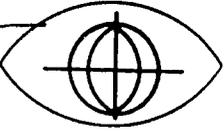


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**MASS DISTRIBUTION  
OF IVERMECTIN  
TO CONTROL ONCHOCERCIASIS  
IN THE DEPARTMENT OF  
DJA AND LOBO  
SOUTH PROVINCE  
CAMEROON**

**A Detailed Implementation Plan**

**Cooperative Agreement Number:  
631-0091-A-00-1035-00**

**Grant Period:  
October 1, 1991 to  
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**March 1992**

the  
International  
Eye Foundation



 IEF Project Area

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## I EXECUTIVE SUMMARY

The International Eye Foundation (IEF) is submitting this Detailed Implementation Plan to the US Agency for International Development for a three-year pilot project designed to introduce an onchocerciasis control program in the Division of Dja Et Lobo, South Province, Cameroon.

The goal of the project is to combat onchocerciasis by introducing an ivermectin distribution system for high risk populations that can be sustained by the indigenous health institutions. In addition to diminishing the adverse effects of onchocerciasis, including blindness in the target population, a secondary goal is to enhance the overall effectiveness of primary health care services in the onchocerciasis-endemic zones.

The project will be implemented in Dja Et Lobo Division, South Province, which has an estimated population of 150,000. Although the evidence for the existence of hyperendemic foci of onchocerciasis in the Division of Dja et Lobo is very good (see Appendix I; as well as data from the Ministry of Health), there is a lack of exact numbers of infected people. According to preliminary estimates, 60,000 people or more are living in endemic areas and will therefore be targeted for treatment. More precise figures will be available once the epidemiological mapping of the project area is completed.

This pilot project will be implemented in close collaboration with the Ministry of Public Health, and with the "Santé de l'Enfant du Sud et de l'Adamoua" (SESA) Child Survival Project in the region. IEF and its university partner, Tulane, will work closely with a core team of seconded Ministry of Health staff. IEF and the Ministry of Health will share the responsibility for implementation and daily management of the project. Tulane University will provide the necessary technical assistance to enhance epidemiological, behavioral, economic and data management dimensions of the project.

Project components include:

- (1) epidemiological survey to map the entire project area using traditional (skin snip) and other (rapid assessment) approaches to determine levels of endemicity, according to which a distribution plan will be designed: mass distribution for areas with prevalence levels  $\geq 40\%$ , selective distribution for areas with prevalence levels  $< 40\%$ ;
- (2) determination of behavior, attitudes, and practices of the targeted population (KAP survey)
- (3) training of health personnel;

- (4) vigorous health education and communication efforts aimed at the target population;
- (5) delivering ivermectin to targeted populations;
- (6) monitoring and managing adverse reactions in treated individuals;
- (7) enhancing program sustainability through integration of the ivermectin delivery program into the primary health care structure which includes a cost recovery system;
- (8) ongoing monitoring and evaluation of the program components

During the first year of the project, efforts will be concentrated on survey work, training of personnel, determining the most appropriate means of enhancing treatment-seeking behavior of the target population, and initiating ivermectin delivery on a limited scale while learning how to distribute the drug in the most efficient and cost-effective manner. During the second and third years, the delivery program will be expanded to the affected areas of the entire project area according to the epidemiological map.

The project aims to achieve a population coverage of 80% of those eligible for treatment which is the level of coverage that IEF has achieved in other ivermectin delivery programs.

The project is designed to be implemented over a period of three years, commencing October, 1991. The total estimated funding required for the project is \$677,886 of which USAID has committed \$423,414. The River Blindness Foundation has committed support in the amount of \$76,927 for year one, with good chances of more funding forthcoming in years two and three. The IEF and the Ministry of Health will provide an additional \$119,850 in cash and in-kind assistance.

## II BACKGROUND

### A. Onchocerciasis in Cameroon

Slightly larger than the State of California, with a population of 10.8 million (1989 projection) the Central African nation of the Cameroon has over 5 million people living in areas endemic for onchocerciasis. With nearly half of the population at risk and over 1.2 million infected with onchocerciasis, Cameroon ranks among the top four most severely affected countries in the world.

Although a number of onchocerciasis studies have been conducted in Cameroon, no systematic countrywide mapping has been undertaken. Prevalence data is therefore fragmentary, although a number of foci have been described, as recently summarized by officials in the Division of Preventative Medicine, Ministry of Public Health (see Figure I Map on Following Page). During the mid 1980's, an important human behavioral study was conducted in North Cameroon in which the exposure of three ethnic groups (Dowayo, Bata, and Fulani) to S. damnosum was documented. More recently, Dr. R. Moyou and co-workers conducted a large clinical trial in a tropical rainforest environment (Rumpi Hills Forest Reserve) in which 1761 cases were treated with ivermectin. Post-treatment fever was reported in 13.5% of all recipients, which is higher than the rates observed in a savannah region of Cameroon: Dr. J. Prod'hon and co-workers treated 7780 infected individuals in a savannah region. Mazzotti-like reactions were more common (20%) in inhabitants of a hyper-endemic zone than in a meso-endemic zone (12%).

Dr. J.P. Chippaux from ORSTOM (Institut Francais de Recherche Scientifique pour le Developpement en Cooperation) has recently conducted treatments with ivermectin in 6,445 inhabitants of the Vina River Valley, a highly endemic region in Adamoua Province. Other highly endemic river valleys include the Sanaga (near Yaounde) and Nkam (near Douala).

Ministry of Public Health and USAID health officials have stressed the critical importance of a recently adopted "Reorientation of Primary Health Care in Cameroon" (ROPHC), a document which defines the current national policy related to primary health care. Ivermectin distribution projects must function within this policy framework, with special emphasis on integration, community participation, co-financing (shared by MOPH and the community) and other guidelines. The ROPHC guidelines will be closely adhered to in implementing the proposed "Ivermectin Distribution Program".



## B. Rationale

The potential benefits from developing a successful model for ivermectin distribution in Cameroon are several. First, with an estimated 1.5 million of its 10.8 million inhabitants infected with Onchocerca volvulus, and nearly half of its population at risk of infection, Cameroon is surpassed only by Nigeria, Zaire, and perhaps Ethiopia in the number of infected persons. Second, ivermectin, as a highly sought-after drug in onchocerciasis-endemic regions of Africa, can be used as a means to strengthen the health services for these typically remote, under-served populations. Increased confidence in and utilization of the primary health care system can be derived from the distribution of ivermectin. Prompt relief from the severe, sometimes intolerable itching caused by onchocerciasis, and the obvious expulsion of roundworms (Ascaris lumbricoides) and other common intestinal worms shortly after treatment represent dramatic benefits to the population being served. Furthermore, the unusually high level of "user demand" for ivermectin typically seen in onchocerciasis endemic regions of Africa permits sufficient cost recovery to substantially enhance program sustainability. The Government of Cameroon, which has strongly endorsed the Bamako initiative, demands that a drug distribution program, such as envisioned in this pilot project, provides for recovery of drug and/or service costs from the user population.

While it is reasonable to assume that integrating a sustainable ivermectin distribution capability into existing primary health care services will ultimately reduce the prevalence of blindness caused by onchocerciasis, its potential benefits extend far beyond blindness prevention. If utilized in an imaginative but realistic manner, ivermectin can be used to "treat" the health care system as well as onchocerciasis.

### III PROJECT DESCRIPTION

#### A. Goal

The goal of the project is to introduce an ivermectin distribution system for high risk populations that can be sustained by the indigenous health institutions.

In addition to diminishing the adverse effects of onchocerciasis, including blindness in the target population, a secondary goal is to enhance the overall effectiveness of primary health care services in the onchocerciasis-endemic zones.

#### B. Objectives

- \* To map the prevalence of infection in the entire Division of Dja et Lobo by July 1992, as a basis for setting control priorities by using traditional (skin-snip) and other (rapid assessment) methods.
- \* To determine the knowledge, attitude and behavior of the communities (KAP survey) concerning onchocerciasis by July 1992, in order to plan appropriate health education messages.
- \* To develop a system for processing and dissemination of information collected over the course of the project, as well as develop a set of indicators by which to report on a regular basis.
- \* To capacitate at least one staff member per health unit in the entire project area to distribute ivermectin, including diagnosis of onchocerciasis using one of the rapid assessment methods, community motivation/education, supervision of Community-Based Distributors (CBDs), handling of adverse reactions and program record-keeping.
- \* To train at least one CBD per community eligible for community-based mass distribution of ivermectin, to distribute ivermectin, including community motivation/education, handling of adverse reactions and basic record-keeping.
- \* To maximize community demand and acceptance for ivermectin by community level motivation and health education.
- \* To deliver the appropriate dose of ivermectin, to at least 80% of the eligible population of the hyper-endemic areas (i.e. community-based treatment) of the sub-divisions of Bengbis, Djoum, Mintom and Oveng in year one (first round). In year two, these four sub-divisions will receive their second round

of treatment and the remaining three sub-divisions (Meyomessala, Sangmelima and Zoetele) will receive their first round. In year three, while Bengbis, Djoum, Mintom and Oveng will receive their third round of treatment, Meyomessala, Sangmelima and Zoetele will receive their second round of treatment.

- \* To monitor, document and manage adverse reactions to ivermectin.
- \* To collaborate closely with Cameroon MOH officials to insure program compatibility with the newly-revised "Reorientation of PHC in Cameroon".
- \* To maximize program sustainability through integration into the existing PHC system which includes a cost-recovery strategy.

For a detailed description of program objectives/activities see the section VII, Program Elements.

### C. Location

#### Dja Et Lobo Division in the South Province

In January 1991, IEF Medical Advisor, Larry Schwab, M.D. attended a Prevention of Blindness meeting in Yaounde, Cameroon and met with Cameroonian health officials. Dr. Owona Essomba Rene, Director, Division of Preventative Medicine, expressed strong interest in having external NGO's collaborate with his ministry in developing ivermectin distribution programs. Dr. Owona indicated to Dr. Schwab and other NGO representatives that high priority existed for treatment programs in Dja et Lobo and Haut-Nyong in southern Cameroon, a focus which is thought to be hyperendemic (See Figure I Map on page 6).

Located in the South Province along the Gabon and Congo borders, this Division covers over 20,000 square kilometers and has a population of 150,000. Existing prevalence data show this area to be highly endemic with as many as 80% of the residents in some communities infected. (See Epidemiological Survey; Appendix I). Based on preliminary data, project staff estimates that more than 60,000 people may live in endemic areas, are at risk of infection and will be targeted for treatment. These figures may be revised once the epidemiological survey has been completed in year one. This survey is also expected to give information about onchocerciasis-related blindness. As of now, there are no data on blindness due to onchocerciasis available.

The Division of Dja Et Lobo is divided into seven Sub-divisions: Bengbis, Djoum, Meyomessala, Mintom, Oveng, Sangmelima, Zoetele. Reached by paved road from Yaounde in less than three hours, this Division is known to have a well established governmental infrastructure including public health services.

There are four public and one private hospital in the Division. The public hospitals are located in the following cities: one in the divisional headquarter, Sangmelima and one each in Bengbis, Djoum and Zoetele. The private hospital is located in Nden. There are 22 public and 12 private health centers covering the Division (see Table I on next page) which will serve as focal points for ivermectin distribution. The capital of the Division, Sangmelima, offers all the basic facilities needed to establish a field headquarters, including government offices, commercial center, housing and a modern training center. The MOPH has provided two rooms for office space in the "Prevention Maternelle Infantile"-Building of the hospital in Sangmelima.

TABLE I

**HOSPITALS AND HEALTH CENTERS (PUBLIC AND PRIVATE)  
IN THE  
DIVISION OF DJA ET LOBO, SOUTH PROVINCE, REPUBLIC OF CAMEROON**

ARRONDISSEMENT (SUB-DIVISION)	TOT. POP.	PUBLIC	PRIVATE
BENGBIS	9,521	1) HOSPITAL 2) CSD MEKAS 3) CSE MBOMETAA *	1) MISSION CATH., ADJOLI
DJOUM	21,118 (**)	1) HOSPITAL 2) CSE MELEN	1) MISSION CATH., DJOUM
MEYOMESSALA	30,652	1) HOSPITAL 2) CSD MESSOK 3) CSE BIBA 4) CSE NGOASSE 5) CSE NKOLENYENG	1) MISSION CATH., EFOULAN 2) MISSION CATH., EKONG
MINTOM		1) HOSPITAL (***)	
OVENG		1) HOSPITAL (***)	1) MISSION CATH., OVENG
SANGMELIMA	35,874	1) HOSPITAL DEPT. 2) PMI 3) DISP.URB. AKOU 4) CSE NKOLOTOUTOU 5) CSE MEYO-ESSE 6) CSE MEYOMADJOM 7) CSD AVEBE-ESSE 8) CSE ELOM (COMUNAL) 9) CSD MEYOMESSI 10) CSE ESSANGMVOUT 11) CSD MEZESSE 12) INFIRM.DU LYCEE CLASSIQUE 13) INFIRM.DU LYCEE TECHNIQUE 14) CSD OVENG YEMVACK	1) MISSION CATH., AKOU 2) MISSION CATH., OWE 3) IMMACULATE CONCEPT., MONAVEBE 4) E.P.C., FOULASSI 5) CLINIQUE MONAYONG 6) MISSION CATH., OLOUNOU
ZOETELE	23,112	1) HOSPITAL 2) CSE NKOLBANG 3) CSD EBAMINA 4) CSD FIBAT 5) CSE MFOULADGA 6) CSD NDELE	1) HOSPITAL, NDEN 2) MISSION CATH., ZOETELE
<b>TOTAL</b>	<b>120,277</b>	<b>31</b>	<b>13</b>

\* = in planning, i.e. the building exists

\*\* = this number is the total for the sub-divisions of Djoum, Mintom and Oveng (separate #s were not available as of Feb.'92). Also: there will be only one Peace Corps Volunteer for the three sub-divisions.

\*\*\* = these hospitals do not have a physician and are therefore not functional as hospitals, only as health centers

CSE = Centre Santé Elementaire

CSD = Centre Santé Developpente

E.P.C. = Eglise Presbyterian de Cameroun

PMI = Prevention Maternelle Infantile

#### D. Formal Agreements

On September 16, 1991, the contract for the Cooperative Agreement was signed by Mr. Jay Johnson, Director of USAID Mission, Cameroon and Mr. Jack Blanks, Director of Programs, IEF.

A Memorandum of Understanding between the Ministry of Health of the Republic of Cameroon and the International Eye Foundation has been signed by Dr. Joseph Mbede, Minister of Health and Mr. Jack Blanks (Appendix II).

Therefore the project officially started on September 16, 1991 and enjoys the full support of the Ministry of Health.

#### E. Project Design

The project will be implemented through the following steps:

- 1) Orientation and training of all personnel involved in the initial survey work.
- 2) Community sensitization and mobilization to ensure their participation in the baseline surveys, and subsequent activities.
- 3) Two types of surveys will be carried out:
  - a) Epidemiological survey, which will be conducted for two purposes:
    - 1) to compare alternate rapid assessment techniques against the standard skin snip in order to establish a non-invasive, rapid, inexpensive and safe tool to evaluate levels of endemicity at the village level.
    - 2) to establish levels of endemicity
  - b) KAP survey, which will be the basis for designing the health education messages
- 4) Choosing appropriate distribution strategies, based on levels of endemicity:
  - a) Communities with onchocerciasis prevalence levels > 40%: community-based mass distribution of ivermectin
  - b) Communities with onchocerciasis prevalence levels < 40%: health center-based selective treatment of affected persons with ivermectin

- 5) Second phase of community education and motivation to prepare the communities for their participation in the upcoming distribution campaign
- 6) Distribution of ivermectin and monitoring of adverse reactions. Ivermectin will be delivered using the PHC staff of the existing infrastructure of 5 hospitals and 34 health centers which cover the Division and through Community-Based Distributors (CBDs).
- 7) Evaluation: mid-term and final

The Project will capacitate the existing health infrastructure to provide ivermectin delivery services to the affected communities. Each sub-division has a health care outreach staff including a PHC Coordinator. Each of these PHC Coordinators has a Peace Corps Volunteer counterpart. Both the PCVs and the PHC Coordinators are equipped with motorcycles. Under the supervision of the Project Director (PD) and Project Assistant (PA), this health care outreach staff will function as "trainers of trainers", supervise health education campaigns and play an oversight role for all facets of the project.

Each sub-division is responsible for several health centers (the actual number depends on the size of the population and land mass of the sub-division, see Table I). These 34 health centers and 5 hospitals - both public and private - will serve as the focal points for delivery of ivermectin. Each health center has at least one nurse and often one lab technician who will be trained to become part of the ivermectin distribution team.

Since 1987, through the USAID funded project SESA, a model public health care infrastructure has been established in Dja Et Lobo which provides for cost recovery on all essential drugs. The cost recovery system described in this project is compatible with the health system currently in place. In areas where the PHC system has actually been established, the ivermectin distribution system will be fully integrated. In areas where the PHC system is not yet functional, the ivermectin delivery project will initiate the training of a village health committee through the selection of a CBD, which later on can be part of the PHC system.

