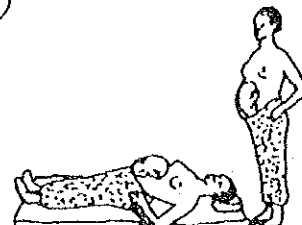

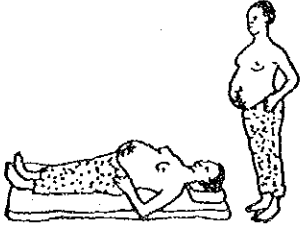
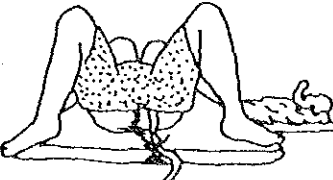
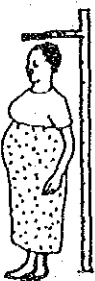
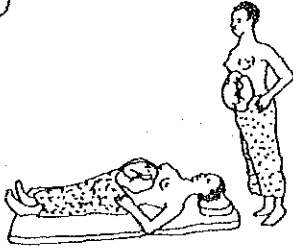
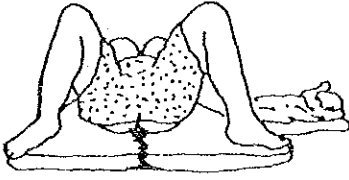
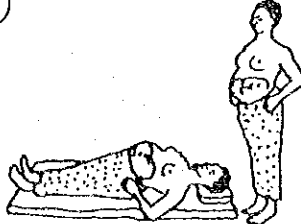
CLINIC		
CHILD'S NAME		
FATHER'S NAME		
MOTHER'S NAME		
WHERE THE FAMILY LIVES		
VILLAGE / CHIEF		
DISTRICT		
BIRTH DATE	HOME <input type="checkbox"/>	HOSPITAL <input type="checkbox"/>
BIRTHWEIGHT	SMALL <input type="checkbox"/>	AVERAGE <input type="checkbox"/>
		LARGE <input type="checkbox"/>
NUMBER OF CHILDREN BORN TO MOTHER		
TOTAL	TOTAL	DIED

BCG (at BIRTH)	DATE GIVEN _____	SCAR CHECK _____
DPT1 (at 6 weeks of age or later)	DATE GIVEN _____	
DPT2 (one month after first injection)	DATE GIVEN _____	
DPT3 (one month after second injection)	DATE GIVEN _____	
Polio1 (at 6 weeks of age or later)	DATE GIVEN _____	
Polio2 (one month after first dose)	DATE GIVEN _____	
Polio3 (one month after second dose)	DATE GIVEN _____	
Measles (not before 9 months)	DATE GIVEN _____	
MOTHER		
Tetanus Toxoid	first <input type="checkbox"/> second <input type="checkbox"/> third <input type="checkbox"/>	
Child Spacing Discussed	<input type="checkbox"/>	
REASONS FOR SPECIAL CARE		
Tick <input checked="" type="checkbox"/> any of the following RISK FACTORS present at birth		
Birthweight less than 2.5kg	<input type="checkbox"/>	
Single parent	<input type="checkbox"/>	
Brothers or sisters not growing well	<input type="checkbox"/>	
Fifth child or more	<input type="checkbox"/>	
Birth less than 2 years after last birth	<input type="checkbox"/>	
Twin	<input type="checkbox"/>	
2 or more children in family died	<input type="checkbox"/>	

SAMALANI NDI KULJUNGA BWINO KADIYI



KALATA YOTUMIRA ODWALA KUCHIPATARA

<p>①</p> 	<p>⑤</p> 	<p>⑩</p> 
<p>②</p> 	<p>⑥</p> 	<p>⑪</p> 
<p>③</p> 	<p>⑦</p> 	<p>⑫</p> 
<p>④</p> 	<p>⑧</p> 	<p>⑬</p> 
<p>DZINA LA AZAMBA</p>	<p>⑨</p> 	<p>Please return to TBA</p> <ul style="list-style-type: none"> - Diagnosis confirmed - Outcome/comments (over leaf)