### 3. Log Frame

Project Name : Ivermectin Distribution Program in the Division of Dja et Lobo, South Province, Cameroon

Est. Completion : Sept. 30, 1994

Date of Revision: March 23, 1992

Design Team : Jack Blanks, Christine Witte

Narrative Summary (NS)	Measurable Indicators (OVI)	Means of Verification (MOV)	Important Assumptions
<p>Goal:</p> <p>1 To combat onchocerciasis by introducing an IDP for high risk populations that can be sustained by the indigenous health institutions.</p>	<p>1.1 Reduction of intensity of infection.</p> <p>1.2 Reduction of incidence of blindness.</p> <p>1.3 Improvement of people's productivity and their quality of life.</p>	<p>1.1 Skin snips.</p> <p>1.2 Visual acuity tests (long term only!).</p> <p>1.3 Surveys (difficult!).</p>	<p>(goal to supergoal)</p> <p>1.2 Regular intake of ivermectin does prevent blindness.</p>
<p>Purpose:</p> <p>1 To establish an annual distribution model that is safe and effective and can be integrated into the PHC system of Cameroon, which includes a cost recovery system.</p>	<p>1.1 Costs of delivering ivermectin are kept low by using the local infrastructure as much as possible.</p> <p>1.2 At least 80% of the eligible population has received the correct dose of ivermectin on a biannual basis.</p> <p>1.3 CBDs have been trained to perform motivation and distribution in communities with prevalence levels &gt;40% to enhance the chance for longterm sustainability.</p> <p>1.4 The PHC infrastructure will be used, resp. parts of it created where it does not exist yet.</p> <p>1.5 A fee for service will be charged.</p>	<p>1.1 Financial records.</p> <p>1.2 Household Ivermectin Treatment Records (HITRs).</p> <p>1.3 Training records.</p> <p>1.4 Health Center reports, monthly reports to headquarters, evaluations.</p> <p>1.5 Financial records.</p>	<p>1 Ivermectin will continue to be a safe and available drug.</p> <p>1.4 Communities are interested in establishing health committees.</p> <p>1.5 People are willing to pay for the service to obtain ivermectin.</p>

<p>Outputs:</p> <p>1 Baseline epidemiological survey conducted to determine the most appropriate method of rapid assessment.</p> <p>2 The remaining project area is epidemiologically mapped by using the most appropriate rapid assessment method.</p> <p>3 Development of a H/MIS to process and disseminate information collected over the course of the project.</p> <p>4 Project staff and CBDs trained to perform motivation and distribution activities.</p> <p>5 Health education message delivered to all communities targeted for treatment.</p> <p>6 Ivermectin distributed to the eligible population according to TMEC guidelines.</p> <p>7 Accounting system in place with special emphasis on tracking cost per intervention.</p>	<p>1.1 All communities of the sub-division of Djoum are snipped and examined for nodules, leopard skin, etc. to establish a rapid assessment method.</p> <p>2.1 All communities of the other sub-divisions visited and classified as above or below 40% prevalence using a rapid assessment method.</p> <p>2.2 Based on the survey results, # of communities targeted for treatment.</p> <p>3.1 Appropriate forms are programmed in a data base and ready for use.</p> <p>4.1 Targeted number of project core staff (5 PHCCs + 5PCVs) trained.</p> <p>4.2 Targeted number of CBDs selected and trained.</p> <p>5.1 Targeted number of communities educated about onchocerciasis, ivermectin and the program.</p> <p>5.2 Community members understand basic concepts of the IDP.</p> <p>6.1 At least 80% of the eligible population has received the appropriate dose of ivermectin.</p> <p>6.2 Everybody experiencing adverse reactions has been treated properly.</p> <p>7.1 Appropriate accounting system has been given to the accountant of the project.</p>	<p>1.1 Epidemiological survey records.</p> <p>2.1 Epidemiological survey records.</p> <p>2.2 Census, list of communities</p> <p>3.1 H/MIS records and site visits.</p> <p>4.1 Training records.</p> <p>4.2 Training records.</p> <p>5.1 Field records.</p> <p>5.2 Quality Assurance check lists.</p> <p>6.1 HITRs.</p> <p>6.2 Adverse Reaction Forms and Quality Assurance check lists.</p> <p>7.1 Reports received in headquarters and site visits.</p>	<p>1.1 An appropriate rapid assessment technique, that is both sensitive and specific, can be determined.</p> <p>3.1 Dr. Kleinau knows what he is doing.</p> <p>4.2 Community members are willing to participate in the project.</p> <p>5.2 Checklist questions are asked in culturally appropriate ways.</p> <p>6.2 Adverse reactions are monitored properly.</p>
<p>Other Activities:</p> <p>In Field:</p> <p>1 Provide headquarters with monthly reports.</p> <p>2 Write quarterly and annual reports to headquarters who will submit them to USAID.</p> <p>In Headquarters:</p> <p>3 Procurement of capital equipment.</p> <p>4 General Backstopping.</p> <p>5 Assistance with quarterly and annual reports.</p> <p>USAID/VBC:</p> <p>6 Provide technical assistance with H/MIS.</p> <p>7 Organize and conducts midterm and final evaluation.</p>	<p>1.1 Monthly reports received regularly.</p> <p>2.1 Reports are received in timely fashion to be submitted to USAID.</p> <p>3.1 Equipment in place and functional</p> <p>4.1 Help/assistance required by field staff is provided</p> <p>5.1 Reports are written and submitted in timely fashion.</p> <p>6.1 H/MIS in place.</p> <p>7.1 Evaluations take place after 18, resp. 36, months</p>	<p>1.1 Headquarters records.</p> <p>2.1 Headquarters and USAID records.</p> <p>3.1 Inventory lists.</p> <p>4.1 Monthly reports, site visits, evaluations.</p> <p>5.1 USAID receives reports in regular intervals.</p> <p>6.1 Records from the field, evaluations.</p> <p>7.1 Evaluation reports.</p>	

#### IV KEY PLAYERS IN THE IMPLEMENTATION OF THE PROJECT

##### A. Ministry of Health of Cameroon (MOH)/ SESA

The MOH of the Republic of Cameroon is the primary implementor of the IDP. IEF and Tulane University are providing technical assistance and logistic support to help MOH in its effort to develop a self-sustainable model for ivermectin distribution. The MOH is planning to integrate the ivermectin distribution into the PHC network countrywide. In the target area, the PHC infrastructure of the MOH is being developed with technical assistance of the SESA project.

Two levels of integration are planned:

1) General oversight will be provided by the Directorate of Preventive and Rural Medicine of the MOH, which is responsible for the implementation of the PHC program and onchocerciasis control activities for the whole country.

2) At the divisional level, project activities will be integrated into the workplan of the Dja et Lobo health services in collaboration with the Divisional Medical Officer.

##### B. The International Eye Foundation

The International Eye Foundation (IEF) is a private voluntary organization dedicated to the prevention and cure of blindness in developing countries. IEF field operations provide training, equipment and medicines, clinical services, operational research and development of community-based programs through support for indigenous eye care organizations in 10 countries of Latin America, the Caribbean, Africa and Eastern Europe. A headquarters staff in Bethesda, Maryland provides support to IEF personnel in the field.

IEF was one of the first American PVOs to distribute ivermectin and is actively involved with five projects to control onchocerciasis in Guatemala, Nigeria, Cameroon and Malawi.

##### C. Tulane University School of Public Health and Tropical Medicine (TUSPH & TM)

TUSPH & TM in New Orleans has existed as a free-standing school since 1967, but the Department of Tropical Medicine has a much longer history as part of the Tulane School of Medicine. As one component of Tulane Medical Center, TUSPH & TM is composed of five academic departments (Biostatistics and Epidemiology, Health Systems Management, Tropical Medicine, Environmental Health and Applied Health Services) and an interdepartmental program

(International Health). During the past decade, TUSPH & TM has established strong research, training, and technical assistance programs in Sub-Saharan Africa; more African trainees have completed degree programs in the school than in any other U.S. schools of public health. Thus, an extensive network of Tulane-trained individuals occupy positions of responsibility in Ministries of Health in African Countries.

TUSPH & TM, with its widely-recognized programs in tropical medicine and international health, is ideally prepared to work with IEF and Cameroonian institutions in the proposed pilot project. TUSPH & TM has a special relationship with Cameroon by virtue of the 1985-90 USAID-funded "Health Constraints to Rural Production (Phase I) Project" in Cameroon.

This major research and training project established a parasitic disease research laboratory, including a snail reference laboratory for West Africa, completed nationwide mapping of schistosomiasis, and trained 10 Cameroonian scientists at the doctoral degree level in a broad range of disciplines (parasitology, epidemiology, malacology, behavioral sciences and environmental health). These trainees, who have recently returned to Cameroon, constitute a valuable pool of individuals who can be called upon to assist in the proposed project. Building on knowledge gained from the research conducted in Phase I, a second phase (1991-1994) will shift to active control (in close collaboration with the Ministry of Public Health) in the northern part of the country where over 80% of all schistosomiasis cases are found. Analogous to the challenge of introducing ivermectin distribution into onchocerciasis endemic zones, a key feature of schistosomiasis control involves delivery of praziquantel in a sustainable manner to target populations by incorporating it into the primary health care infrastructure. Thus, TUSPH & TM experience and its current program in Cameroon are directly relevant to the proposed ivermectin distribution pilot project. Because of its long working relationship with the Ministry of Public Health Officials (Tulane's technical assistance team spent 4-5 years in Yaounde), collaboration with the proposed project will be facilitated.

Furthermore, personal links and communication with the SESA project officials are established, further increasing the ability of the proposed project in Dja Et Lobo to get off to a smooth start.

TUSPH & TM faculty have also conducted a wide range of USAID programs in Africa: Rural Health Improvement Project (Niger) and the follow-on Niger Health Sector Grant; Family Planning Operation (Zaire); Zaire School of Public Health; Famine Early Warning Project (FEWS) in Burkina Faso, Chad, Mali, Mauritania, Niger and the Sudan; and Information and Planning Systems (Kenya).

## V HUMAN RESOURCES

The Project Director will be Dr. Basile Kollo, MD, MPH&TM, who will be supported in the field by a Project Assistant. Both are seconded to the project by the MOH. The Project Director will be supported by a secretary/bookkeeper and a driver, who will both be hired through the project.

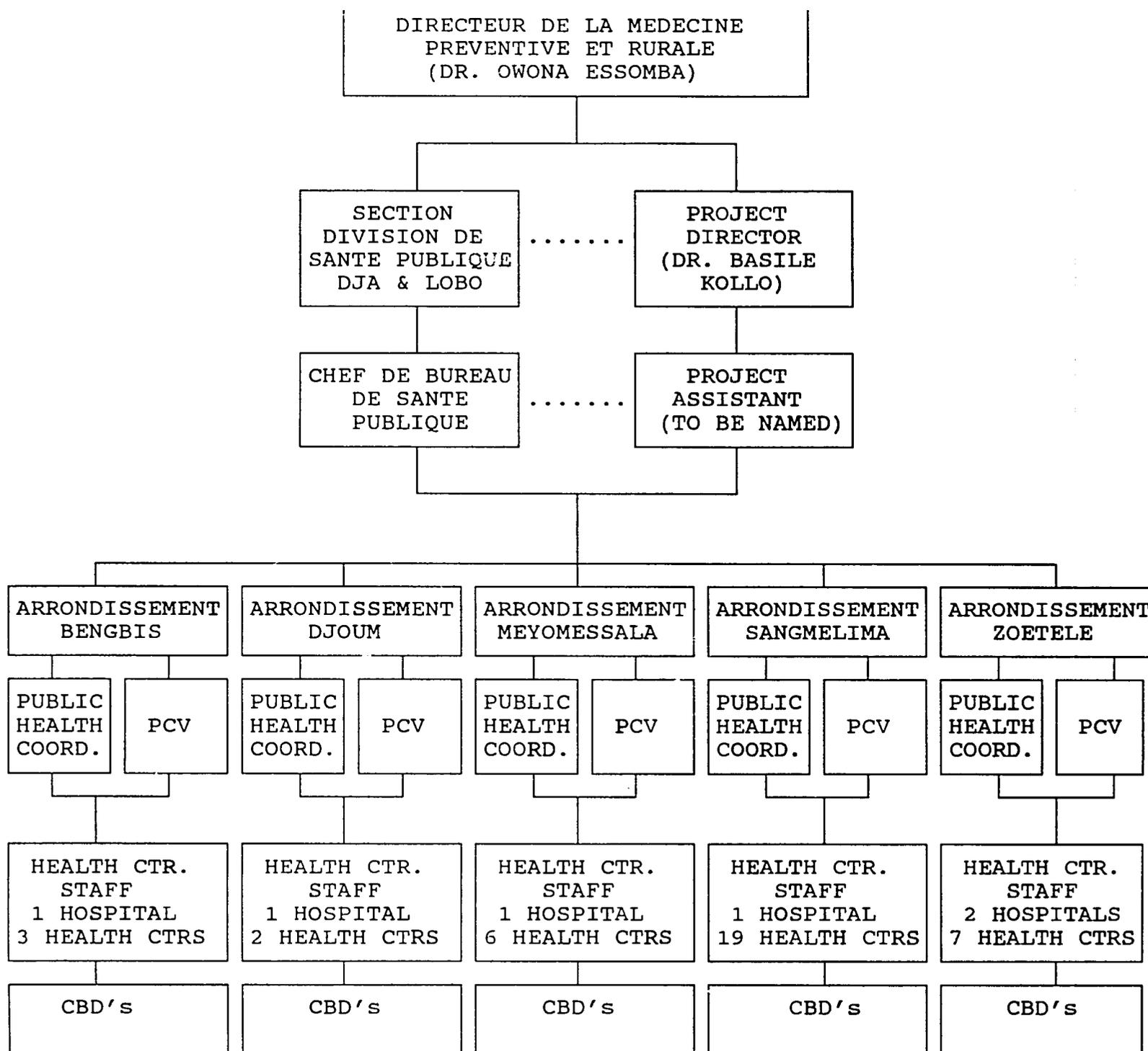
Five PHC coordinators and five Peace Corps Volunteers are in place. As counterparts to the PHC Coordinators, Peace Corps Volunteers (PCVs), brought to the project area through the SESA project, will participate in the IDP activities.

The staff of the health centers in the target area consists of at least one nurse per health center. These health professionals will be included in the IDP activities as trainers, ivermectin distributors as well as supervisors of village health representatives. They will be able to diagnose onchocerciasis by rapid assessment techniques and also to treat all levels of adverse reactions.

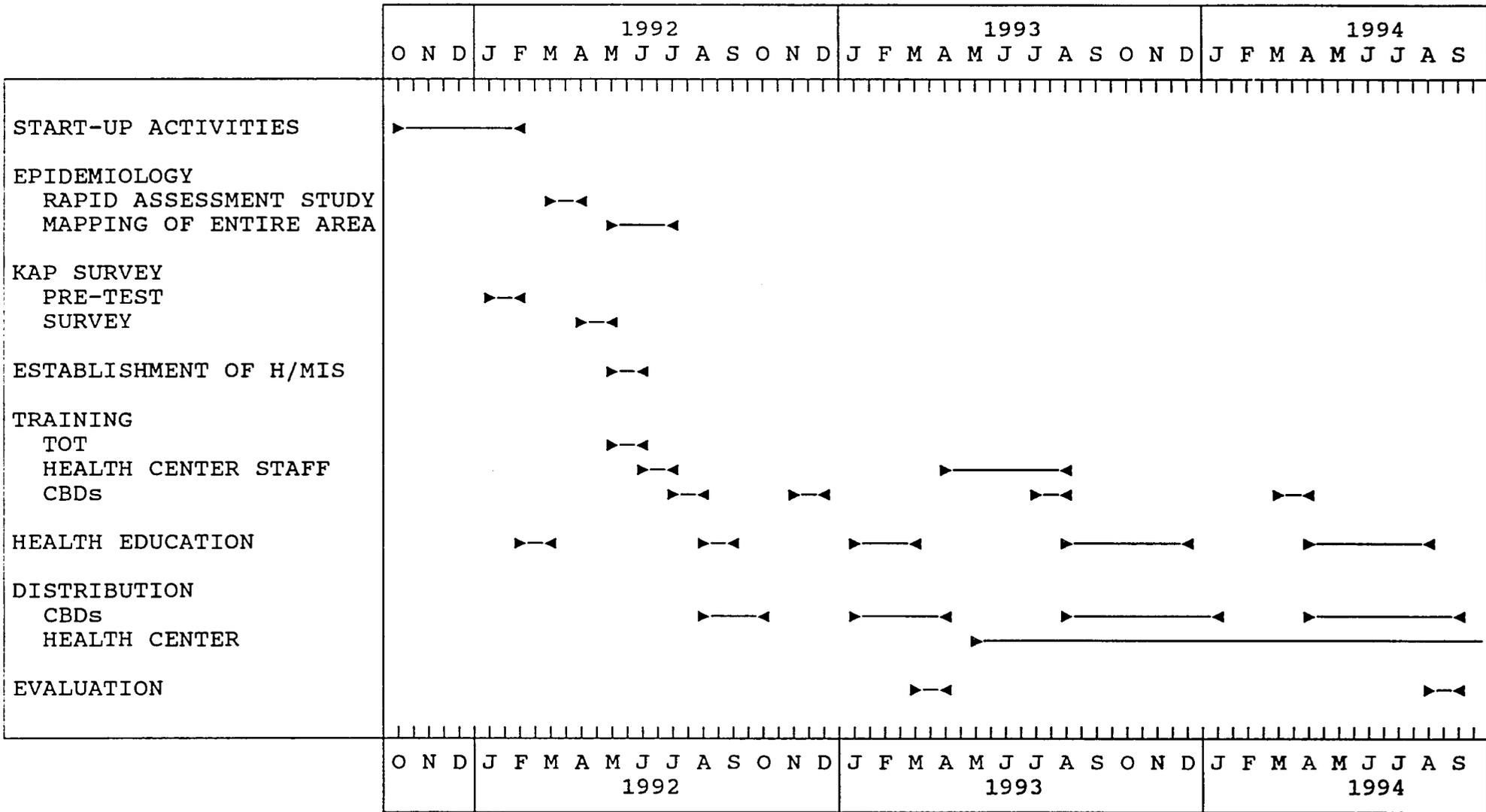
In areas with prevalence levels >40%, Community-Based Distributors (CBDs) will be trained to perform IDP related activities of health education, ivermectin distribution, monitoring of adverse reactions and timely referral of severe cases.

The Project Assistant, PHC Coordinators and PCVs will form the core staff that will function as trainers of trainers and supervisors of health center staff and CBDs over the life of the project. (See organigram on the next page.)

All other human resources besides the CBDs and collaborating local health center personnel will consist of key IEF/Tulane Headquarters staff and consultants, who will make periodic visits to provide managerial and technical assistance. For the Letter of Understanding between IEF and Tulane University, see Appendix III.



7I TIME TABLE



## VII PROGRAM ELEMENTS

### A. Start-up Activities

In September 1991, an IEF/Tulane team composed of Drs. Barney Cline, Basile Kollo, Christine Witte and Mr. Jack Blanks went to Cameroon to begin start-up activities. These activities included:

- Development and signing of Memorandum of Understanding (MOU) with the MOH (see Appendix II);
- Application for mectizan (See Appendix IV);
- Procurement of critical project equipment and supplies
- Establishment of field headquarters in the project area in Sangmelima;
- Recruitment and orientation of project staff;
- Initial contacts with communities and local authorities;
- Completion of DIP.

### B. Surveys

Activities: 1. Mapping of the prevalence of infection as a basis for setting control priorities by using traditional (skin-snip) and other (rapid assessment) methods.

2. Determination of the knowledge, attitude and behavior of the communities concerning onchocerciasis in order to plan appropriate health education messages.

#### 1. Epidemiological Survey

In the beginning of the project, the subdivision of Djoum in the target area was chosen for developing a rapid assessment strategy. This subdivision is already known to contain villages hyperendemic for onchocerciasis and is therefore an appropriate area for establishing the best rapid assessment method. For this, skin snips will be performed which will serve as the reference standard. Several methods of rapid assessment, such as palpation for nodules, observation of leopard skin and economic blindness, test for microfilaruria, DEC patch test, as well as establishing itching and excoriation indices, will be compared against this standard. (For the questionnaire to be used, see Appendix V.)

This study will be performed by the Project Director in collaboration with the core staff and is scheduled to be completed by the end of April 1992. Supervision will be provided by a technical assistance team from Tulane University.

Once an appropriate method of rapid assessment is established the entire project area will be mapped by the end of July 1992, to classify communities according to their level of endemicity. To be able to perform this task, the core staff and selected health center personnel will receive appropriate training prior to their active participation.

The result of this survey will be the basis for developing a distribution strategy: for areas with levels of prevalence  $\geq 40\%$  the strategy will be community-based mass distribution of ivermectin, whereas for areas with prevalence levels below 40%, the strategy will be selective treatment, i.e. health center-based (ivermectin treatment on an individual basis: demand driven distribution).

## 2. KAP Survey

Four distinct ethno-linguistic groups (Baka, Boulou, Fangs and Zaman) are found in the project area. This fact must be taken into account in the design of the KAP surveys. Probably, representative villages from each group will need to be included in the KAP survey if it is judged that they vary significantly with respect to disease-related beliefs and behaviors. Perception of onchocerciasis will obviously vary as a function of the level of endemicity. Consequently, efforts should be made to control for this factor (level of endemicity) if the four ethnic groups are to be surveyed, but this may not be feasible.

Some key issues to be addressed by the KAP are listed below:

- 1) Is onchocerciasis recognized as a specific illness (local name)?
- 2) What is (are) the cause(s)? (e.g., how is it acquired?) What percentage knows it is caused by a worm? What percentage knows it is acquired from a bite fly?
- 3) What is the natural history of the disease if untreated?
- 4) Is onchocerciasis distinguished from other filarial diseases? (Loiasis? Streptocerciasis?) Local names?
- 5) What symptoms are associated with onchocerciasis? (Blindness?) With other filariases? List all common signs and symptoms.
- 6) Do people seek treatment for onchocerciasis? Where? What? Cost?
- 7) Have people heard of ivermectin (Mectizan)? Where?
- 8) Do people seek treatment for other filariases (e.g. Loiasis)? Where? What? Cost? History of taking DEC within past year? Where purchased? Cost?
- 9) Perceived effect of DEC on onchocerciasis (do people avoid it because of adverse reactions?)
- 10) Elucidate (after listing common diseases in the community) those considered more serious than onchocerciasis.
- 11) Elucidate those diseases considered less serious than onchocerciasis.

- 12) What are the top three health (disease) concerns in the community?
- 13) What role do local healers play in the treatment of onchocerciasis?
- 14) Where there any skin snips taken in the community in recent years?
- 15) Beliefs and attitudes about skin snips.
- 16) Willingness to accept treatment (ivermectin) annually over a period of years. Preference to pay for each treatment, or pay once for all treatments.
- 17) Beliefs about nodules; e.g., should they be removed?
- 18) What diseases does Mectizan treat?
- 19) Importance of intestinal worms in the community? Is it good for children to get rid of their worms? Do parents seek treatment for their children? Where? At what cost?

These and similar kinds of information will greatly assist in designing strategies for communicating effectively with populations targeted for Mectizan.

#### C. Health/ Management Information System

- Activities:
- 1) Development of a system for processing and dissemination of information collected over the course of the project.
  - 2) Providing routine reports to the project participants and USAID.
  - 3) Assessing the project by a set of defined indicators.

To facilitate the process of data collection, Dr. Eckard Kleinau, an expert on health information systems subcontracted by VBC, has developed a set of forms. Of these, 17 were selected by the Project Director and the Onchocerciasis Program Coordinator of IEF in a meeting that took place in February 1992. The preliminary selection of forms can be found in Appendix VI. It should be noted, however, that these forms, both in number as well as in content are still subject to change. In April 1992, Dr. Kleinau will spend two weeks with the IDP in Guatemala to provide templates for the forms in the appropriate data base (FoxBase). As the forms proposed for the project in Dja et Lobo are almost identical to those chosen for Guatemala, much of that effort will be applicable to the situation in Cameroon. It is expected that the design of the H/MIS for the project in Dja et Lobo will be finalized by May 1992. This also means that both the number and content of the forms will have been decided by that time.

The project will be monitored on an ongoing basis, and monthly reports to the Onchocerciasis Program Coordinator at IEF/Bethesda will be produced by the Project Director. The information collected for monitoring and evaluation purposes will include a standard set of indicators, yet to be provided by Dr. Kleinau. (For a suggested preliminary - but not necessarily complete - list of indicators, see Appendix VII.) These will be determined for each round of treatment. Correlation analyses of these indicators will be possible (when appropriate) between community, mode of distribution (CBDs or clinic-based), and distribution round.

Using the MIS, financial reports will be prepared by the Project Assistant on a monthly basis. Reports to USAID will be provided on a quarterly basis. The format for these has been developed by Dr. Kleinau and can be found in Appendix VIII. In addition to the quarterly reports, the Project Director will prepare a very detailed annual report in which he will report on past year's activities as well as evaluate the project with respect to the achievement of objectives and long term goals. As for the quarterly reports, Dr. Kleinau developed a format for the annual report which can be found in Appendix IX. A midterm project review at the 18 month point and an end-of-project evaluation at the end of three years will be conducted by a team selected by USAID. An economic evaluation will be performed with the assistance of a Tulane health economist, who will assist in developing the conceptual framework (Scope of Work) for an externally funded consultant to address economic issues relevant to onchocerciasis control in the Cameroonian context. Members of the implementing parties may be associated with the evaluation and the results will be made accessible to the local organizations.

Publication, by outside evaluators, of data collected by project information systems, will be forbidden without the written consent of participating parties.

#### D. Training

Activities: Training of health personnel at the divisional, sub-divisional, health center, hospital and community level to distribute ivermectin, including community motivation/education and program record-keeping.

Training will take place on three levels:

a) Training of core staff (Training of Trainers)

The Project Director will coordinate the training of the core staff which consists of the Project Assistant, the PHC Coordinators and their Peace Corps Volunteer counterparts. All training for the core staff will be completed by the end of the third quarter.

This training will provide the core staff with the following skills:

- community education, motivation
- ivermectin distribution and monitoring/treatment of adverse reactions
- record- and bookkeeping
- ability to train health center personnel and CBDs
- ability to supervise health center personnel and CBDs

In addition, there will be specific training sessions of shorter duration where the core staff will learn to supervise personnel involved in the surveys (epidemiology and KAP).

b) Training of health center personnel

The training of health center personnel will be coordinated by the Project Director and the core staff. There will be two types of training sessions:

The first one will be of short duration to prepare the health center personnel for participation in the epidemiological and KAP surveys and will take place at the beginning of the third quarter.

A more intensive training of longer duration will be scheduled as soon as the result of the surveys are available and a treatment strategy has been developed by the Project Director. This is scheduled for July 1992. Health center staff in groups of approximately 20 persons will be gathered in a central location for a workshop of one week duration.

This workshop will provide the health center staff with the following skills:

- community education, motivation
- ivermectin distribution and monitoring/treatment of adverse reactions in their catchment areas
- record- and bookkeeping for health center-based cost-recovery system
- ability to train CBDs
- ability to supervise CBDs in their catchment areas

### c) Training of CBDs

The Project Director, together with the core staff, will coordinate the training of CBDs. This training will take place during the last quarter of the first year and will consist of the following:

In hyperendemic areas where mass distribution of ivermectin is the appropriate strategy, there will be the need to train CBDs for the following tasks:

- community education, motivation
- ivermectin distribution, monitoring of adverse reactions as well as treatment of minor reactions and timely referral of severe reactions in their villages
- record- and bookkeeping for community-based cost-recovery system

### E. Community Education/ Motivation

Activities: Following the KAP survey, maximizing community demand and acceptance for ivermectin by community level motivation and health education.

Community education and motivation will take place in two stages:

- 1) before conducting surveys:
  - to assure participation in surveys

The Project Director and the PHC staff will develop the appropriate messages which will be delivered to the targeted communities by the core staff.

- 2) before each distribution cycle of ivermectin:
  - to educate the communities about the disease and the drug
  - to enhance diagnosis and treatment seeking behavior
  - to assure early recognition of the most common adverse reactions for timely help seeking by the community

The messages for this education/motivation campaign will be developed by the Project Director and the PHC staff after the analysis of the KAP survey, which is scheduled to take place in April 1992. In hyperendemic areas where community-based mass distribution will be the strategy of choice, the message will be delivered to the community by the CBDs under the supervision of the core staff.

In areas with an onchocerciasis prevalence < 40%, where a health center based, selective treatment strategy will be applied, the core staff working with the community health committees and the health center staff will be responsible for delivering the health education message.

- In all areas, the messages will include the following:
- an introduction to the disease, the vector and the drug
  - how and where ivermectin can be obtained
  - how often the drug should be taken (annual treatment)
  - what are the possible adverse reactions and who to turn to in case adverse reactions occur
  - the actual benefits of the drug
  - that there will be a fee-for-service
  - who should not take the drug

F. Distribution of Ivermectin/ Monitoring of Adverse Reactions

Activities: Delivery of the appropriate dose of ivermectin to the eligible population of the endemic areas on an annual basis and monitoring, documenting and managing adverse reactions to ivermectin.

Distribution of ivermectin will occur through two modalities based on the level of prevalence:

a) Prevalence > 40%: Community-based mass distribution of ivermectin

Selected community members (CBDs) will be trained by the core staff to perform the following tasks:

- mobilization and health education to enhance treatment seeking behavior
- administering of ivermectin
- monitoring and treatment of moderate adverse reactions as well as timely referral of more severe cases
- record- and bookkeeping for cost-recovery related activities in the spirit of "prise-en-charge oncho"

b) Prevalence < 40%: Demand-driven, health center based distribution of ivermectin. This distribution scheme will be directed towards affected persons only.

The health center staff of the catchment area will be trained by the core staff to perform the following tasks concerning diagnosis and treatment of onchocerciasis:

- mobilization and health education of the communities of their catchment area to:
  - enhance the ability to self-diagnose onchocerciasis
  - seek treatment
  - recognize adverse reactions and seek treatment for them
- confirm the diagnosis by using rapid assessment methods
- administering of ivermectin
- monitoring and treatment of adverse reactions
- record- and bookkeeping for cost-recovery related activities in the spirit of "prise-en-charge oncho"

The mass distribution of ivermectin in the sub-divisions Bengbis, Djoum, Mintom and Oveng, is projected to start in August 1992 and will be completed by September 30, 1992. In this first round of distribution, only hyperendemic communities, (i.e. onchocerciasis prevalence levels > 40%) will receive treatment. The mode of distribution will be community-based, i.e. through CBDs.

In the first quarter of year two, the health education campaign will expand into the remaining three sub-divisions Meyomessala, Sangmelima and Zoetele. In the hyperendemic communities of these sub-divisions, community-based distribution will begin in January 1993 and will be completed by March 30, 1993.

Between, April and July, 1993, the 34 health centers will be capacitated to deliver ivermectin in hypoendemic areas on a passive basis. This will include training and/or refresher courses for the health center staff performed by the core staff followed by periodic supervision during the distribution phase. The catchment area of each health center will be sensitized to come for treatment on specific days of the week in order to assure appropriate management of adverse reactions by the core staff and or the health center staff. People present for treatment other than the specified days, will be required to remain in the vicinity of the health unit for 48 hours to assure prompt management of adverse reactions.

Over the next five months, i.e. between August and December 1993, the second round treatment (i.e. motivation followed by distribution) will be take place for all seven sub-divisions. This leaves April to August 1994 for the third round of treatment.

As part of the cost recovery mechanism, the PHCCs, PCVs, health center staff or CBDs - depending on the mode of distribution - will sell a small card to the community members. This will be a part of the community motivation campaigns. This small card must be presented to the distributor at the time of treatment. If a person does not have a card, they should be able to get one issued by the CBD who will keep a record of all cards issued. This should prevent the drug from being distributed to the same person twice. It is yet to be determined whether this card will be sold once for a long period of time (i.e. 10 years) or whether there will be a new card each year. The results of the KAP survey will help with this decision as it should demonstrate which mechanism the people would prefer.

CBDs will be trained to monitor their community for adverse reactions and to treat minor reactions. Additionally, there will be a health professional close by for 48 hrs to treat possible severe reactions. This could be the PHCC, if he is a nurse. Where the PHCC is not a medical professional, the Project Director, an MD, or the Project Assistant, a nurse, will remain in the area for 48hrs.

#### G. Supervision and Quality Assurance

Activities: Providing ongoing supervision on all levels.

The project has been designed from the onset to assure adequate supervision at all levels of the project. While the Project Director will assume overall responsibility, the core staff, consisting of the Project Assistant, the Primary Health Care Coordinators and their Peace Corps Volunteer counterparts, will play a key role. They will provide support and supervision to the health center staff and to the CBDs. While the health center staff will be able to supervise motivation- and distribution activities performed by CBDs in communities that are located in the vicinity of the health center, CBDs from more remote communities will depend on the core staff for supervision.

Adequate supervision is considered crucial especially in the context of Community-Based Distributors. As these CBDs are expected to work on a voluntary basis, it is essential that they feel supported throughout their activities. Lack of supervision and support could jeopardize longterm sustainability. The core staff will therefore spend a major portion of their time providing supervision to the CBDs.

To provide the Project Director and the core staff with the managerial tools to assess the performance of health center staff and CBDs, the H/MIS developed by Dr. Kleinau includes several forms which address quality assurance. While the actual usefulness of these forms still awaits testing, it is expected that the results will give the core staff and the Project Director the information required for helping the health center staff and CBDs improve their performance where necessary.

#### H. Plan for Sustainability and Integration into the PHC System

Activities: Close collaboration with Cameroon MOH officials to insure program compatibility with the newly-revised "Reorientation of PHC in Cameroon" AND maximizing program sustainability through integration into the existing PHC system which includes a cost-recovery strategy.

Due to the extent of the onchocerciasis problem in Cameroon and the fact that ivermectin kills only the microfilaria but not the adult worm, which can live up to 15 years, assuring continuous distribution of Mectizan over a long period of time is essential for the success of the program. IEF does plan to extend its commitment to combating onchocerciasis in the Division of Dja et Lobo beyond the initial three years of available funding. However, full involvement of local human resources is needed. As all the key project staff is seconded by the Ministry of Health, with Primary Health Care Coordinators and health center staff playing a major part in implementing this program, the need for involving and capacitating indigenous human resources is fulfilled.

As specifically mentioned in the Memorandum of Understanding between IEF and the MOH (see Appendix II), integration of the IDP into the primary health care (PHC) system is one of the main goals. In addition to using existing health care structures, this also means that a cost recovery system will be established. While it is not possible to charge for the drug itself, the people will be asked to pay for the service. As mentioned before, this will be achieved by selling cards prior to treatment. Community health committees will assist the project staff in establishing an adequate fee for service.

The new PHC structure, as designed in the "Reorientation of the Primary Health Care in Cameroon" in 1989, is not yet functional in most parts of the project area. However, it is envisioned that this IDP will help establishing basic PHC structures, such as organizing the communities and assisting the formation of health committees on the village level. Furthermore, distribution of ivermectin is thought to become a standard part of the PHC services rendered by the health centers. Therefore, in addition to diminishing the adverse effects of onchocerciasis, enhancing the overall effectiveness of PHC services in the onchocerciasis-endemic zones appears to be a realistic goal.

VIII BUDGET

Date: 30-Mar-92

Page 1

CAMEROON ONCHOCERCIASIS PROGRAM

HEADQUARTERS BUDGET	Year 1		Year 2		Year 3		Totals		Total
	AID	IEF	AID	IEF	AID	IEF	AID	IEF	
<b>I. PROCUREMENT</b>									
<b>SUPPLIES</b>									
General office	300	0	300	0	300	0	900	0	900
Computer software	450	0	450	0	450	0	1,350	0	1,350
<b>SUBTOTAL (PROC.)</b>	<b>750</b>	<b>0</b>	<b>750</b>	<b>0</b>	<b>750</b>	<b>0</b>	<b>2,250</b>	<b>0</b>	<b>2,250</b>
<b>II. EVALUATION</b>									
Admin/Report Costs	0	0	0	0	0	0	0	0	0
<b>SUBTOTAL (EVAL.)</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>
<b>III. INDIRECT COSTS (See G &amp; A Line Item on Next Page)</b>									
<b>IV. OTHER PROGRAM COSTS</b>									
<b>A. PERSONNEL</b>									
<b>TECHNICAL</b>									
<b>ONCHO Coordinator (33%)</b>									
Salary (\$36,000)	12,000	0	12,600	0	13,230	0	37,830	0	37,830
Fringe (25%)	3,000	0	3,150	0	3,308	0	9,458	0	9,458
<b>IEF Pro. Dir.(10%)</b>									
Salary (\$51,000)	5,100	0	5,350	0	5,600	0	16,050	0	16,050
Fringe (25%)	1,275	0	1,338	0	1,400	0	4,013	0	4,013
<b>Administrative Officer(8%)</b>									
Salary (\$40,000)	3,200	0	3,360	0	3,530	0	10,090	0	10,090
Fringe (25%)	800	0	840	0	883	0	2,523	0	2,523
<b>SUBTOTAL (PERS.)</b>	<b>25,375</b>	<b>0</b>	<b>26,638</b>	<b>0</b>	<b>27,950</b>	<b>0</b>	<b>79,963</b>	<b>0</b>	<b>79,963</b>

## CAMEROON ONCHOCERCIASIS PROGRAM

HEADQUARTERS BUDGET	Year 1		Year 2		Year 3		Totals		Total
	AID	IEF	AID	IEF	AID	IEF	AID	IEF	
<b>B. TRAVEL COSTS</b>									
International Travel									
ONCHO Coordinator									
5 RT airefares	5,000	0	3,000	0	3,000	0	11,000	0	11,000
60 days per diem	3,200	0	2,000	0	2,000	0	7,200	0	7,200
IEF Program Director									
4 RT airfare	3,500	0	1,500	0	1,500	0	6,500	0	6,500
40 days per diem	3,750	0	1,050	0	1,200	0	6,000	0	6,000
USA Travel									
IEF Program Director									
1 RT airfare pa	0	0	400	0	425	0	825	0	825
4 days per diem pa	0	0	480	0	510	0	990	0	990
SUBTOTAL (Trav.)	15,450	0	8,430	0	8,635	0	32,515	0	32,515
<b>C. OTHER DIRECT COSTS</b>									
Office Operations									
Telephone	1,250	0	1,250	0	1,250	0	3,750	0	3,750
Postage/Courier	750	0	750	0	750	0	2,250	0	2,250
A-110 Audit Fees	700	0	700	0	700	0	2,100	0	2,100
Subtotal (Other)	2,700	0	2,700	0	2,700	0	8,100	0	8,100
SUBTOTAL (IV)	43,525	0	37,768	0	39,285	0	120,578	0	120,578
SUBTOTAL I,II,IV	44,275	0	38,518	0	40,035	0	122,828	0	122,828
G&A (see proposal)	9,749	0	8,482	0	8,816	0	27,047	0	27,047
TOTAL HQ. COSTS	54,024	0	47,000	0	48,851	0	149,875	0	149,875

COUNTRY BUDGET

CAMEROON ONCHOCERCIASIS PROGRAM

	Year 1			Year 2			Year 3			Totals			
	AID	IEF/ RBF	MOH	AID	IEF/ RBF	MOH	AID	IEF/ RBF	MOH	AID	IEF/ OTHER	MOH	TOTAL
<b>PROCUREMENT</b>													
<b>EQUIPMENT and SUPPLIES</b>													
<b>TECHNICAL</b>													
Vehicle	0	26,000	0	0	0	0	0	0	0	0	26,000	0	26,000
Medical Equipment	0	1,500	0	500	0	0	500	0	0	1,000	1,500	0	2,500
Appliances	0	1,200	0	0	0	0	0	0	0	0	1,200	0	1,200
<b>OFFICE EQUIPMENT</b>													
Computers (2)	0	2,500	0	0	0	0	0	0	0	0	2,500	0	2,500
Printer	0	190	0	0	0	0	0	0	0	0	190	0	190
Volt. Reg./UPS	0	340	0	0	0	0	0	0	0	0	340	0	340
Office Furniture	0	3,000	0	0	0	0	0	0	0	0	3,000	0	3,000
Typewriter	0	120	0	0	0	0	0	0	0	0	120	0	120
Photocopier	0	680	0	0	0	0	0	0	0	0	680	0	680
Fax	0	430	0	0	0	0	0	0	0	0	430	0	430
Telephone	0	118	0	0	0	0	0	0	0	0	118	0	118
Hemigraph	0	1,000	0	0	0	0	0	0	0	0	1,000	0	1,000
<b>SUPPLIES</b>													
General Office	0	1,600	0	1,700	0	0	1,800	0	0	3,500	1,600	0	5,100
Paper/Printing	0	500	0	500	0	0	500	0	0	1,000	500	0	1,500
Train. Materials	0	2,500	0	2,500	0	0	2,500	0	0	5,000	2,500	0	7,500
Main./Ins.	0	700	0	1,000	0	0	1,000	0	0	2,000	700	0	2,700
Computer Software	500	500	0	0	0	0	0	0	0	500	500	0	1,000
Medical Supplies	500	500	0	0	500	0	0	500	0	500	1,500	0	2,000
<b>SERVICES</b>													
<b>University Services:</b>													
Salaries/Fringe	18,775	0	0	19,770	0	0	20,801	0	0	59,346	0	0	59,346
Consultant	2,000	0	0	2,000	0	0	2,000	0	0	6,000	0	0	6,000
Travel	5,000	0	0	5,000	0	0	5,500	0	0	15,500	0	0	15,500
Per Diems	3,000	0	0	3,000	0	0	3,500	0	0	9,500	0	0	9,500
Telephone	750	0	0	750	0	0	750	0	0	2,250	0	0	2,250
Postage	250	0	0	250	0	0	250	0	0	750	0	0	750
Gen. & Admin.	14,339	0	0	14,876	0	0	15,863	0	0	45,077	0	0	45,077
<b>Local Consultants</b>													
Enumerators & logistic support	0	2,000	0	1,500	0	0	1,500	0	0	3,000	2,000	0	5,000
<b>SUBTOTAL I.</b>													
	45,114	47,378	0	54,846	500	0	57,964	500	0	157,923	48,378	0	206,301
<b>EVALUATIONS</b>													
Consultants	0	0	0	0	0	0	0	0	0	0	0	0	0
Travel/Per Diem	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>SUBTOTAL II.</b>													
	0	0	0	0	0	0	0	0	0	0	0	0	0