Tetezani
Matenda

A
Kafumbata

Tetanus Toxoid Vaccination Card
Kadi ya Katemera wa Kafumbata

Name:

Village/Town:

Clinic: District:

Dose	When to Give	Date
1st	At First Visit	
2nd	At least 4 weeks after 1st dose	
3rd	At least 6 months after 2nd dose	
4th	At least 1 year after 3rd dose	
5th	At least 1 year after 4th dose	

FOLLOW UP VISITS

CHILD SPACING CLIENT RECORDING CARD

DATE	PELVIC EXAMINATION AND MANAGEMENT		CONTRACEPTIVE ISSUED
BLOOD PRESSURE			INITIAL
WEIGHT			
LMP			
DATE OF NEXT APP.			

DATE	PELVIC EXAMINATION AND MANAGEMENT		CONTRACEPTIVE ISSUED
BLOOD PRESSURE			INITIAL
WEIGHT			
LMP			
DATE OF NEXT APP.			

DATE	PELVIC EXAMINATION AND MANAGEMENT		CONTRACEPTIVE ISSUED
BLOOD PRESSURE			INITIAL
WEIGHT			
LMP			
DATE OF NEXT APP.			

DATE	PELVIC EXAMINATION AND MANAGEMENT		CONTRACEPTIVE ISSUED
BLOOD PRESSURE			INITIAL
WEIGHT			
LMP			
DATE OF NEXT APP.			

1. NAME OF CLIENT: _____
 2. CLINIC NO: _____ 3. DATE: _____
 4. NAME OF CLINIC: _____
 5. ADDRESS: _____
 6. AGE: _____ 7. MARITAL STATUS: _____
 8. EDUCATION: _____ 9. RELIGION: _____
 10. HUSBAND SUPPORTS C/S: YES: _____ NO: _____
 11. SOURCE OF INFORMATION: _____

FRIENDS : _____ CLINIC: _____
 RELATIVES : _____ RADIO: _____
 NEWSPAPERS: _____ OTHERS: _____

HISTORY

12. CHILDREN EVER BORN: LIVING: _____ DIED: _____
 13. STILL BIRTH: _____ ABORTIONS: _____
 14. AGE OF LAST BORN: _____
 15. DATE OF LAST ABORTION: _____
 16. MENARCHE: _____ 17. LMP: _____
 18. CYCLE LENGTH: _____ 19. DURATION: _____
 20. PATTERN: REGULAR: _____ 21. FLOW: NORMAL: _____
 IRREGULAR: _____ HEAVY: _____
 SCANTY: _____

CHECK

HISTORY OF FOLLOWING	YES	NO	REMARKS
22. BREAST FEEDING			
23. RENAL DISEASE			
24. CARDIAC DISEASE			
25. HYPERTENSION			
26. MIGRAINE			
27. JAUNDICE			
28. DIABETES			

	YES	NO	REMARKS
29. PID			
30. STD			
31. CAESARIAN SECT.			
32. SMOKING			
33. TAKING MEDICINE			
34. VARICOSE VEINS			
35. OTHER (SPECIFY)			

PHYSICAL ASSESSMENT

36. BLOOD PRESSURE _____

37. WEIGHT _____

38. ANAEMIA _____

39. BREAST _____

40. CHEST/CVS _____

41. ABDOMEN: LIVER/SPLEEN _____

42. UTERUS: SIZE/POSITION _____

43. ADNEXAE _____

44. CERVIX _____

45. VAGINAL DISCHARGE _____

46. EXTERNAL GENITALIA _____

47. PAP SMEAR _____

48. COUNSELLING AND METHOD ACCEPTED _____

DATE	PELVIC EXAMINATION AND MANAGEMENT			CONTRACEPTIVE ISSUED
BLOOD PRESSURE				
WEIGHT				
LMP				INITIAL
DATE OF NEXT APP.				

DATE	PELVIC EXAMINATION AND MANAGEMENT			CONTRACEPTIVE ISSUED
BLOOD PRESSURE				
WEIGHT				
LMP				INITIAL
DATE OF NEXT APP.				

DATE	PELVIC EXAMINATION AND MANAGEMENT			CONTRACEPTIVE ISSUED
BLOOD PRESSURE				
WEIGHT				
LMP				INITIAL
DATE OF NEXT APP.				

DATE	PELVIC EXAMINATION AND MANAGEMENT			CONTRACEPTIVE ISSUED
BLOOD PRESSURE				
WEIGHT				
LMP				INITIAL
DATE OF NEXT APP.				

TABLE 1-1: MACRO ECONOMIC INDICATORS

INDICATORS	1970	1975	1980	1985	1986	1987	1988	1989 Estimate
GNP PER CAPITA (US\$)	60	120	180	170	160	150	160	180
GDP at Market Prices (MK million)	242.1	529.7	1,005.0	1,944.9	2,197.6	2,731.5	3,552.3	4,364.0
Consumer Price Index (1987=100)	-	-	37.9	70.1	79.9	100.0	133.9	150.6
Exchange Rate(average)* (MK per US\$)	0.830	0.860	0.810	1.720	1.860	2.210	2.560	2.760
External Debt (Million US\$)	122.5	259.9	820.8	1,018.2	1,161.3	1,373.1	1,344.7	1,394.3
International Reserves Excluding Gold (Million US\$)	29.2	61.5	68.4	45.0	24.0	51.8	145.6	100.3

* Exchange Rate as of March 19, 1992: 1 US\$ = 2.76MK

Source : The World Bank, *World Tables 1991*.

TABLE 1-2: TRENDS IN GDP

(K million)

	1987	1988	1989	1990	1991
GDP at 1978 Factor Cost	869.7	898.3	934.8	979.4	1,022.4
GDP at 1978 Market Prices	946.2	974.2	1,022.7	1,070.7	1,113.7
GDP at Current Market Prices	2,614.0	3,417.9	4,388.0	5,076.0	5,949.8
Real GDP Growth %	1.4 *)	3.3	4.1	4.8	4.4

Note : *) Figure from Economic Report 1989, others from Economic Report 1991.

Source : Department of Economic Planning and Development, *Economic Report 1991*.

TABLE 1-3: GROSS DOMESTIC PRODUCT (GDP), BY SECTOR OF ORIGIN AT 1978
CONSTANT FACTOR COST: 1987-1991

	(K million)				
	1987	1988	1989	1990	1991
Agriculture	312.5	318.7	326.6	326.5	351.6
Smallscale	(242.4)	(243.6)	(244.0)	(235.7)	(263.2)
Largescale	(70.1)	(75.1)	(82.6)	(90.8)	(88.4)
Manufacturing	107.1	110.6	120.0	133.5	137.6
Electricity and Water	18.7	19.1	20.7	23.1	24.1
Construction	31.1	38.7	41.5	43.8	45.1
Distribution	107.4	106.0	110.2	121.2	123.9
Transport and Communication	50.6	51.6	53.6	57.5	61.2
Financial and Professional Services	53.8	56.2	60.1	67.2	68.6
Ownership of Dwellings	37.3	38.6	40.5	41.7	43.0
Private Social and Community Services	38.4	39.8	41.1	42.5	43.9
Producers of Government Services	134.5	141.6	143.1	145.0	147.0
Unallocable Finance Charges	-21.7	-22.6	-22.6	-22.6	-23.6
GDP at Factor Cost	869.7	898.3	934.8	979.4	1,022.4

Source : Department of Economic Planning and Development, *Economic Report 1991*.