## COUNTRY BUDGET

## CAMEROON ONCHOCERCIASIS PROGRAM

	Year 1			Year 2			Year 3			Totals			
	AID	IEF/ RBF	MOH	AID	IEF/ RBF	MOH	AID	IEF/ RBF	MOH	AID	IEF/ OTHER	MOH	TOTAL
<b>II. INDIRECT COSTS (See G &amp; A line item)</b>													
<b>IV. OTHER PROGRAM COSTS</b>													
<b>A. PERSONNEL</b>													
Project Director	0	0	18,200	0	0	20,000	0	0	22,000	0	0	60,200	60,200
OLA	0	6,800	0	0	6,800	0	0	6,800	0	0	20,400	0	20,400
Project Coord.	0	0	7,800	0	0	8,500	0	0	9,000	0	0	25,300	25,300
(Housing Allow.)	0	840	0	0	1,440	0	0	1,440	0	0	3,720	0	3,720
Admn. Asst./Bookkp	4,400	0	0	5,500	0	0	5,800	0	0	15,700	0	0	15,700
PHC Coord (5 @ 20%)	0	0	3,000	0	0	3,200	0	0	3,400	0	0	9,600	9,600
Peace Corps Vol.	0	0	0	0	0	0	0	0	0	0	0	0	0
(5 @ 20%)													
Watchman	1,650	0	0	2,000	0	0	2,100	0	0	5,750	0	0	5,750
Driver	0	3,290	0	0	4,000	0	0	4,200	0	0	11,490	0	11,490
<b>SUBTOTAL IV. A.</b>	<b>6,050</b>	<b>10,930</b>	<b>29,000</b>	<b>7,500</b>	<b>12,240</b>	<b>31,700</b>	<b>7,900</b>	<b>12,440</b>	<b>34,400</b>	<b>21,450</b>	<b>35,610</b>	<b>95,100</b>	<b>152,160</b>
<b>B. TRAVEL AND PER DIEM</b>													
<b>1. In-Country Travel</b>													
Staff per diem	4,500	2,000	0	4,750	2,000	0	5,000	2,000	0	14,250	6,000	0	20,250
Staff travel	2,000	0	0	2,000	0	0	2,000	0	0	6,000	0	0	6,000
<b>2. International Travel</b>													
<b>Professional Meet.</b>													
Airfare	0	0	0	2,500	0	0	2,500	0	0	5,000	0	0	5,000
Per Diems	0	0	0	1,000	0	0	1,000	0	0	2,000	0	0	2,000
<b>Relocation</b>													
(Airfare/Freight)	3,000	0	0	0	0	0	0	0	0	3,000	0	0	3,000
<b>SUBTOTAL IV. B.</b>	<b>9,500</b>	<b>2,000</b>	<b>0</b>	<b>10,250</b>	<b>2,000</b>	<b>0</b>	<b>10,500</b>	<b>2,000</b>	<b>0</b>	<b>30,250</b>	<b>6,000</b>	<b>0</b>	<b>36,250</b>

## COUNTRY BUDGET

## CAMEROON ONCHOCERCIASIS PROGRAM

	Year 1			Year 2			Year 3			Totals			
	AID	IEF/ RBF	MOH	AID	IEF/ RBF	MOH	AID	IEF/ RBF	MOH	AID	IEF/ OTHER	MOH	TOTAL
Other Direct Costs													
Vehicle Operat.													
Fuel	3,400	0	0	3,600	0	0	3,800	0	0	10,800	0	0	10,800
Maint./Spares	2,000	0	0	1,500	0	0	1,650	0	0	5,150	0	0	5,150
Ins/Lic/Reg	1,500	0	0	1,500	0	0	1,650	0	0	4,650	0	0	4,650
Office Operations													
rent-Office/House	0	4,800	7,200	0	4,900	7,500	0	5,000	7,800	0	14,700	22,500	37,200
Telephone/FAX	0	1,000	0	1,500	0	0	2,000	0	0	3,500	1,000	0	4,500
Postage/Courier	1,000	0	0	1,040	0	0	1,073	0	0	3,113	0	0	3,113
Utilities	2,000	0	600	2,000	0	650	2,000	0	700	6,000	0	1,950	7,950
Freight/Ins.	4,500	0	0	1,000	0	0	1,000	0	0	6,500	0	0	6,500
Training Sessions													
Per Diems	0	2,500	0	0	1,000	0	0	1,000	0	0	4,500	0	4,500
Supplies	0	0	0	0	500	0	0	500	0	0	1,000	0	1,000
Facilities	0	500	0	0	500	0	0	500	0	0	1,500	0	1,500
Total IV. C.	14,400	8,800	7,800	12,140	6,900	8,150	13,173	7,000	8,500	39,713	22,700	24,450	86,863
TOTAL IV. A.B.C.	29,950	21,730	36,800	29,890	21,140	39,850	31,573	21,440	42,900	91,413	64,310	119,550	275,273
TOTAL	75,064	69,108	36,800	84,736	21,640	39,850	89,537	21,940	42,900	249,336	112,688	119,550	481,574
(22.02%)	6,815	7,819	0	8,498	4,765	0	8,889	4,831	0	24,202	17,415	0	41,617
TOTAL	81,879	76,927	36,800	93,233	26,405	39,850	98,426	26,771	42,900	273,538	130,103	119,550	523,191
QUARTERS BUDGET	54,024	0	0	47,000	0	0	48,851	0	0	149,875	0	0	149,875
	135,903	76,927	36,800	140,233	26,405	39,850	147,277	26,771	42,900	423,413	130,103	119,550	673,066

**CAMEROON ONCHOCERCIASIS PROGRAM**

**BUDGET SUMMARY**

CATEGORY	Year 1		Year 2		Year 3		TOTAL	
	AID	IEF/MOH	AID	IEF/MOH	AID	IEF/MOH	AID	IEF/MOH
Equipment & Supplies	\$1,750	\$43,378	\$6,950	\$500	\$7,050	\$500	\$15,750	\$44,378
Technical Services	44,114	4,000	48,646	0	51,664	0	144,424	4,000
Salary & Fringe	31,425	39,930	34,138	43,940	35,850	46,840	101,413	130,710
Other Direct Costs	42,050	18,600	33,520	17,050	35,007	17,500	110,577	53,150
Travel/Grants & A	16,564	7,819	16,980	4,765	17,705	4,831	51,249	17,415
<b>TOTAL</b>	<b>\$135,903</b>	<b>\$113,727</b>	<b>\$140,234</b>	<b>\$66,255</b>	<b>\$147,276</b>	<b>\$69,671</b>	<b>\$423,413</b>	<b>\$249,653</b>

## IX APPENDICES

- I Epidemiological Data of the Project Area
- II Memorandum of Understanding between IEF and the Ministry of Health
- III Letter of Understanding between IEF and Tulane University
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- V Epidemiology Questionnaire
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- VII Preliminary List of H/MIS Indicators
- VIII Quarterly Report Format
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## EPIDEMIOLOGIE DU VIRUS HTLV1 AU CAMEROUN

**Objectifs**

Au mois d'avril 1990, l'OCEAC a réalisé une enquête dans le Sud Cameroun sur l'épidémiologie du virus HTLV1. Les objectifs de cette enquête sont d'évaluer la transmission familiale de cette rétrovirose et d'étudier les parasitoses intestinales et sanguines considérées ici comme cofacteurs éventuels.

**Choix du lieu de l'enquête.**

Les données épidémiologiques sur le virus HTLV1 en Afrique Centrale trouvées dans la littérature ainsi que l'expérience de l'OCEAC dans ce domaine nous ont conduit à réaliser cette étude dans le Sud Cameroun en région de forêt humide où la prévalence attendue devrait être élevée.

Nous avons choisi douze villages de la périphérie de la ville de Djoum, notre objectif étant d'identifier une population stable permettant des compléments d'étude dans l'avenir.

Le choix des villages a également été guidé par le souci que soient représentées dans notre échantillon les principales ethnies de cette région.

**Méthodologie.**

Un recensement exhaustif de chaque village a été effectué par une équipe de techniciens supérieurs en épidémiologie ayant une parfaite connaissance de la région et de la langue locale.

Lors de ce recensement, une fiche a été renseignée pour chaque foyer faisant état du nombre de personnes dans le foyer, de leur âge, de leur sexe, de leur ethnie, ainsi que des liens les unissant avec les autres membres de la famille.

Dans un deuxième temps une équipe d'enquêteurs constituée de 3 médecins et de 5 techniciens de laboratoire a procédé à la réalisation des prélèvements.

Pour chaque personne nous avons réalisé:

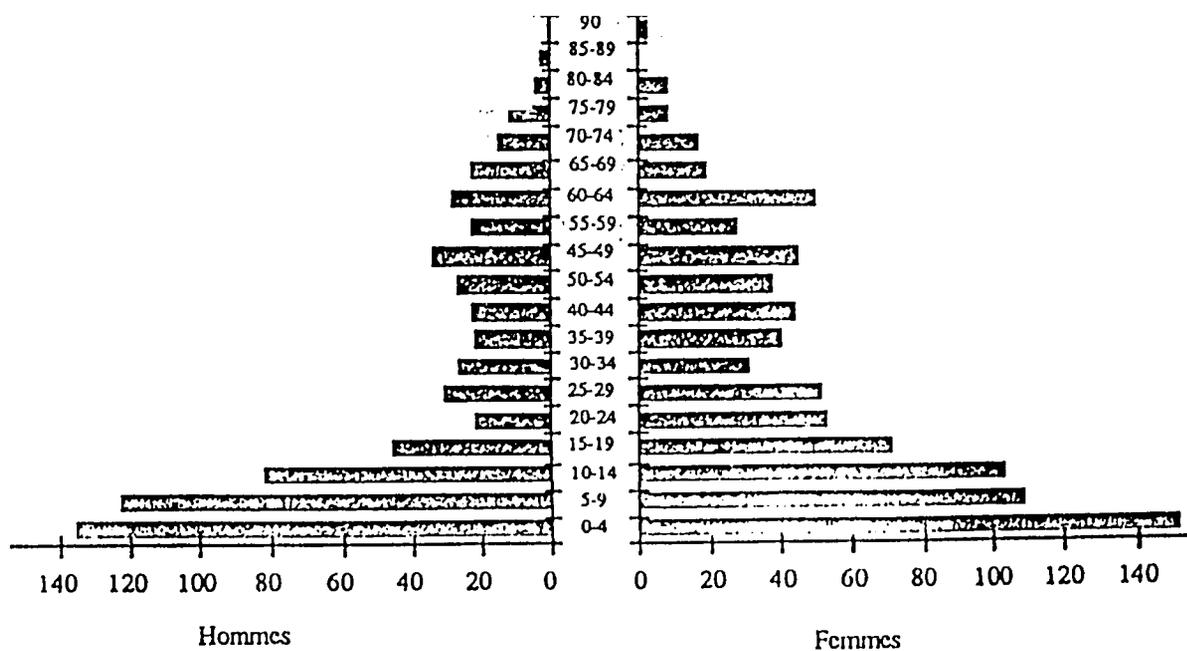
- \* Un prélèvement sanguin sur tube sec de 10 ml ou à défaut pour les enfants en bas âge sur microtinaire.
- \* Une goutte épaisse.
- \* Un prélèvement de selles
- \* Deux Snips

Quatre ethnies sont principalement représentées: les Boulous, les Zamans, les Fangs, et les Bakas.

ETN	Freq.	Percent	Cum.
Baya	12	0.8%	0.8%
Boulou	430	27.4%	28.2%
Foulbé	1	0.1%	28.3%
Gabonais	2	0.1%	28.4%
Ewondo	15	1.0%	29.4%
Fang	452	28.8%	58.2%
Fong	5	0.3%	58.5%
Mvele	1	0.1%	58.6%
Bikile	1	0.1%	58.6%
boum	2	0.1%	58.8%
Kaka	49	3.1%	61.9%
Belilis	4	0.3%	62.2%
Maka	3	0.2%	62.3%
Njem	29	1.9%	64.2%
Congolais	3	0.2%	64.4%
Baka	223	14.2%	78.6%
Equato-guiné	2	0.1%	78.7%
Eton	3	0.2%	78.9%
Yebekolo	9	0.6%	79.5%
Yambassa	1	0.1%	79.6%
Akoouakoum	1	0.1%	79.6%
bene	2	0.1%	79.8%
Mekai	1	0.1%	79.8%
Kyanga	1	0.1%	79.9%
Zaman	315	20.1%	100.0%
Total	1567	100.0%	

Nous avons inclus dans cette étude 883 femmes(56.3%) et 684 hommes (43.7%).

Pyramide des âges.



## Résultats sérologiques

Le taux de prévalence pour le virus HTLV1 reste à préciser. Les critères de positivité en Western Blot ayant récemment été remis en question, nous avons décidé de procéder à une deuxième confirmation des sérums trouvés positifs en ELISA par la technique de Radio Immuno Précipitation. Nous sommes dans l'attente des résultats de ces analyses qui sont réalisées à l'Institut de Médecine Tropicale d'Anvers.

La prévalence pour les treponematoses est de 14%.

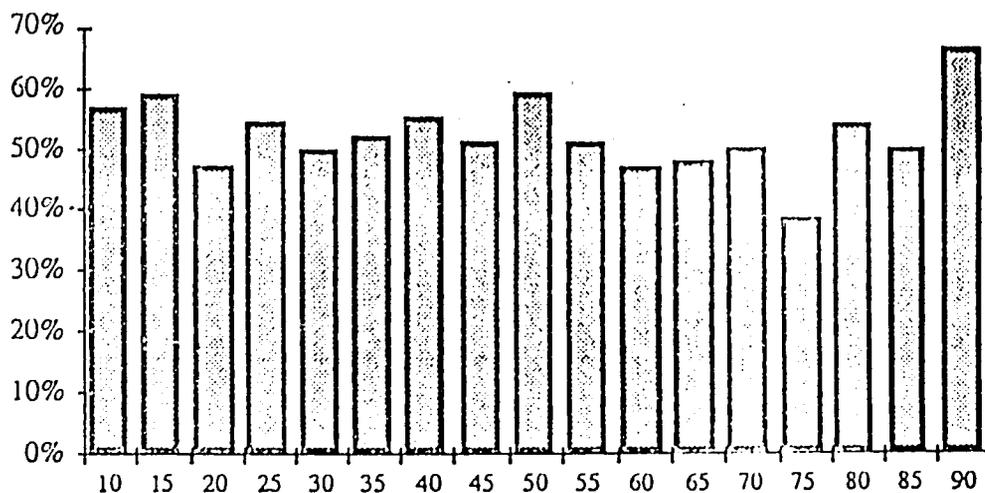
La prévalence pour le virus VIH est de 0.15%.

## Parasitologie

Vous trouverez sur la disquette jointe à ce rapport les résultats concernant l'onchocercose. Les Snips lus après 24 heures ont fait l'objet d'un comptage pour lequel nous n'avons pas recherché le degré de précision dont vous avez l'habitude dans les enquêtes spécifiquement orientées sur l'onchocercose.

Dans l'éventualité où vous réaliseriez le calcul des index, je serais intéressé par ces résultats.

Prévalence de l'onchocercose en fonction de l'âge (tous villages confondus)



Une rotation de chauffeurs permettaient de rapporter les prélèvements au laboratoire installé provisoirement par l'OCEAC dans une mission catholique de la ville de Djoum.

Au laboratoire 3 médecins biologistes recevaient les prélèvements.

La recherche de parasites intestinaux était faite selon les techniques de Baerman et de Kato, les snips étaient lus après 24 heures, les gouttes épaisses colorées le jour même, et les sérums allicotés dans six cryotubes et placés à +4°C avant leur acheminement sur Yaoundé et leur congélation à la température de -20°C.

## Résultats

### Population

Le recensement a porté sur 1627 personnes. Nous avons obtenu 1567 prélèvements sanguins, 60 personnes (3.5%) ayant refusé le prélèvement ou étant absentes le jour de notre passage.

La population se répartit sur les douze villages de la façon suivante:

VILLAGE	Freq	Percent	Cum.
Alop	114	7.3%	7.3%
Mibomela	35	2.2%	9.5%
Mekoto	214	13.7%	23.2%
Doum	183	11.7%	34.8%
↙ Mebane	192	12.3%	47.1%
Abouelone	103	6.6%	53.7%
Djouse	341	21.8%	75.4%
↙ Minko'o	127	8.1%	83.5%
Djouse	58	3.7%	87.2%
Ekoum	20	1.3%	88.5%
avebe	72	4.6%	93.1%
↙ Meyos III	108	6.9%	100.0%
Total	1567	100.0%	

## Prévalence de l'onchocercose en fonction des villages (tous âges confondus)



### Organisation du fichier "oncho" ( Dbase )

La numérotation des individus a été faite sur le principe suivant:

Une lettre pour chaque village (Champ Village)

Un nombre à deux chiffres pour le foyer ( Champ Foyer)

Un nombre à deux chiffres pour l'individu au sein du foyer. (Champ NUM)

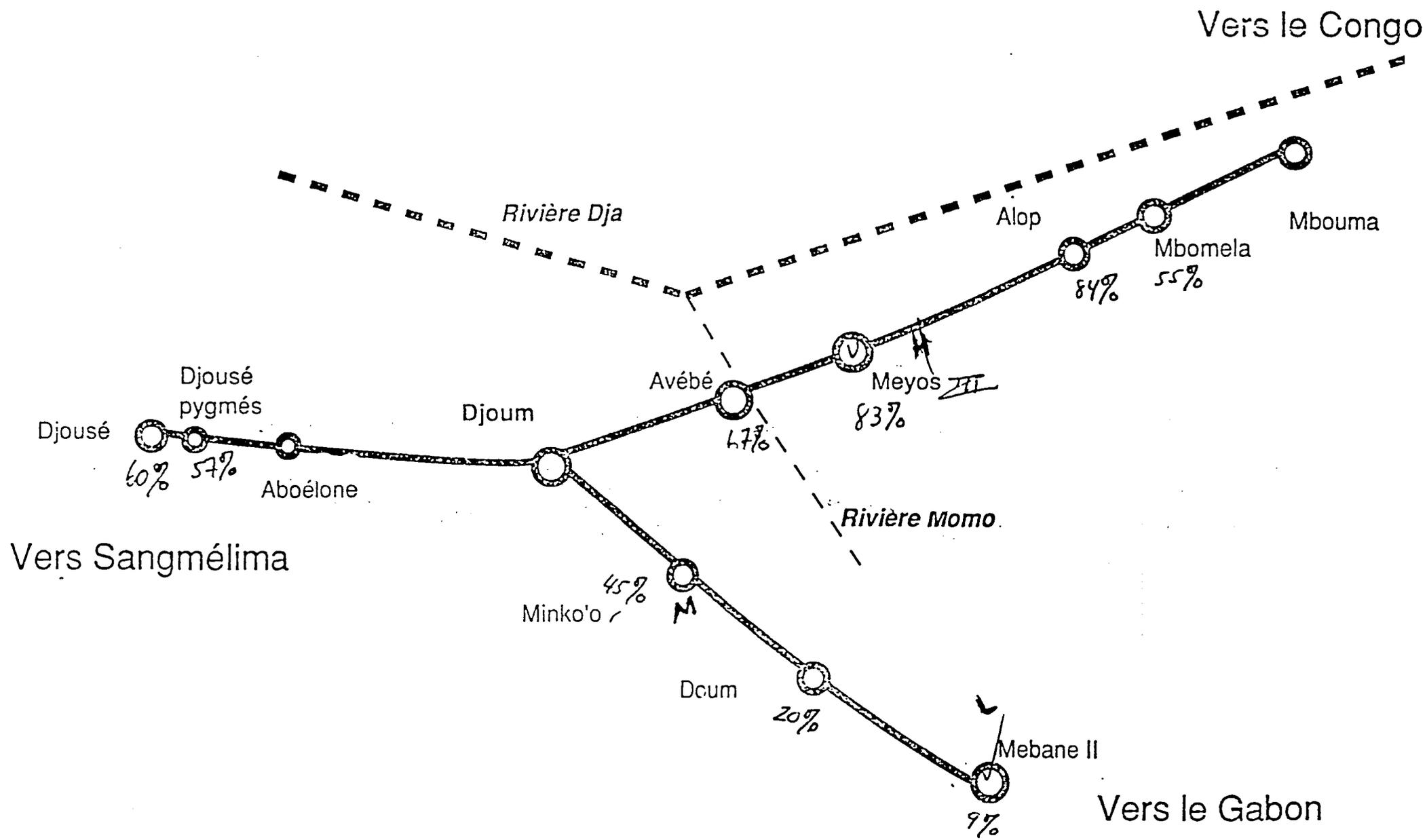
Un numéro récapitulatif a également été attribué à chaque personne, Les centaines correspondent au villages, les dizaines aux foyers, et les décimales à l'individu dans le foyer.

Le sexe a été codé "1" pour le sexe masculin et "2" pour le sexe féminin, l'âge en année l'ethnie selon une lettre.

Le Champ oncho donne la moyenne entre le comptage du snip droit et du snip gauche. Il est inscrit "-1" lorsque l'examen n'a pas été réalisé (enfants, absents, refus).

### Codage des villages

A	ALOP
B	MBOMELA
C	MEKOTO
D	DOUM
E	MEBANE
F	ABOUELONE
G	DJOUSE
H	MINKO'O
L	Campement pygmé de DJOUSE
M	EKOM
P	MEYOS III



Situation géographique des villages étudiés

APPENDIX II

MEMORANDUM OF UNDERSTANDING  
BETWEEN  
THE MINISTRY OF PUBLIC HEALTH OF THE  
REPUBLIC OF CAMEROON  
AND  
THE INTERNATIONAL EYE FOUNDATION

PROTOCOLE D'ACCORD  
ENTRE  
LE MINISTERE DE LA SANTE PUBLIQUE  
DU CAMEROUN  
ET  
LE INTERNATIONAL EYE FOUNDATION

Dated:

Date du:

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MEMORANDUM OF UNDERSTANDING

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BETWEEN:  
The Ministry of Public Health  
(herein after known as "MOH")

ENTRE:  
Le Ministère de la Santé Publique  
(MSP)

AND  
The International Eye Foundation  
(IEF)

ET  
Le International Eye Foundation  
(IEF)

It is agreed as follows:

Il est convenu ce qui suit:

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Art. 1: GOAL OF THE AGREEMENT

The purpose of this agreement is to set out the understanding of the Parties named above ("parties") particularly with respect to the assistance described below.

Art. 2: IEF ASSISTANCE

to the Ministry of Public Health will be to combat Onchocerciasis

Art. 3: DEFINITION OF PURPOSE AND INTEGRATION INTO PHC

IEF will assist the Ministry of Public Health of Cameroon to introduce a mechanism for the annual distribution of ivermectin to be integrated into the existing primary health care (PHC) infrastructure in the target area.

The project will undertake the following additional project outputs to assure the integration of ivermectin distribution activities into the PHC program in Dja et Lobo Division:

1. Ivermectin distribution activities will be included in the annual health plans of the seven subdivisions in the targeted area.

2. The PHC cost recovery program will be expanded to include a service fee for onchocerciasis treatment.

3. Ivermectin information and supervision guidelines will be integrated into the supervision and health information systems established under the PHC program.

4. Ivermectin training materials and training programs will be adapted to the overall integrated training strategy of the PHC program.

Art. 1: BUT DE L'ACCORD

Le présent accord a pour but de définir les termes de l'entente entre les parties ci-dessus mentionnées ("parties") notamment en ce qui concerne l'assistance décrite ci-dessous par les parties.

Art. 2: IEF s'engage à donner son ASSISTANCE au Ministère de la Santé Publique dans la lutte contre l'Onchocercose

Art. 3: NATURE DE L'ASSISTANCE ET INTEGRATION AU SEIN DE L'INFRASTRUCTURE LOCALE DES SSP

IEF va assister le Ministère de la Santé Publique dans l'introduction d'un mécanisme de distribution de l'ivermectine qui soit intégrée dans la structure déjà existante de Soins de Santé Primaires (SSP) dans la zone cible.

Les activités ci-après seront menées par le projet afin d'assurer l'intégration de la distribution de l'ivermectine dans le programme des SSP du département du Dja et Lobo:

1. Les activités de distribution de l'ivermectine seront intégrées dans les plans d'action annuels des activités de santé des 7 arrondissements au niveau de la zone cible.

2. Le programme du recouvrement des coûts des SSP sera adapté afin de prévoir des frais liés à la prise en charge pour le diagnostic et le traitement de l'onchocercose.

3. Les instructions sur les modalités pratiques de distribution et de supervision des campagnes de l'ivermectine seront intégrées au système des SSP.

4. Les matériels et les programmes de formation ayant trait à l'ivermectine seront adaptés à la stratégie globale de formation des SSP.

Art. 4: OBJECTIVES OF ASSISTANCE

IEF assistance will strengthen the performance of the Ministry of Public Health (MOH), particularly in the following areas:

- 1) Program planning, organization and management
- 2) Epidemiologic baseline surveillance to determine the prevalence of infection as a basis for setting control priorities and strategies.
- 3) KAP survey and other behavioral studies to develop appropriate health education materials as applied to Onchocerciasis.
- 4) Training of health personnel at various levels of the health infrastructure in the target area.

Art. 5: IEF PROJECT ASSISTANCE COMPLETION DATE

The project assistance completion date is 31 July 1994. The assistance may be extended beyond this date at the discretion of IEF with the agreement of both parties and depending on the availability of funds.

Art. 6: ANNUAL REVIEW AND FUNDING CYCLE

The anticipated funding level will be up to a maximum of \$150,000 annually, subject to availability of funds. An annual review of program progress conducted jointly by IEF and the MOH, will serve as the basis for planning and approval of the subsequent year's budget. IEF's financial contributions will be managed by IEF, according to work plans mutually agreed upon by both parties.

Art. 4: OBJECTIFS DE L'ASSISTANCE

L'assistance de IEF consistera à mettre l'accent sur le renforcement des performances du Ministère de la Santé Publique, notamment dans les domaines ci-après:

- 1) Planification, organisation et management du programme,
- 2) Etudes épidémiologiques de base en vue de déterminer les taux de prévalance de l'Onchocercose en vue d'établir les priorités et les stratégies appropriées de contrôle.
- 3) Des études "KAP" en vue de la confection de matériels éducatifs appropriés pour la prévention de l'Onchocercose.
- 4) Formation du personnel de santé à différents niveaux de l'infrastructure sanitaire au niveau de la zone cible.

Art. 5: DATE DE FIN DE L'ASSISTANCE DE IEF

La date de fin de l'assistance de IEF est fixée au 31 Juillet 1994. Toutefois, cette date pourra être prorogée à la discrétion de IEF en accord avec l'autre partie et compte tenu de la disponibilité de fonds.

Art. 6: EVALUATION ANNUELLE ET CYCLE DE FINANCEMENT

Le budget prévisionnel est de \$150.000 au maximum par an suivant la disponibilité des fonds. Une évaluation annuelle de l'évolution du programme effectuée conjointement par IEF et le MSP servira de baromètre au planning et à l'approbation du budget pour l'année suivante. La contribution financière de IEF sera gérée par IEF, suivant les plans de travail établis d'un commun accord par les deux parties.

Art. 7: IEF's OBLIGATIONS

IEF agrees to:

- 1) Provide a full-time project director throughout the project funding period. This project director will be responsible for collaborating directly with the MOH officials at various levels.
- 2) Provide project related supplies, equipment and vehicles.
- 3) Furnish a secretary/ bookkeeper and a driver.
- 4) Provide short-term technical assistance as appropriate and mutually agreed upon and described in the implementation plan.
- 5) Provide financial support for specific project activities as determined in the implementation plan.
- 6) Provide additional support to program partners, such as technical documentation and short-term training for project and related personnel within Cameroon according to the implementation plan and technical requirements of the project.
- 7) Conduct a midterm evaluation at the end of the first trimester of 1993. (USAID will conduct an independent final evaluation).

Art. 7: OBLIGATIONS DE IEF

IEF s'engage à:

- 1) Fournir un directeur de projet à plein temps pendant toute la durée de financement du projet. Ce directeur du projet sera responsable entre autre d'assurer une collaboration étroite avec les responsables du MSP à tous les niveaux de la hiérarchie.
- 2) Fournir les matériels et équipement afférents au projet ainsi que les véhicules.
- 3) Pourvoir un secrétaire/comptable et un chauffeur.
- 4) Fournir une assistance technique de courte durée selon les besoins avec l'accord des deux parties et comme prévue dans le plan d'action.
- 5) Financer certaines activités spécifiques prévues dans le plan d'action et le budget annuel.
- 6) Fournir un soutien supplémentaire aux personnes associées au programme à travers une documentation technique et la formation à court terme du personnel au Cameroun selon les besoins et compte tenu du plan de travail pre-établi et les nécessités techniques du programme.
- 7) Procéder à l'évaluation à mi-phase du projet avant la fin du premier trimestre de l'année 1993, L'USAID ayant prévu une évaluation finale du projet par un groupe indépendant.

Art. 8: OBLIGATIONS OF THE MOH

The MOH agrees to the following in-kind contributions:

- 1) Provision of adequate office space for the project
- 2) Secondment of a full-time project assistant to the project director and the chief medical officer.
- 3) The active participation of the MOH and related local PHC personnel in the execution of the activities of the project.
- 4) Direct participation in the preparation of annual work plans which will be the basis for budgetary and implementation decisions.
- 5) Participation in the mid-term evaluation of the project.
- 6) Provision of duty-free importation of project related supplies and equipment and vehicles.
- 7) Provision of duty-free importation of personal household effects and vehicle of the IEF project director.

Art. 9: SPECIAL CONVENTIONS

All equipment and vehicles purchased under this project assistance will be transferred to the MOH upon completion of the assistance. But if at any time during the execution of this assistance, a vehicle is damaged, the vehicle may be transferred to the MOH before the end of the assistance or sold at auction. The proceeds of this auction may be used for project-related expenses. The same applies

Art. 8: OBLIGATIONS DE MSP

Le MSP s'engage à fournir en nature les contributions ci-après:

- 1) Des locaux adéquats pour le projet.
- 2) Un assistant à plein temps pour seconder le directeur du projet et le chef de Bureau de Santé
- 3) Le personnel du MSP pour exécuter les activités du projet au niveau de la zone cible et assurer la participation active de tous les autres intervenants.
- 4) Le MSP participera étroitement à l'élaboration des plans de travail annuels qui serviront de base aux provisions budgétaires et à la prise des décisions.
- 5) Le MSP participera à l'évaluation en mi-phase du projet.
- 6) Une exonération des douanes pour l'importation de matériels, équipements et véhicules destinés au projet.
- 7) Une exonération des douanes des effets personnels et un véhicule personnel pour le directeur du projet.

Art. 9: DISPOSITIONS PARTICULIERES

Tout l'équipement et matériel roulant acheté dans le cadre du projet seront transférés au MSP à la fin de l'assistance, mais si au cours de l'exécution de l'assistance, pour le matériel roulant il y a un accident, ce matériel peut être transféré au MSP avant la fin du projet ou vendu aux enchères. L'argent obtenu peut être utilisé pour les besoins du projet. Il en est de même pour le matériel et fournitures du bureau

to unusable equipment during the project life.

Art. 10: COMMUNICATIONS

Any notice, request, document or other communication submitted by either party to the other under this Agreement will be in writing or by telegram or by cable. Any of these correspondences would be deemed duly received by the acknowledged addressees. The mailing addresses of the parties are:

Ministry of Public Health:

Minister of Public Health  
Yaounde  
Republic of Cameroon

International Eye Foundation

The Project Director  
IEF  
c/o SDSP, Dja et Lobo  
Sangmelima  
South Province  
Cameroon

and:

Headquarters:

IEF  
7801 Norfolk Ave.  
Bethesda, MD. 20814  
U.S.A.

qui ne sont plus utilisables au cours du projet.

Art. 10: COMMUNICATIONS

Tout avis, demandes, documents ou autres communications soumis par l'une des parties à l'autre dans le cadre du present accord seront par lettre, telegramme ou cable, et ne produiront des effets juridiques que lorsqu'ils seront reçus par le destinataire. Les adresses postales des parties sont:

Ministère de la Santé Publique:

Ministre de la Santé Publique  
Yaoundé  
République du Cameroon

International Eye Foundation

Le Directeur du Projet  
IEF  
s/c SDSP, Dja et Lobo  
Sangmelima  
Province du Sud  
Cameroun

et:

Son Siège:

IEF  
7801 Norfolk Ave.  
Bethesda, MD. 20814  
U.S.A.

Art. 11: REPRESENTATIVES

For all purposes relevant to this agreement, the MOH will be represented by the individual holding or acting in the office of Minister of Public Health, and IEF will be represented by the individual holding or acting in the office of the Executive Director of IEF in Bethesda, Maryland, each of whom, by written notice, may designate additional representatives for all purposes.

Art.12: MODIFICATION OF THE AGREEMENT

If at any time during the implementation of this assistance, either party wishes to modify this agreement, such modification shall be made by means of an exchange of official letters between the parties indicating their agreement with the proposed modification.

Art.13: CANCELLATION OF THE AGREEMENT

This agreement can become null and void, should either party so desire, by written notice giving a minimum of 90 days fore-warning, and an acknowledgement of the notice by the other party. However, any misunderstanding as to the interpretation, execution, etc. of the present agreement will be resolved amicably.

Art.14: LANGUAGE OF INTERPRETATION

This project agreement is prepared in English and French. The English version shall be considered controlling for purposes of interpretations

Art.11: REPRESENTATION

Aux fins d'application du présent accord, le MSP sera représenté par les personnes qui remplissent la fonction de MSP et IEF sera représenté par la personne qui remplit les fonctions de Directeur du IEF à Bethesda, Maryland, chacun ayant le pouvoir, par notification écrite de désigner d'autres représentants à toutes fins.

Art.12: AMENDEMENT DE L'ACCORD

Si, au cours de l'exécution de ce protocole d'assistance l'une des parties veut procéder à son amendement, ce sera par l'échange de lettres officielles entre les deux parties donnant leur accord sur les modifications proposées.

Art.13: RESILIATION

Le présent protocole d'accord peut être dénoncé à tout moment par l'une des parties contractantes et expire quatre vingt dix jours après réception de l'autre partie considérée comme destinataire, de la lettre de dénonciation. Toutefois, tout différend relatif à l'interprétation, l'exécution, etc... du présent protocole d'accord se règlera à l'amiable.

Art.14: LANGUES D'INTERPRETATION

Le present accord d'assistance est préparé en anglais et en français. En cas de litige seule la version anglaise fera foi.

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In witness WHEREOF, the MOH and IEF, each acting through its duly authorized representatives, have caused this agreement to be signed in their names and delivered as of the day and year first above written.

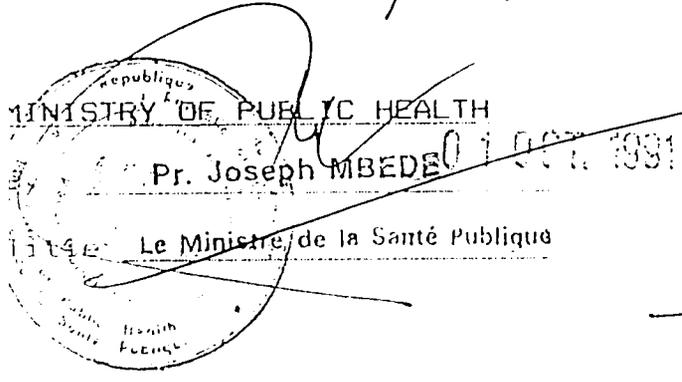
En foi de quoi, le MSP et IEF, chacun agissant par l'intermédiaire de leurs représentants dûment mandatés, ont fait et signé cet accord en bonne et due forme en vertu des pouvoirs dûment conférés à cet effet, à la date et à l'année indiquées en premier lieu ci-dessus.

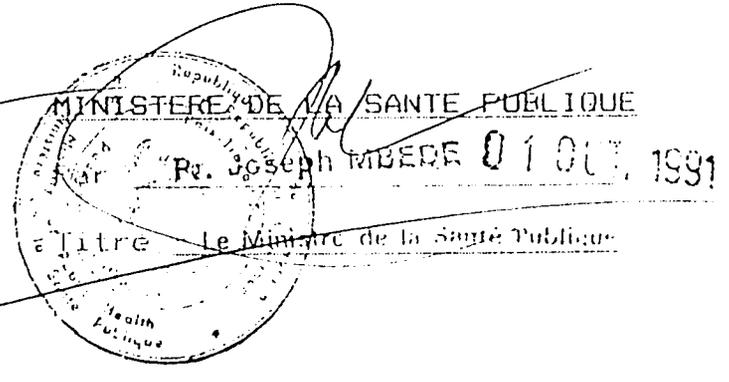
IEF

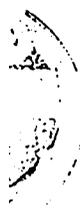
By Joseph B. Blank  
Title Director of Programs

IEF

Par Joseph B. Blank  
Titre Directeur des Programmes

  
MINISTRY OF PUBLIC HEALTH  
Pr. Joseph MBEDE 01 OCT 1991  
Le Ministre de la Santé Publique

  
MINISTERE DE LA SANTE PUBLIQUE  
Pr. Joseph MBEDE 01 OCT 1991  
Le Ministre de la Santé Publique

 Tulane University Medical Center

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School of Public Health and Tropical Medicine  
Office of the Dean  
1430 Tulane Avenue  
New Orleans, Louisiana 70112  
(504) 588-5397

March 1, 1991

Mr. Jack Blanks  
Director of Programs  
International Eye Foundation  
7801 Norfolk Avenue  
Suite 200  
Bethesda, MD 20814

Dear Mr. Blanks,

This letter expresses the intent of Tulane University School of Public Health and Tropical Medicine to collaborate with International Eye Foundation in implementing several USAID-funded ivermectin distribution programs. The likely sites of these programs will be Cameroon, Guatemala, and Zaire. They will be conducted over a 3 year period with a starting date of approximately 7/1/91.