TABLE 1-4: SHARE OF GROSS DOMESTIC PRODUCT

(Unit: %)

	1987	1988	1989	1990	1991
Agriculture	35.9	35.5	34.9	33.3	34.4
Smallscale	(27.9)	(27.1)	(26.1)	(24.1)	(25.7)
Largescale	(8.1)	(8.4)	(8.8)	(9.3)	(8.6)
Manufacturing	12.3	12.3	12.8	13.6	13.5
Electricity and Water	2.2	2.1	2.2	2.4	2.4
Construction	3.6	4.3	4.4	4.5	4.4
Distribution	12.3	11.8	11.8	12.4	12.1
Transport and Communication	5.8	5.7	5.7	5.9	6.0
Financial and Professional Services	6.2	6.3	6.4	6.9	6.7
Ownership of Dwellings	4.3	4.3	4.3	4.3	4.2
Private Social and Community Services	4.4	4.4	4.4	4.3	4.3
Producers of Government Services	15.5	15.8	15.3	14.8	14.4
Unallocable Finance Charges	-2.5	-2.5	-2.4	-2.3	-2.3
Total GDP	100.0	100.0	100.0	100.0	100.0

Note : Figures do not add up to exactly 100 due to rounding.

Source : Calculated on the basis of Table 1-3.

TABLE 1-5: CHANGES OF GROSS DOMESTIC PRODUCT (GDP), BY SECTOR OF ORIGIN AT 1978
CONSTANT FACTOR COST: 1989-1991

	(K million)			
	1989 GDP K mn	Change from preceding year		
		1989	1990	1991
Agriculture	326.6	2.5	—	7.7
Smallscale	(244.0)	(0.2)	(-3.4)	(11.7)
Largescale	(82.6)	(10.0)	(9.9)	(-2.6)
Manufacturing	120.0	8.5	11.3	3.1
Electricity and Water	20.7	8.4	11.6	4.3
Construction	41.5	7.2	5.5	3.0
Distribution	110.2	4.0	10.0	2.2
Transport and Communication	53.6	3.9	7.3	6.4
Financial and Professional Services	60.1	6.9	11.8	2.1
Ownership of Dwellings	40.5	4.9	3.0	3.1
Private Social and Community Services	41.1	3.3	3.4	3.3
Producers of Government Services	143.1	1.1	1.3	1.4
Unallocable Finance Charges	-22.6	—	—	4.4

Source : Department of Economic Planning and Development, *Economic Report 1991*.

TABLE 1-6: ESTIMATED SMALLHOLDER PRODUCTION OF MAIN CROPS

Crop	Output (tonnes)		Percentage Change 1991 on 1990
	1990	1991	
Maize	1,342,977	1,638,438	22.0
Groundnuts	18,640	30,302	62.6
Cotton	33,026	40,802	23.5
Paddy Rice	44,917	52,548	17.0
Tobacco	14,000	12,150	-13.2
Pulses	71,385	77,402	8.4
Cassava	144,760	120,621	-16.7
Millet	10,113	9,042	-10.6
Sorghum	15,452	18,854	22.0
Sweet Potatoes	94,911	70,246	-26.0

Source : *Economic Report 1991.*TABLE 1-7: MAJOR CASH CROPS PRODUCTION

(Kg million)

	1988	1989	1990
Tobacco Auction Sales	74.8	86.3	101.2
Tea Production	40.2	39.5	39.1
Sugar Production	174.5	162.3	189.3

Source : National Bank of Malawi, *Malawi Economic Brief 1991.*

TABLE 1-8: ADMARC PURCHASES OF MAJOR SMALLHOLDER CROPS, 1979-1989

(Unit: 1000 metric tons)