The role of Tulane will be to provide technical assistance and special services as required for the successful implementation of the programs and as mandated by USAID in their Request for Application.

Tulane, as per our mutual understanding, will be remunerated through a subcontract that will be described in detail in the project proposal.

Sincerely,



J.T. Hamrick, M.D., M.P.H.  
Acting Dean  
Tulane University School of Public Health  
and Tropical Medicine

APPLICATION FOR MECTIZAN®

INTERNATIONAL EYE FOUNDATION

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Applicant Institution

SEPTEMBER 16, 1991

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Date (Month, Day, Year)

CS

**PART A: Applicant Institution**

Applicant Institution:  INTERNATIONAL EYE FOUNDATION		
Address: Street: 7801 Norfolk Avenue <hr/> City: Bethesda, Maryland <hr/> Province/State: _____ <hr/> Country: U.S.A		
Telephone Number: 301-986-1830	Telex: 67304 96 IEF UR	FAX: 301-986-1876
Name of person to be contacted about this application: Jack Blanks Director of Programs		
Title: above		
Telephone Number: same as above	Telex: above	FAX: above

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1. Please describe your Institution:

- Specify its type (e.g., hospital, dispensary, public health agency, industry, university, or other type of health care organization):

Non-governmental Health Organization

- Describe services offered (e.g., health care, public health, employee health):

Clinical and Public Health care programs dedicated to the prevention and cure of blindness in developing countries.

- Specify sources of financial and other support for the proposed Mectizan® treatment program:

This program entitled "The Cameroon Ivermectin Distribution Project - Dja et Lobo Division" will be financed over the next three years with a grant of \$423,000 from USAID. IEF will contribute additional funds as needed. The MOH of Cameroon has pledged "in-kind" support in excess of \$100,000.

2. Is your institution affiliated with any other health care or related organizations (e.g., medical school, disease control program, mission board)?

Yes  No

If "Yes," please name organization(s) and describe affiliation:

In this particular project the IEF has affiliated itself with the School of Public Health and Tropical Medicine at Tulane University.

3. How many full-time people are on your institution's staff? 30

Physicians: 8 Nurses: 3

Other health care personnel: MPH's = 5 PH.D's = 3

How many full-time people will work in the Mectizan® treatment program?

Cameroon only:

Physicians: 1 Nurses: 0

Other health care personnel: 4 M.D. s part-time  
27 Nurses part-time

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## PART B: Mectizan® Treatment Program Proposal

### 4. Identify the treatment program leaders:

#### *PROGRAM DIRECTOR*<sup>1</sup>

Name: Dr. Basile Kollo

Affiliation: Project Director - IEF Ivermectin Distribution Program, Cameroon

Title: Project Director

- Please include curriculum vitae or résumé with the application.<sup>2</sup>

#### *MEDICAL SUPERVISOR*<sup>3</sup>

(If same as Program Director, indicate "same as above.")

Name: "same as above"

Affiliation: \_\_\_\_\_

Title: \_\_\_\_\_

- Please include curriculum vitae and copy of medical practice license or equivalent certification with the application.

---

<sup>1</sup>The Program Director need not be a physician, but experience in managing health activities is desirable.

<sup>2</sup>Curricula vitae or résumés should include *relevant* information about education and experience. (Do not include lists of publications or other information not relevant to the individual's ability to function in the proposed position.)

<sup>3</sup>The Medical Supervisor must be a licensed physician. Public health experience and experience with onchocerciasis are also desirable. The Program Director and Medical Supervisor may be the same person



RÉPUBLIQUE UNIE DU CAMEROUN  
 PAIX · TRAVAIL · PATRIE  
 UNITED REPUBLIC OF CAMEROON  
 PEACE · WORK · FATHERLAND



UNIVERSITÉ DE YAOUNDÉ



UNIVERSITY OF YAOUNDE

CENTRE UNIVERSITAIRE DES SCIENCES DE LA SANTE N° 250/82  
 THE UNIVERSITY CENTRE FOR HEALTH SCIENCES

Vu le décret n° 69/27/256 du 14 Juin 1969 Mindful of decree n° \_\_\_\_\_  
 Vu le décret n° 72/796 du 20 Décembre 1973 Mindful of decree n° \_\_\_\_\_  
 Vu l'arrêté n° 0131/c/29/171 MEDUC/DE du 31 Juillet 1975 Mindful of order n° \_\_\_\_\_

Nous soussignés, attestons que M. Kollo Basile  
 We the undersigned testify that

Né à La Mecque de Niangna République Unie du Cameroun le vingt quatre Mai Mil Neuf Cent Cinquante Six  
 Born at \_\_\_\_\_ on the \_\_\_\_\_

est admis au grade de  
 was admitted to the degree of

Docteur en Médecine  
 Doctor of Medicine

Mention Très Honorable

Fait à Yaoundé, le 28 OCT. 1975  
 Signed at Yaounde.

L'IMPÉTRANT  
 THE HOLDER



LE VICE-CHANCELLIER  
 THE VICE-CHANCELLOR

LE MINISTRE DE L'ÉDUCATION NATIONALE  
 THE MINISTER OF NATIONAL EDUCATION

ZE NGUIE René

## CURRICULUM VITAE

**BASILE KOLLO**

### **PERSONAL:**

[REDACTED]

Permanent address: Ministry of Health, Yaounde, Cameroon.  
Present address: Tulane University School of Public Health  
Department of Tropical Medicine, 1501 Canal Street, New-Orleans, LA  
70112.

Language: French, English.

Military Service in Cameroon.

### **EDUCATION:**

1975 Baccalaureate (Maths and Natural Sciences), University  
of Yaounde.  
1982 Doctorate of Medicine, University of Yaounde.  
1990 Master of Public Health and Tropical Medicine, Tulane  
University, USA.

### **PROFESSIONAL CAREER:**

1982-1984: Chief Medical Officer, Preventive and Rural  
Medicine service, Mayo-Sava Division, Extreme-North Province,  
Cameroon. Coordination of preventive medicine activities in an area  
of 200 000 inhabitants, including expanded program of  
immunization, leprosy and tuberculosis control, primary health care.

1984-1987: Divisional Chief Medical Officer, Mayo-Sava  
Division, Extreme-North Province, Cameroon. Director of a Divisional  
hospital of 80 beds, supervision of 14 rural health clinics, 2  
subdivisional hospitals and coordinator of preventive medical  
activities in the Division. Director of pilot Guinea worm  
eradication program.

1987-1989: Chief, Rural Medicine Services, Ministry of Health,  
Yaounde. Deputy-Director of National Primary Health Care  
Program. National coordinator of the Onchocerciasis pilot control  
program. National coordinator of Guinea worm eradication program.  
Deputy-Director (training), USAID-Cameroon child survival  
project (Projet BEBA).

FELLOWSHIPS, CONSULTANTSHIPS:

Sept. 1987: W.H.O. Fellowship.

Resource person for leadership training, International Center for Technical Cooperation among developing countries (Non-align Movement), Brioni Island, Yugoslavia.

Nov/Dec. 1987: German Technical Cooperation (GTZ).

Evaluation of the GTZ primary health care project in the North-West of Cameroon, Bamenda.

Feb/March 1988: U.N.D.P.

Training for the Prevention of blindness, Bamako, Mali, Africa.

Sept/Oct. 1988: Save the Children Foundation.

Evaluation of child survival program, Ntui-Yokadouma, Cameroon.

AUG 1989: TDR/W.H.O. Fellowship.

MPH&TM Training. Training Grant extended in 1990 for Training at the Sc.D level, at Tulane University School of Public Health and Tropical Medicine.

**MECTIZAN® INVENTORY CONTROLLER**

(The person responsible for keeping supplies of the drug and issuing it as required.)

Name: Dr. Mbam Mbam

Affiliation: Chief Medical Officer in Charge (Division of Dja et Lobo)

Title: Ministry of Health

5. **Describe the geographic area in which your program will operate.** Use specific place names whenever possible (villages, river valleys, administrative sectors, etc.). Please include a map showing the treatment program area (a hand-drawn map is acceptable) with the application.

The target area of the project covers the northern portion of the Division of Dja et Lobo in the South Province of Cameroon. Project headquarters will be located in Sangmelima, the Divisional capital. (See attached Maps).

6. **What is the total population of this area?**<sup>4</sup> 150,000

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<sup>4</sup> This number refers to all those who live and/or work in the area. In some instances, this number would be the population of the region, area, or village. In other instances, it could be the number of persons who attend a particular hospital or clinic, or the number of employees of a company and their families.

7. **Estimate the prevalence of onchocerciasis among the people of this area:<sup>5</sup>**

50+ % Briefly explain the basis of this estimate:

This figure is based on the available epidemiological data.  
(See attached report).

8. **Estimate the percentage of people with onchocerciasis who are blind:<sup>6</sup>**

       % Briefly explain the basis of this estimate:

No definitive study on blindness prevalence has been conducted in the Dja et Lobo area. However, the IEF feasibility team that visited the area in September 1991 identified cases of onchocercal blindness.

9. **Describe how your program will operate. (Check all that apply.)**

- We will treat persons in one or more communities.
- We will offer treatments in a hospital or dispensary to which patients will come.
- We will offer treatments in both ways.
- We will offer treatments in other ways. Describe them:

---

<sup>5</sup>This estimate should be based on all reliable information: epidemiological surveys of cases (clinical or laboratory), hospital or dispensary records, Ministry of Health estimates, etc.

<sup>6</sup>By blind, we mean vision so badly impaired that a person's normal activities are seriously hindered (e.g., cannot work, cannot walk without assistance). Remember to estimate only blindness caused by onchocerciasis.

gb

10. Check the statement that best describes the people to be treated in your program:

- All people eligible to receive Mectizan®.<sup>7</sup>
- Both confirmed and suspected cases of onchocerciasis.<sup>8</sup>
- Only confirmed cases of onchocerciasis.<sup>9</sup>

Briefly describe why you chose this treatment plan:

Mass distribution will be used in hyperendemic communities, while passive clinic and hospital based treatment will be used in communities of lower endemicity.

11. Will your program provide Mectizan® treatment at no charge?<sup>10</sup>

- Yes    No, a fee will be charged

If "No," explain why a charge is being made, what it will cover, and how the charge compares with the charge for comparable services you provide.

Mectizan will be provided free of charge, however a modest service fee to recover administrative costs as mandated by the cost recovery program of the MOH will be charged.

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<sup>7</sup>The rationale for treating all people eligible to receive Mectizan® is a high prevalence of the disease.

<sup>8</sup>Suspected cases of onchocerciasis are identified by means of *suggestive* clinical signs and symptoms.

<sup>9</sup>Confirmed cases of onchocerciasis are generally identified by means of laboratory procedures and/or clear clinical signs and symptoms.

<sup>10</sup>It is expected that programs will **not** require payment for Mectizan® treatment. If you do propose to charge for treatment, your program must adhere to the following policies:

- Fees cannot include a charge for Mectizan®. They can include charges for expenses associated with treatment, such as administrative expenses.
- Fees must be low and consistent in amount with charges made by the applicant for comparable health services.
- No one can be denied treatment because of inability to pay

12. How many people do you intend to treat?<sup>11</sup> 60,000 in the first year (CY 1992).

13. How often do you intend to treat them?<sup>12</sup>

Yearly       6-monthly

If 6-monthly, please explain why:

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<sup>11</sup> Estimate how many people will be treated with Mectizan® in your proposed program. Base this estimate on your answers to previous questions (size of the population, prevalence of the disease, who will be treated).

Recall that the following groups should not receive Mectizan® treatment (and should therefore not be included in this figure):

- Persons weighing less than 15 kg (usually children less than 5 years old)
- Pregnant women
- Women breast feeding infants less than 1 week old
- Seriously ill persons

<sup>12</sup> Generally, everyone being treated with Mectizan® will be retreated once a year. However, where onchocerciasis is highly endemic, or among people who are heavily infected, retreatment can be at 6-month intervals.



**PART C: Agreements**

**IN IMPLEMENTING THE PROPOSED COMMUNITY-BASED MASS TREATMENT PROGRAM, THE APPLICANT INSTITUTION AGREES TO:**

1. Inform community leaders, hospital/dispensary personnel, and the population being served about:
  - what Mectizan® does,
  - what Mectizan® will NOT do (e.g., cure blindness),
  - the need for periodic retreatment,
  - possible adverse effects of treatment,
  - availability of health services for a minimum of 36 hours after treatment.
  
2. Ensure that the number of Mectizan® tablets given to each person is based on his/her weight on the day of treatment according to the following table:

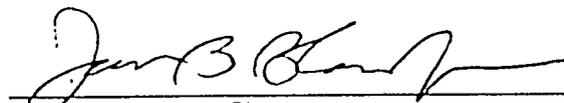
Patient Weight (KG)	Number of Tablets
Less than 15	None
15 - 25	½
26 - 44	1
45 - 64	1½
65 or more	2

3. Ensure that each person treated receives the correct number of tablets/half tablets and swallows them.
  
4. Ensure that the following persons do **NOT** receive Mectizan® treatment:
  - Persons weighing less than 15 kg (usually children less than 5 years old)
  - Pregnant women
  - Women breast-feeding infants less than 1 week old
  - Seriously ill persons — particularly persons with meningitis

APPLICATION FOR MECTIZAN®

5. Ensure that persons for whom treatment is withheld (underweight, pregnant, etc.) are offered treatment at another time.
6. Maintain adequate records of the patients treated.
7. Submit a completed "Summary of Mectizan® Treatment Program Report" to the Mectizan® Expert Committee at the conclusion of each year of treatment.
8. Monitor all persons taking Mectizan® for serious adverse experiences possibly associated with treatment for at least 36 hours following treatment; and provide suitable personnel, facilities, and equipment to diagnose and treat patients who need care.
9. Complete and submit to Merck & Co., Inc. a "Serious Adverse Experiences Report Form" for every patient who has a serious adverse experience possibly associated with Mectizan® treatment.
10. Continue the treatment program for at least 3 consecutive years.

AGREED TO ON BEHALF OF APPLICANT INSTITUTION BY:



Signature of Program Director

Jack B. Blanks, Director of Programs

Name - Please print or type

International Eye Foundation

Applicant Institution

09/18/91

Date (Month, Day, Year)

**INFORMATION FROM THE MINISTRY OF HEALTH  
FOR THE  
MECTIZAN® EXPERT COMMITTEE**

The following information is provided to The Mectizan® Expert Committee with reference to the attached application for Mectizan®.

**Status of Applicant as Health Care Provider**

Is this applicant a recognized health care provider known to give competent and responsible medical care services?

Yes  No  Unknown

**Qualifications of Program Director**

Is the Program Director whose name appears on the application known to be competent and to have abilities suitable for directing the proposed Mectizan® treatment program?

Yes  No  Unknown

**Qualifications of Medical Supervisor**

Is the physician whose name appears on the application licensed and qualified for this position?

Yes  No  Unknown

**Ministry of Health Support**

Will the Ministry of Health directly support this program (for example, with staff, vehicles, fuel, supplies, materials)?

Yes  No If "Yes," please explain:

The Ministry of Health will provide office space and assure the participation of PHC staff from the Ministry in the Dja et Lobo area.

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TRANSMITTAL MEMORANDUM

TO: Minister of Health

Government of the Republic of Cameroon

FROM: Applicant Institution: International Eye Foundation

Street: 7801 Norfolk Avenue

City: Bethesda,

Province/State: Maryland 20814

Country: U.S.A.

The enclosed "Application for Mectizan®" is a request for the drug Mectizan® (ivermectin, MSD) with which to treat onchocerciasis. One step in the application process is to inform the Ministry of Health that an application is being submitted and to request Ministry comments. Therefore, would you kindly respond to the questions on the attached form and return the form to me at the above address.

Thank you very much.

Sincerely,

Jack Blanks

Name of Program Director



September 16, 1991

Date

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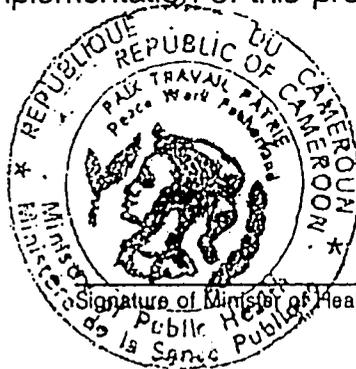
The Government will assure free entry of Mectizan® into the country and delivery to applicant without imposing duty, tax, or other cost.

Yes  No If "No," please explain:

The Ministry agrees to the implementation of this program.

Yes  No

9/16/1991  
Date (Month, Day, Year)



POUR LE MINISTRE DE LA SANTE PUBLIQUE  
ET SA DELEGATION  
LE DIRECTEUR DE LA MEDECINE PREVENTIVE  
ET RURALE

Dr OWONA ESSOMBA René  
MEDECINE GENERALE

Name — Please Print or Type MASTER OF PUBLIC HEALTH

Director of Preventative and Rural Medicine  
Title

Ministry of Health  
Address

Yaounde  
City

Cameroon  
Country

(237) 22 44 19  
Telephone

(237) 22 33 84  
FAX

8565 KN  
Telex

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APPENDIX V

MINISTERE DE LA SANTE PUBLIQUE, CAMEROUN.  
Projet Onchocercose du Dja et Lobo (Sangmelima).

QUESTIONNAIRE

[ne rien  
ecrire  
ici]

Arrondissement de ..... [ \_ ]  
Canton ou Groupement de ..... [ \_ \_ ]  
Classification du village 0=hypo; 1=meso; 2=hyper. .... [ \_ ]  
Nom du village ..... [ \_ \_ ]  
Numero de la concession/maison ..... [ \_ \_ ]  
Numero du sujet ..... [ \_ \_ ]

Donnees demographiques

1. Nom et prenom .....; Age.....ans... [ \_ \_ ]  
2. Duree de residence dans le village .....ans ..... [ \_ \_ ]  
3. Occupation principale: 1=planteur; 2=pecheur;  
3=enseignant; 4=forestier; 5=employe de bureau;  
6=autre; ..... [ \_ ]  
4. Occupation secondaire: 1=planteur; 2=pecheur;  
3=enseignant; 4=forestier; 5=employe de bureau;  
6=autre; ..... [ \_ ]

Antecedents

5. Chirurgicaux: 0= non  
1= oui, pour nodulectomie  
2= oui, mais pas pour nodulectomie  
3= oui, pour nodulectomie et autre cause [ \_ \_ ]  
6. Medicaux: a/Avez-vous ressenti des demangeaisons au  
niveau de la peau au cours des 2 dernieres semaines?  
0= non  
1= oui ..... [ \_ ]  
b/ Si oui, vous ressentiez ces demangeaisons:  
1= pendant la journee seulement  
2= la nuit seulement, mais je dors bien  
3= la nuit et cela m'empeche de dormir  
4= de jour et de nuit ..... [ \_ ]

Histoire actuelle

7. Souffrez-vous d'une maladie pour laquelle vous prenez un  
traitement de facon reguliere?  
0= non  
1= oui (montrer carnet sante), traitement  
antifilarien  
2= oui, mais sans rapport avec les filaires [ \_ ]

8. Avez-vous remarqué un nodule sur votre corps?  
 0= non  
 1= oui (montrez) ..... [ ]
9. Avez-vous remarqué une depigmentation sur votre peau?  
 0= non  
 1= oui (montrez) ..... [ ]

Medicaments utilises

10. Antifilariens: 0= non 1= oui ..... [ ]  
 Si oui:(demander le nom et la date/periode approximative de la derniere prise du medicament).

	0=non	1= 0-6mois	2=6-12mois	3=>1an	
a/Ivermectine (=Mectizan)	( )	( )	( )	( )	..... [ ]
b/Notezine	( )	( )	( )	( )	..... [ ]
c/Autre1	( )	( )	( )	( )	..... [ ]
d/Autre2	( )	( )	( )	( )	..... [ ]

11. Prenez-vous un medicament antipalustre regulierement?  
 0= non  
 1= oui, 1 fois par jour  
 2= oui, 1 fois par semaine  
 3= oui, 1 fois par mois ..... [ ]

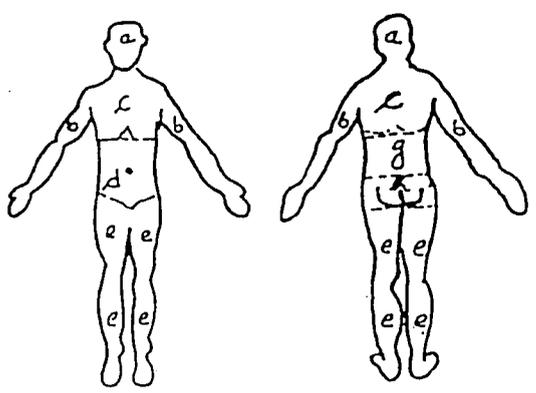
12. Prenez-vous un medicament autre que antifilarien et antipalustre? 0= non 1= oui ..... [ ]

Si oui:(demander le nom et la posologie )

	0=non	1=/jour	2=/semaine	3=/mois	
a/Antihistamine	( )	( )	( )	( )	..... [ ]
b/corticoides	( )	( )	( )	( )	..... [ ]
c/nonidentifiable	( )	( )	( )	( )	..... [ ]

Examen physique

13. Localisation des nodules:(marquez d'une croix le site des nodules sur le schema ci-dessous).



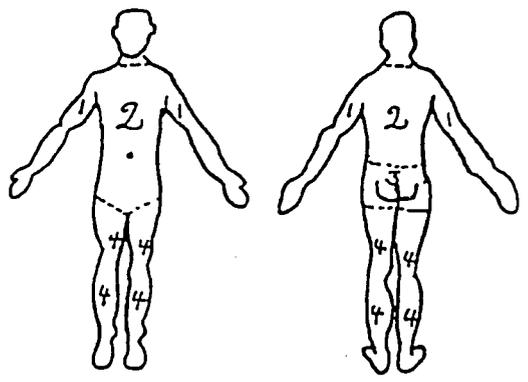
- (..=)a/Tete ..... [ ]  
 (..=)b/membres superieurs [ ]  
 (..=)c/thorax ..... [ ]  
 (..=)d/abdomen ..... [ ]  
 (..=)e/membres inferieurs [ ]  
 (..=)f/thorax posterieur.. [ ]  
 (..=)g/region lombaire ... [ ]  
 (..=)h/fesses ..... [ ]

6/5

14. Total des nodules (=....) ..... [ ]

15. Peau de leopard:  
0= non  
1= oui  
2= incertain ..... [ ]

16. Lésions de grattage sur le corps: (encercler le(s) site(s) correspondant(s) ci-apres).



00= non  
01= memb. sup  
02= tronc  
03= fesses  
04= memb. infr  
05= incertain ..... [ ]

17. Numero de l'échantillon d'urine ..... /././..

18. Numero de l'échantillon d'urine de controle, si oui /././..

61

**HOUSEHOLD IVERMECTIN TREATMENT (Version B)**

NAME:				ID number in this household				Total persons sleeping in this household				Page
YEAR of Treatment	AGE	Under 5 Years	Pregnant	Delivered last week	Very sick	To be treated (tick)	Dose given	Date treated	Remark	Had Anti-helminth week before	Mild reaction	Severe reaction
1.												
2.												
3.												
4.												
5.												
6.												
7.												
8.												
9.												
10.												

Advantage: Complete status of person for every treatment episode. More information related to quality (adherence to exclusion criteria). History of reactions for each treatment. Indication of a possible interaction between Ivermectin and anti-helminthic drugs.

Disadvantage: Maintenance of many thousand records over 10 years (virtually impossible under field conditions).

Alternative: Include the relevant information about health status, pregnancy, reactions, anti-helminths, etc. in the ID card and do periodic quality checks by abstracting information from the ID card and combining it with the treatment form. Requires some common identifier on both, for example the household number and name of head of the household.

HEALTH EDUCATION RECORD

1 Serial Number ..... \_\_\_\_\_  
 2 **Month / Year** ..... \_\_\_\_\_  
 3 Name of CBW ..... \_\_\_\_\_  
 4 Community Name ..... \_\_\_\_\_

Health education sessions:

Date	Main Topics Covered (list top 3 only)	Methods Used (flip chart, oral presentation, brochures, film, video, group discussion, etc.)	Group Targeted (women, all people, males over 20, etc.)	In Which Setting Was Health Education Delivered?			Number of Participants
				Meeting Community Leaders	Meeting with Community	House to House Education	

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MEETING RECORD

This form can be used to summarize the discussion and main resolutions of: Health Committees, meetings of the local or state onchocerciasis control teams, of the personnel of health facilities, etc. The last section allows a follow up during later meetings to monitor achievements of previous decisions.

- 1 Date of meeting .....
- 2 Meeting of... ..
- 3 Location .....
- 4 Name of chairman .....
- 5 Name of secretary .....
- 6 Name of rapporteur .....
- 7 Number attending the meeting .....

Main topics

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Main resolutions and decisions

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---



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Signatures

Chairman	Secretary	Rapporteur
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Follow up of resolutions and decisions

Date:

---



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**SUPERVISORY CHECKLIST (Standard)**  
(Used by Local Oncho-Control Team)

1	Serial Number . . . . .	_____
2	Date . . . . .	_____
3	Name of supervisor . . . . .	_____
4	Name of health worker . . . . .	_____
5	Name of community . . . . .	_____
6	Ivermectin distribution period covered (dates: from - to) . . . . .	_____

Page 1 similar to Kwara State:

- Collect weighing scale
- Collect remaining Ivermectin tablets and enter the number: . . . . . \_\_\_\_\_
- Collect Household Ivermectin Treatment Records  
Count the total number of records: . . . . . \_\_\_\_\_
- Total the number of Ivermectin tablets on each household record: \_\_\_\_\_
- Collect the Reaction Forms.  
Count the total number of reaction forms: . . . . . \_\_\_\_\_  
Count the number of persons with **SERIOUS** reactions: . . . . . \_\_\_\_\_

Evaluate a random sample of 10 people with a mild reaction --> complete Form 15:  
Follow up each case of serious reaction --> complete Form 15:

**Remember: Discuss shortcomings with the CBW help her/him to improve, be supportive not punitive.**

- Pick at random 10 Household Treatment Records. Ask the CBW to help you find the household that correspond to each of these 10 records. Visit the 10 households and use Form Number 16 AND 17 to interview the residents --> complete Form 16 AND 17:

**Remember: Discuss shortcomings with the CBW help her/him to improve, be supportive not punitive.**

- According to the evaluation above, is the CBW's performance satisfactory and should s/he receive an incentive? . . . . .  Yes  No  
If YES, how much allowance should the CBW be paid: . . . . . \_\_\_\_\_  
Tell the CBW how to collect the allowance.

11

FOLLOW UP OF MILD AND SERIOUS REACTIONS (Select a Sample from Form 8)
(Part of standard supervisory checklist)

Name of Reviewer
Date of Review
Name and Function of Health Worker

- When to judge the handling of a reaction as INAPPROPRIATE:
a) When the reaction is SERIOUS and a nurse is NOT CALLED immediately
b) When the reaction is MILD or SERIOUS and treatment was NOT STARTED
c) When the response to ASK questions or TREATMENT or DOSE or NUMBER OF TABLETS is NO
d) When the response to POLYPHARMACY or MALARIA or CHILDREN is YES

I Date and Serial Number or Name of patient
Was the reaction mild or serious?
Was a nurse CALLED immediately?
Did a nurse COME immediately?
Did the health worker ASK the three questions and mark Yes or No?
Did the CBW START treatment?
Was the TREATMENT appropriate (see protocol)?
Was the DOSE appropriate?
Was the total NUMBER OF TABLETS given correct?
Did the health worker use POLYPHARMACY?
Was MALARIA under-treated?
Were doses for CHILDREN too high?
COUNT total in each column

Date and Serial Number or Name of patient
Was the reaction mild or serious?
Was a nurse CALLED immediately?
Did a nurse COME immediately?
Did the health worker ASK the three questions and mark Yes or No?
Did the CBW START treatment?
Was the TREATMENT appropriate (see protocol)?
Was the DOSE appropriate?
Was the total NUMBER OF TABLETS given correct?
Did the health worker use POLYPHARMACY?
Was MALARIA under-treated?
Were doses for CHILDREN too high?
COUNT total in each column

Count the total number of reactions evaluated:
Count the reactions NOT dealt with appropriately:

Handwritten mark

HOUSEHOLD SAMPLE TREATMENT CHECKLIST (Select a Sample from Form 3)

(Part of standard supervisory checklist)

Name of Reviewer .....  
Date of Review .....  
Name and Function of Health Worker .....

1 Date and Serial Number of household .....  
READ all names on the Household Ivermectin Treatment Record:  
Do all people listed on the household record live here?  Yes  No  
Is the AGE for everybody about the same as on the form?  Yes  No  
Was everybody excluded from treatment rightfully so?  Yes  No  
Did everybody treated fulfill the conditions for treatment?  Yes  No  
Did everybody treated receive the correct amount of tablets?  Yes  No  
Were all ID cards updated correctly?  Yes  No  
Was everybody registered as a NEW case truly so?  Yes  No  
Was everybody registered as an OLD case truly so?  Yes  No  
Were previous treatments recorded correctly for everybody?  Yes  No  
COUNT total "Yes" and total "No" .....

2 Date and Serial Number of household .....  
READ all names on the Household Ivermectin Treatment Record:  
Do all people listed on the household record live here?  Yes  No  
Is the AGE for everybody about the same as on the form?  Yes  No  
Was everybody excluded from treatment rightfully so?  Yes  No  
Did everybody treated fulfill the conditions for treatment?  Yes  No  
Did everybody treated receive the correct amount of tablets?  Yes  No  
Were all ID cards updated correctly?  Yes  No  
Was everybody registered as a NEW case truly so?  Yes  No  
Was everybody registered as an OLD case truly so?  Yes  No  
Were previous treatments recorded correctly for everybody?  Yes  No  
COUNT total "Yes" and total "No" .....

3 Date and Serial Number of household .....  
READ all names on the Household Ivermectin Treatment Record:  
Do all people listed on the household record live here?  Yes  No  
Is the AGE for everybody about the same as on the form?  Yes  No  
Was everybody excluded from treatment rightfully so?  Yes  No  
Did everybody treated fulfill the conditions for treatment?  Yes  No  
Did everybody treated receive the correct amount of tablets?  Yes  No  
Were all ID cards updated correctly?  Yes  No  
Was everybody registered as a NEW case truly so?  Yes  No  
Was everybody registered as an OLD case truly so?  Yes  No  
Were previous treatments recorded correctly for everybody?  Yes  No  
COUNT total "Yes" and total "No" .....

Count the total number of households evaluated: .....  
Count the number of households where not all points were marked with "YES": .....

12

HOUSEHOLD SAMPLE KAP-ASSESSMENT (Select a Sample from Form 3)

(Part of standard supervisory checklist)

Name of Reviewer
Date of Review
Name and Function of Health Worker

1 Date and Serial Number of household

- ASK in each household the following questions and indicate whether the answers are RIGHT or WRONG:
"Which DISEASE will this new medicine treat?"
"Who SHOULD TAKE the drug, who should not take it?"
"When should you TAKE the drug AGAIN?"
"What should be done if somebody becomes ILL after taking the drug?"
"What CAUSES river blindness?"
"When did you take (swallow) the drug, AFTER the health worker left?"
"How much did you PAY for the new drug? Were people asked to pay?"
"Is there anyone who is NOT SATISFIED by the work of the HHD?"
"Is there anyone here who will NOT take the drug the NEXT TIME?"
COUNT total "Wrong" & "Yes" and total "Right" & "No"

2 Date and Serial Number of household

- ASK in each household the following questions and indicate whether the answers are RIGHT or WRONG:
"Which DISEASE will this new medicine treat?"
"Who SHOULD TAKE the drug, who should not take it?"
"When should you TAKE the drug AGAIN?"
"What should be done if somebody becomes ILL after taking the drug?"
"What CAUSES river blindness?"
"When did you take (swallow) the drug, AFTER the health worker left?"
"How much did you PAY for the new drug? Were people asked to pay?"
"Is there anyone who is NOT SATISFIED by the work of the HHD?"
"Is there anyone here who will NOT take the drug the NEXT TIME?"
COUNT total "Wrong" & "Yes" and total "Right" & "No"

3 Date and Serial Number of household

- ASK in each household the following questions and indicate whether the answers are RIGHT or WRONG:
"Which DISEASE will this new medicine treat?"
"Who SHOULD TAKE the drug, who should not take it?"
"When should you TAKE the drug AGAIN?"
"What should be done if somebody becomes ILL after taking the drug?"
"What CAUSES river blindness?"
"When did you take (swallow) the drug, AFTER the health worker left?"
"How much did you PAY for the new drug? Were people asked to pay?"
"Is there anyone who is NOT SATISFIED by the work of the HHD?"
"Is there anyone here who will NOT take the drug the NEXT TIME?"
COUNT total "Wrong" & "Yes" and total "Right" & "No"

Count the total number of households evaluated:
Count the number where not all points were marked "NO" or "RIGHT":



HEALTH WORKER KAP-ASSESSMENT

(Part of standard supervisory checklist)

- 0.1 Serial Number . . . . . \_\_\_\_\_
- 0.2 Date . . . . . \_\_\_\_\_
- 0.3 Name of supervisor . . . . . \_\_\_\_\_
- 0.4 Name of health worker . . . . . \_\_\_\_\_
- 0.5 Qualification: CBW, technician, nurse, etc. . . . . \_\_\_\_\_

- 1 "What **CAUSES** river blindness?" . . . . .  Wrong  Right
- 2 "What is the **MAIN CONSEQUENCE** of an infection with oncho?"  Wrong  Right
- 3 "What are other **SYMPTOMS** of onchocerciasis?" . . . . .  Wrong  Right
- 4 "Which **DRUGS** are used to treat onchocerciasis?" . . . . .  Wrong  Right
- 5 "Who **SHOULD TAKE** Ivermectin, who should not take it?" . . . . .  Wrong  Right
- 6 "How **OFTEN** should people take Ivermectin?" . . . . .  Wrong  Right
- 7 "How much should people **PAY** for Ivermectin treatment?" . . . . .  Wrong  Right
- 8 "Can **IVERMECTIN** cure onchocerciasis?" . . . . .  Wrong  Right
- 9 "What is the dose of Ivermectin for a **CHILD**, for an **ADULT**?" . . . . .  Wrong  Right
- 10 "What are possible **SIDE EFFECTS** of Ivermectin?" . . . . .  Wrong  Right
- 11 "Are **reactions** after Ivermectin common?" . . . . .  Wrong  Right
- 12 "What are the **THREE criteria** for a serious reaction?" . . . . .  Wrong  Right
- 13 "What should you do in case of a **MILD reaction**?" . . . . .  Wrong  Right
- 14 "What should you do in case of a **SERIOUS reaction**?" . . . . .  Wrong  Right
- 15 "When should a person take (**SWALLOW**) the drug?" . . . . .  Wrong  Right
- 16 "**WHERE** do people get the drug?" (only at home, any time) . . . . .  Wrong  Right
- 17 "What should you do at the **END** of each **WORK DAY**?" . . . . .  Wrong  Right
- 18 "Which **RECORDS** and **FORMS** do you maintain?" . . . . .  Wrong  Right
- 19 "Which **INDICATORS** measure the success of your work?" . . . . .  Wrong  Right

20 **Count the number of questions marked "NO" or "RIGHT":** . . . . . \_\_\_\_\_

21 The total number of questions is: . . . . .           ? 19          

22 Percent of correct answers (Divide line 20 by line 21, \* 100) . . . . . \_\_\_\_\_

- 23 "Was your **EXPERIENCE** considered during your training?" . . . . .  Yes  No
- 24 "Was **YOUR OPINION** welcomed when planning the distribution?"  Yes  No
- 25 "Did you contribute when **STANDARDS** for good work were set?"  Yes  No
- 26 "Are you **SATISFIED** with the support by OCT?" (specify team) . . . . .  Yes  No

GENERIC TRAINING REPORT

1 Serial Number ..... \_\_\_\_\_  
 2 **Course title** ..... \_\_\_\_\_  
 3 Participant group ..... \_\_\_\_\_  
 4 Course started, date ..... \_\_\_\_\_  
 5 Course ended, date ..... \_\_\_\_\_  
 6 Name of training director ..... \_\_\_\_\_  
 7 Location of training ..... \_\_\_\_\_  
 8 List name, function of each trainer, and amounts paid for: ..... Allowance                      Transport

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

ID-No	Name of participant	From (community)	Allow-ance	Trans- port	Sex	Age	Pre-test Scores	Post-test Scores	Follow-up
1									
2									
3									
4									
5									
6									
7									
8									
9									
10									
11									
12									
13									
14									
15									
16									
17									
18									
19									
20									
	Totals	Female: Male:							
	Averages								

TRAINING FOLLOW-UP REPORT

1 Serial Number . . . . . \_\_\_\_\_  
 2 OCT or Community Name . . . . . \_\_\_\_\_  
 3 Category of trainees (CBW, health professionals, trainers, etc) . . . . . \_\_\_\_\_  
 4 Report for started, date . . . . . \_\_\_\_\_  
 5 Report form closed, date . . . . . \_\_\_\_\_  
 6 Number of follow on report form (after closing this form) . . . . . \_\_\_\_\_

ID No	Name	Place or Community	First Training	Paid By	Salary Allow.	Stop Date	Continuing education (course dates)						
							1991	1992	1993	1994	1995	1996	Performance
1													
2													
3													
4													
5													
6													
7													
8													
9													
10													
11													
12													
13													
14													
15													
16													
17													
18													
19													
20													
21													
22													
23													
24													
25													
26													
27													
28													
29													
30													
Totals (drop outs, refresher courses per year)													

ONCHO-CONTROL TEAM STAFF LIST

- 1 Serial Number . . . . . \_\_\_\_\_
- 2 OCT, LGA or State Name . . . . . \_\_\_\_\_
- 3 Report for started, date . . . . . \_\_\_\_\_
- 4 Report form closed, date . . . . . \_\_\_\_\_
- 5 Number of follow on report form (after closing this form) . . . . . \_\_\_\_\_

ID No	Name	Place of Work	Function	Gov/ Africare	Salary Allow.	Start Date	Stop Date	Continuing education (course dates)					
								1992	1993	1994	1995	1996	Performance
1													
2													
3													
4													
5													
6													
7													
8													
9													
10													
11													
12													
13													
14													
15													
16													
17													
18													
19													
20													
21													
22													
23													
24													
25													
26													
27													
28													
29													
30													
Totals (drop outs, refresher courses per year)													

13













## APPENDIX VII

### Preliminary List of Suggested H/MIS Indicators:

#### Survey indicators include:

- % of communities skin snipped
- % of communities surveyed with rapid assessment techniques
- % of communities with onchocerciasis prevalence  $\geq 40\%$
- % of villages appropriately KAP surveyed

#### Training indicators include:

- # health staff trained
- # of CBDs trained
- % of correct answers given by CBDs according to training