YEAR	FOOD CROPS				CASH CROPS		TOTAL
	Maize	Rise	Pulses	Ground Nuts	Tabacco	Cotton	
1970	8.9	9.7	8.7	28.2	12.2	23.0	91.3
1971	37.5	19.6	18.6	39.6	16.0	24.0	155.4
1972	72.1	21.5	17.6	42.4	19.1	23.6	196.3
1973	68.1	18.6	7.4	32.4	16.3	17.6	160.4
1974	70.7	22.6	8.6	31.2	12.6	23.1	168.8
1975	31.6	15.9	6.4	35.5	13.5	19.2	122.1
1976	70.1	26.5	20.1	35.2	16.0	19.4	187.3
1977	97.2	25.8	9.5	19.9	25.5	24.5	202.4
1978	127.9	30.8	10.4	12.3	26.2	26.7	234.3
1979	82.2	20.5	6.7	24.3	19.5	22.4	175.6
Total	666.3	211.5	114.0	301.1	177.5	223.5	1,693.9
Decade Average	66.6	21.2	11.4	30.1	17.8	22.4	169.4
1980	91.9	17.5	10.6	31.4	11.3	23.1	185.8
1981	136.6	13.5	7.2	19.5	12.8	21.7	211.3
1982	241.1	12.5	5.8	10.6	8.8	14.8	293.6
1983	244.9	9.0	3.2	10.2	9.3	13.4	290.0
1984	296.4	10.0	5.4	9.9	19.2	32.1	373.0
1985	271.6	10.5	15.7	18.1	20.8	32.4	369.1
1986	?	?	?	?	?	?	(111.0)
1987	59.6	7.9	11.1	44.8	18.1	21.4	162.9
1988	137.3	5.2	8.6	15.4	9.3	25.7	201.5
1989	231.3	9.6	3.5	0.6	5.8	27.9	278.7
Total	1,821.7	95.7	71.1	160.5	115.4	217.5	2,365.9
Decade Average	182.2	10.6	7.9	17.8	12.8	23.6	262.9
Change 1970s-1980s (%)	+173.4	-50.0	-30.7	-40.9	-28.1	+5.4	+55.2

Source: ADMARC (the Agricultural Development and Marketing Corporation) Reports

TABLE 1-9: LIVESTOCK (1985-1988)

	1985	1986	1987	1988
Total Cattle Population	1,019,959	1,010,659	1,055,185	859,505
Total Goats and Sheep Population	983,805	954,782	1,008,710	1,000,000
Total Pig Population	184,711	281,538	312,932	250,000
Total Cattle Slaughtered	50,902	80,105	76,986	80,000
Total Goats and Sheep Slaughtered	31,300	3,486	61,906	60,000
Total Pigs Slaughtered	10,013	14,135	1,587	5,870
Total Cattle Marketed	13,294	14,743	14,987	14,746

Source : *Economic Report 1991*.

TABLE 1-10 : FISHERY PRODUCTION

Year	Total Fish Landings (metric tons)	Landed Value (K'000)	Fish Exports (metric tons)	Value of Exports (K'000)
1 9 8 0	65,800	10,521	2,000	1,508
1 9 8 1	51,379	8,220	3,690	2,782
1 9 8 2	58,730	9,346	2,358	1,778
1 9 8 3	64,963	12,981	584	682
1 9 8 4	65,073	17,649	82	260
1 9 8 5	62,057	20,513	120	330
1 9 8 6	73,070	27,646	200	500
1 9 8 7	88,586	37,128	101	548
1 9 8 8	78,800	40,580	62	82
1 9 8 9	70,752	71,706	5	6
1 9 9 0	73,662	77,345	4	7

Source : *Economic Report 1991.*

TABLE 1-11 : ESTIMATED MAIZE PRODUCTION, ADMARC'S PURCHASES AND NET SALES,
AND TOTAL MAIZE REQUIREMENTS

(Unit : Thousand Metric Tons)

Year	Estimated Production	ADMARC Purchases	Sales	Total Required *
1980/81	1,237	137	73	1,143
1981/82	1,244	246	190	1,211
1982/83	1,369	245	86	1,251
1983/84	1,398	297	164	1,292
1984/85	1,355	272	286	1,334
1985/86	1,295	111	130	1,376
1986/87	1,218	113	156	1,436
1987/88	1,427	59	55	1,467
1988/89	1,520	122	32	1,516
1989/90	N.A.	231	68	
1990/91	1,343	200	126	1,617

* Total maize requirement is calculated by multiplying the estimated number of households by 945, the estimated amount of maize required by a five member household.

Source : Christiansen and Southworth (1988) and National Early Warning System for Food Security, *Quarterly Bulletin* (January 1991).

TABLE 1-12: VISIBLE TRADE BALANCE

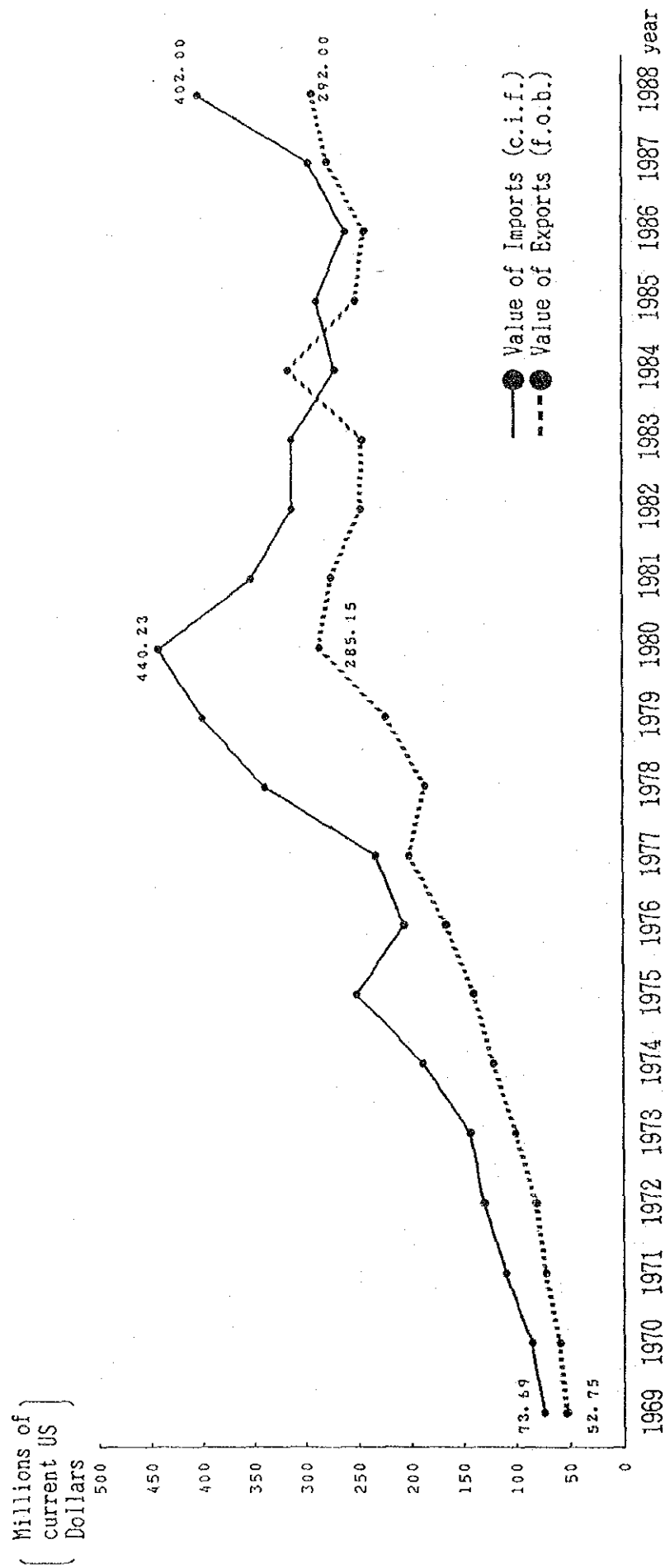
(Unit : Million Kwacha)

	1989	1990	1991
Exports (f.o.b)	741.7	1,123.1	1,379.7
Domestic	730.2	1,097.9	1,349.7
Re-exports	11.5	25.2	30.0
Imports (c.i.f)	1,398.8	1,587.4	1,910.6
Balance	-657.1	-464.3	-530.9

Note : 1989 figures are from Economic Report 1991.

Source : Department of Economic Planning and Development, *Economic Report 1991*.
Mid-year Economic Review 1991-1992.

FIG: 1-A : TRENDS OF FOREIGN TRADE



Source : The World Bank, *World Tables 1991*.