#### Health Education indicators include:

- # of villages covered by the education campaign
- % of correct answers given by community members according to the health education message

#### Distribution indicators include:

- # of ivermectin tablets distributed
- # of tablets missing or in excess
- total # of persons treated
- population coverage = % of people eligible for treatment who were treated
- village coverage = % of villages targeted for treatment that are treated
- # and % of adverse reactions recorded and treated

#### Supervision indicators include:

- # of supervision visits performed
- # monthly reports from the field received

#### Economic indicators include:

- cost per component, (including surveys, field allowances, transport, training, distribution, supplies, salaries)
- amount of money collected through cost-recovery mechanism

1 Abstract of IDP progress report (1/3 page)

### 3 Inputs realized during the reporting period

#### 3.1 Personnel input (amount and costs)

##### 3.1.1 Personnel financed by PVO (long term and short term)

IDP - "country"		Personnel provided by PVO (long term and short term, salary, indemnities, etc.)																MM total	Remarks
		1991				1992				1993				1994					
Position & Name		JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
1. Staff	planned																		
	actual																		
	costs																		
2. Staff	planned																		
	actual																		
	costs																		
3. Staff	planned																		
	actual																		
	costs																		
Sum of man months per quarter	planned																		
	actual																		
Percent of target																			
Costs per quarter																			

3.1.2 Personnel provided by partner organization

IDP - "country"	Personnel provided by partner organization (salary, indemnities, etc.)																MM total	Remarks
	1991				1992				1993				1994					
	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
Position & Name																		
1. Staff	planned																	
	actual																	
	costs																	
2. Staff	planned																	
	actual																	
	costs																	
3. Staff	planned																	
	actual																	
	costs																	
Sum of man months per quarter	planned																	
	actual																	
Percent of target																		
Costs per quarter																		

### 3.2 Financial input

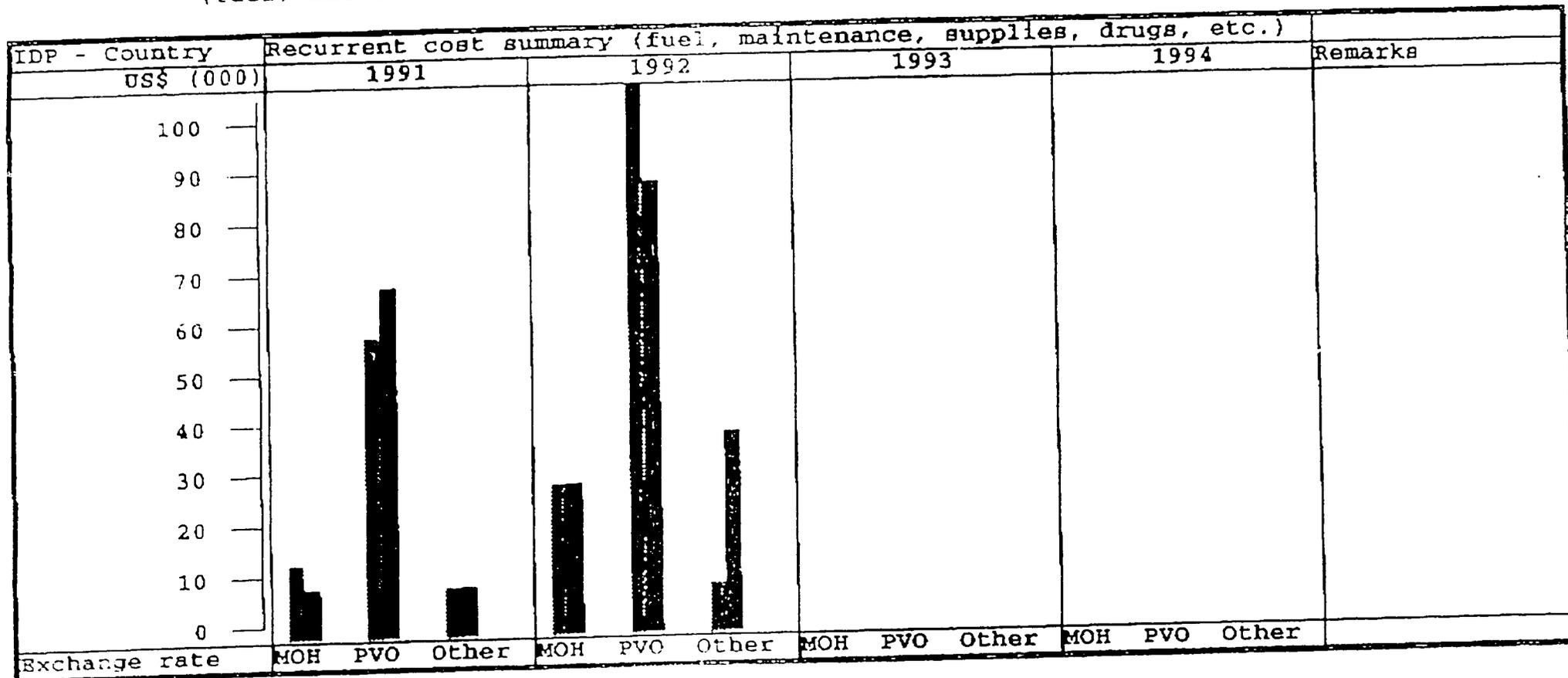
#### 3.2.1 Major investment by PVO (vehicles, equipment, construction, etc.)

IDP - "country"	Major investment by PVO (vehicles, equipment, construction, etc.): Quantity and Costs																Cost in 000 US\$	Remarks
Description	1991				1992				1993				1994				total	
	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
1.	planned																	
	actual																	
	% actual																	
	costs																	
2.	planned																	
	actual																	
	% actual																	
	costs																	
3.	planned																	
	actual																	
	% actual																	
	costs																	
4.	planned																	
	actual																	
	% actual																	
	costs																	
Sum of costs per quarter	planned																	
	actual																	

3.2.2 Investment by partner organization  
(vehicles, equipment, construction, etc.)

DP - "country"		Major investment by partner organization (vehicles, equipment, construction, etc.): Quantity and Costs																Cost in 000 US\$	
Description		1991				1992				1993				1994				total	Remarks
		JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
1.	planned																		
	actual																		
	% actual																		
	costs																		
2.	planned																		
	actual																		
	% actual																		
	costs																		
3.	planned																		
	actual																		
	% actual																		
	costs																		
4.	planned																		
	actual																		
	% actual																		
	costs																		
Sum of costs per quarter	planned																		
	actual																		

3.2.3 Recurrent cost summary  
 (fuel, maintenance, supplies, drugs, etc. by IDP objective)



■ Budgeted Expenditure

3.2.4 Recurrent costs by PVO  
(fuel, maintenance, supplies, drugs, etc. by IDP objective)

Summary table from accounting

3.2.5 Recurrent costs by partner organization  
(fuel, maintenance, supplies, drugs, etc. by IDP objective)

Summary table from accounting

3.2.6 Personnel costs by PVO  
(travel allowances, etc.)

Summary by IDP objective only

3.2.7 Personnel costs by partner organization  
(travel allowances, etc.)

Summary by IDP objective only

### 3.3 Training of IDP personnel

IDP - "country"	Training of IDP personnel																MM total	Remarks
	1991				1992				1993				1994					
Course description	1991				1992				1993				1994				MM total	Remarks
Target group (# participants)	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
1.	planned																	
	actual																	
	costs																	
2.	planned																	
	actual																	
	costs																	
3.	planned																	
	actual																	
	costs																	
Sum per quarter	planned																	
	actual																	
Percent of target																		
Costs per quarter																		

#### 4 Description of problems and discussion of solutions

##### Summary description of outputs during the report period

(following the logical framework above, but more detailed)

Proposed IDP report format

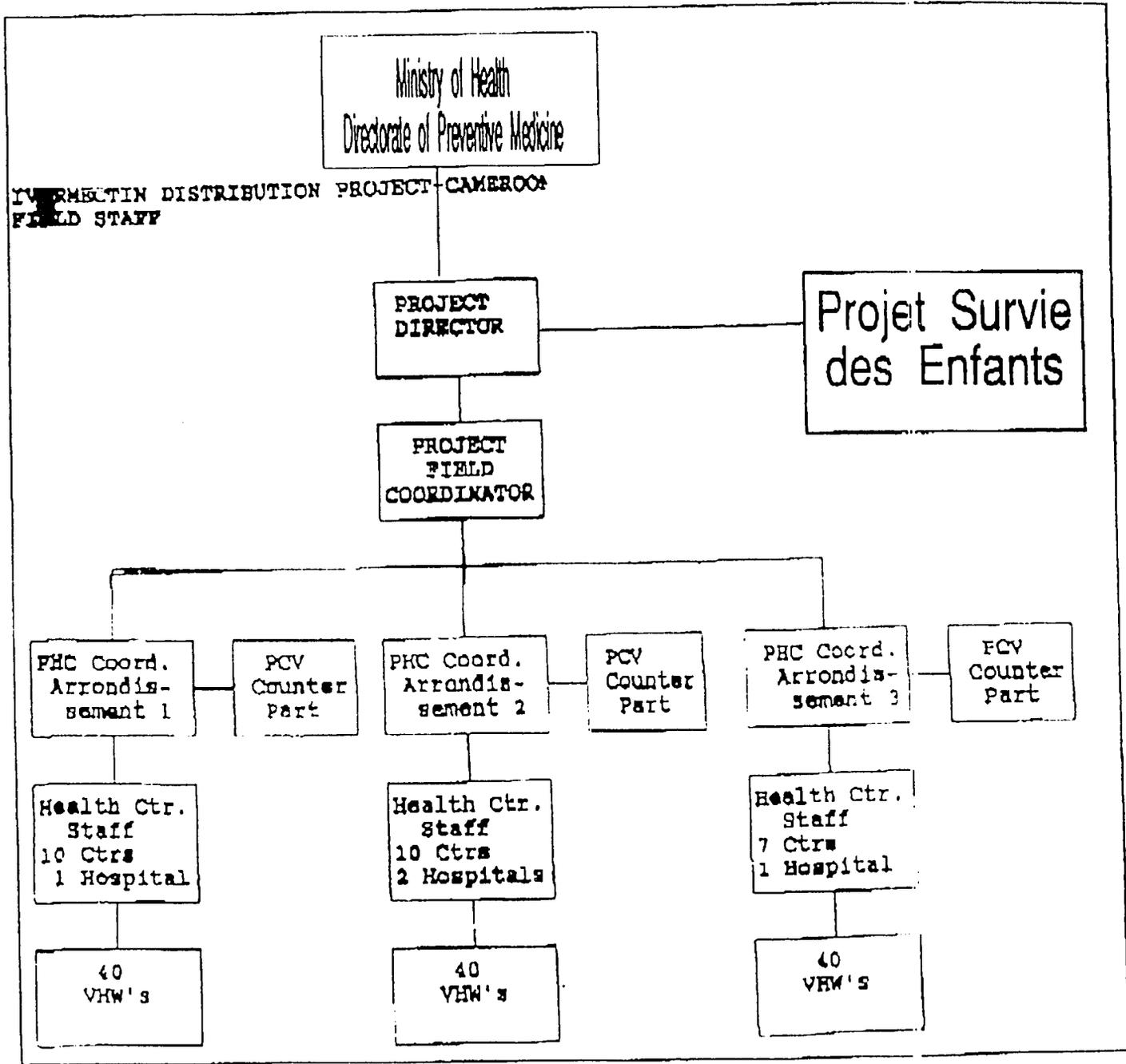
1. Abstract of IDP progress report (1/3 page)
2. Organization chart indicating the position of the IDP relative to the partner country's health services
3. Inputs realized during the reporting period
4. Description and appraisal of outputs during the report period
5. Realization of project purpose
6. Actualized plan of operations for the following report period
7. Appendix

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1 Abstract of IDP progress report (1/3 page)

2 Organization chart indicating the position of the IDP relative to the partner country's health services

A modified IEF chart for IDP Cameroon is shown as an illustrative example only:



### 3 Inputs realized during the reporting period

#### 3.1 Personnel input (amount and costs)

##### 3.1.1 Personnel financed by PVO (long term and short term)

IDP - "country"	Personnel provided by PVO (long term and short term, salary, indemnities, etc.)																MM total	Remarks						
	Position & Name		1991				1992				1993				1994									
			JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ			JAS	OND				
	1. Staff	planned																						
		actual																						
	2. Staff	planned																						
		actual																						
	3. Staff	planned																						
		actual																						
	Sum of man months	planned																						
	per quarter	actual																						
	Percent of target																							
	Costs per quarter																							

9

3.1.2 Personnel provided by partner organization

IDP - "country"	Personnel provided by partner organization (salary, indemnities, etc.)																MM total	Remarks																										
	1991				1992				1993				1994																															
	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND																												
Position & Name																																												
1. Staff	planned																actual												costs															
2. Staff	planned																actual												costs															
3. Staff	planned																actual												costs															
Sum of man months per quarter	planned																actual																											
Percent of target																																												
Costs per quarter																																												

### 3.2 Financial input

#### 3.2.1 Major investment by PVO (vehicles, equipment, construction, etc.)

IDP - "country"	Major investment by PVO (vehicles, equipment, construction, etc.): Quantity and Costs																Cost in 000 US\$	Remarks
Description	1991				1992				1993				1994				total	
	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
1.	planned																	
	actual																	
	% actual																	
	costs																	
2.	planned																	
	actual																	
	% actual																	
	costs																	
3.	planned																	
	actual																	
	% actual																	
	costs																	
4.	planned																	
	actual																	
	% actual																	
	costs																	
Sum of costs per quarter	planned																	
	actual																	

3.2.2 Investment by partner organization  
(vehicles, equipment, construction, etc.)

IDP - "country"	Major investment by partner organization (vehicles, equipment, construction, etc.): Quantity and Costs																Cost in 000 US\$	Remarks
Description	1991				1992				1993				1994				total	
	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND		
1.	planned																	
	actual																	
	% actual																	
	costs																	
2.	planned																	
	actual																	
	% actual																	
	costs																	
3.	planned																	
	actual																	
	% actual																	
	costs																	
4.	planned																	
	actual																	
	% actual																	
	costs																	
Sum of costs per quarter	planned																	
	actual																	

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3.2.3 Recurrent cost summary  
 (fuel, maintenance, supplies, drugs, etc. by IDP objective)

IDP - Country	Recurrent cost summary (fuel, maintenance, supplies, drugs, etc.)									Remarks			
	US\$ (000)	1991			1992			1993			1994		
		MOH	PVO	Other	MOH	PVO	Other	MOH	PVO	Other	MOH	PVO	Other
	100												
	90												
	80												
	70												
	60												
	50												
	40												
	30												
	20												
	10												
	0												
Exchange rate													

■ Budgeted  
 Expenditure

**3.2.4 Recurrent costs by PVO  
(fuel, maintenance, supplies, drugs, etc. by IDP objective)**

**Summary table from accounting**

**3.2.5 Recurrent costs by partner organization  
(fuel, maintenance, supplies, drugs, etc. by IDP objective)**

**Summary table from accounting**

**3.2.6 Personnel costs by PVO  
(travel allowances, etc.)**

**Summary by IDP objective only**

**3.2.7 Personnel costs by partner organization  
(travel allowances, etc.)**

**Summary by IDP objective only**

### 3.3 Training of IDP personnel

IDP - "country"	Training of IDP personnel																MM total	Remarks	
	1991				1992				1993				1994						
Course description	1991				1992				1993				1994				MM total	Remarks	
Target group (# participants)	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND	JFM	AMJ	JAS	OND			
1.	planned																		
	actual																		
2.	planned																		
	actual																		
3.	planned																		
	actual																		
Sum per quarter	planned																		
	actual																		
Percent of target																			
Costs per quarter																			

3.4 **Planned partner input financed by PVO instead**

3.5 **Inputs from third parties not included so far**

3.6 **Conformity of PVO input with approved project proposal and detailed implementation plan;**

**Conformity of input from partner organization with project agreement**

#### 4 Description of problems and discussion of solutions

##### Summary description of outputs during the report period

(following the logical framework above, but more detailed)

## Description and appraisal of detailed outputs during the report period

### Output 1: SURVEYS

1.1 Hyper- and/or mesoendemic communities are identified through appropriate surveys (primary screening, skin snip or rapid appraisal).

### 4.1 Main activities and indicators per result: (by major region as applicable)

#### Region A

Indicators Reference in ()	1994 IDP target		Last period Jan-Mar/199_		Report period Apr-Jun/199_		Remarks (referring to report period or a change of target)
	No <sup>^</sup>	%	No <sup>*</sup>	% <sup>**</sup>	No <sup>*</sup>	% <sup>**</sup>	
<b>IDP Capacity:</b>							
1.1 Partner designed, implemented and evaluated surveys (1)	10	100	0	0	1	100	
1.2 Affordability of surveys, costs as % of total (5)		25		50		50	Transportation was more expensive than planned
<u>Recurrent costs:</u> (in 000 US\$)	200	100					
2.1 Travel costs and allowances (25, 26)	123	100	12	100	15	125	Rented a vehicle
<u>Capital costs:</u> (in 000 US\$)	50	100					
3.1 1 Vehicle (37)	40	100	0	0	0	0	Import license not provided by partner
<u>Personnel/Population</u>							
4.1 # surveyed in 000 (46)	200	100	4	12	10	60	See below
4.2 # surveyors (47)	8	100	2	50	2	50	Personnel not provided by partner
<u>Activities:</u>							
5.1 # primary screening (63)	10	100	1	50	2	50	1 canceled due to bad weather, 1 canceled due to staff illness
5.2 # skin snip (64)	12	100	0	N/A	2	100	
5.3 # rapid assessment (65)	30	100	2	33	4	100	
<u>Performance, QA:</u>							
6.1 Pre test evaluated (98)	3	100	1	100	1	50	
6.2 Protocol followed (99)	52	100	1	100	6	75	Problems w/ 2 rapid assessments
6.3 KAP % awareness (100)		80		60		68	

<sup>\*</sup>) Output realized during period    <sup>\*\*</sup>) Output realized in percent of output targeted

<sup>^</sup>) Total output targeted for IDP project duration

Same table for regions B, C etc.

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**Provide a narrative summary of outputs obtained and difficulties encountered using the following outline (should be really brief, 1-2 pages)**

**2 Description of main activities for this output**

**4.3 Description of important deviations from target during report period and reasons, major external influences relevant to this result**

**4.4 Appraisal of the importance of the achieved output related to (only if applicable):**

- Overall project purpose
- Institutional capacity, integration, sustainability
- Specific objective (target output)
- Economic development
- Social and cultural integration and acceptance
- Ecological impact
- Women issues

**Repeat these steps (4.1 to 4.4) for all other main outputs**

## 5 Realization of project purpose

### IDP PURPOSE:

Strengthen the ability of indigenous health institutions to design, implement and manage a cost-effective and sustainable IDP.

- 5.1 Appraisal of the actual project status compared to its purpose
  
- 5.2 Appraisal whether the project purpose continues to be valid and whether the purpose will be achieved
  
- 5.3 Appraisal whether the planned PVO/USAID input will allow the IDP to achieve its purpose
  
- 5.4 Description of necessary changes in project objectives, plan of operations, or detailed project implementation plan to achieve the project purpose

Actualized plan of operations for the following report period:

(refer to master plan, highlight changes and main activities and outputs)

- Updated Gantt chart
  
- Updated resource planning (personnel, finances, equipment, drugs, constructions)
  
- Changes of activities
  
- Expected main results

7 Appendix

Attach survey and quality assurance reports or any other detailed description of a major IDP activity, such as training documents or educational material (most of it should be normal activity output and require no additional writing)

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