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Subject Foreign Trip Report (AID/RSSA): Ghana, June 17-July 1, 1981 -- Evaluation of the Ghana National Family Planning Program Supply and Reporting Systems

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Director, Centers for Disease Control
Through: Horace G. Ogden, Director CW Tyler for HGO
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SUMMARY

I. PLACES, DATES, AND PURPOSE OF TRAVEL
II. PRINCIPAL CONTACTS
III. BACKGROUND
IV. THE GHANA NATIONAL FAMILY PLANNING PROGRAM (GNFPP) CONTRACEPTIVE SUPPLY SYSTEM
A. General
B. Problems Identified
C. Recommendations
V. CURRENT SUPPLY STATUS OF THE NATIONAL FAMILY PLANNING PROGRAM
VI. USER REPORTING SYSTEM
VII. ORAL AND CONDOM REQUIREMENTS FOR THE CRS AND GNFPP PROGRAMS
VIII. USAGE RATES FOR FOAMING TABLETS
IX. PROJECTING CONTRACEPTIVE NEEDS FOR THE PRIMARY HEALTH CARE PROJECT
X. FY 1983 CONTRACEPTIVE PROCUREMENT TABLES
TABLES 1-3
EXHIBITS 1 & 2
APPENDIX A: FY 1983 CONTRACEPTIVE PROCUREMENT TABLES

SUMMARY

The overriding problem I encountered in my evaluation of the Ghana National Family Planning Program (GNFPP) contraceptive supply system is its inability to insure a continuous availability of contraceptive supplies in the regional warehouses and in Ministry of Health (MOH) clinics. Low inventory levels of all contraceptives, ineffective management and field supervision of the system, and the lack of a transportation capability in the regions contribute to this problem. The GNFPP supply system could be improved by training existing supply personnel and regional coordinators in supply management and inventory control, establishing maximum and minimum stock levels to be maintained in the warehouses and clinics, improving field supervision and reporting, making more efficient use of existing vehicles, and by developing a supply manual that outlines the supply policies of the GNFPP and the responsibilities of each administrative level in the system. This would be a major effort. However, the future role of the GNFPP is uncertain. When the Government of Ghana presents its budget for FY 1982 the role of the GNFPP may be diminished considerably. If that is the case, the Mission should evaluate the capability of both the MOH supply system and DANAFCO, the private sector packer/distributor for the now defunct Commercial Retail Sales (CRS) program, as alternatives to the GNFPP system.

In evaluating the current supply status of the National Family Planning program, I found extremely low inventory levels of orals, condoms and NeoSampoon in the central stores of the participating programs. Translated into Couple Years of Protection (CYP), only 40,818 CYP of these contraceptives is currently on hand. Based on the current rate of distribution, there are approximately only 4 month's supply available in central stores. I recommend that additional supplies be shipped to Ghana so that sufficient quantities of supplies will be on hand to meet current demand and to fill the pipeline.

Current data on new acceptors and revisits for the National Family Planning Program are virtually non-existent. No clinic data have been processed nor have reports been prepared on the national program since the end of 1978. Although work is currently underway to prepare the clinic data for computer processing, it is unlikely that any reports will be forthcoming before AID's project with the GNFPP terminates in November of this year. In order for USAID/Ghana to meet its quarterly obligation of reporting service statistics to AID/W, only data on new acceptors by method and total number of contraceptives dispensed to users during CY 1980 and the first three quarters of CY 1981 should be computer processed. Computer processing of client record forms submitted after September 30, 1981 should cease. Each participating program in the National Family Planning Program should manually process their own clinic data and submit quarterly aggregate reports on new acceptors by method and quantities of contraceptives dispensed to users to USAID/Ghana.

Because CRS program operations were constrained in 1980, it was not possible to estimate with any precision what proportion of AID-funded contraceptives should be consigned to the GNFPP and CRS programs in the future. If the CRS program is revived, I recommend that the mission maintain accurate records on the sales of contraceptives in both programs in order to make this estimation. In the meantime, I recommend that 75% of oral contraceptives and 50% of condoms scheduled for shipment to Ghana be consigned to the MOH clinic program.

The prevalence of use of NeoSampoon in Ghana has been increasing since 1979. From January through May, 1981 the use of NeoSampoon exceeded that of the pill: 25,136 CYP versus 22,409 CYP. For planning purposes a table is presented which can be used as a guide in ordering additional supplies of NeoSampoon for the program.

Finally, I revised the FY 1983 Contraceptive Procurement Tables prepared by the Mission earlier this year. The major difference in the tables I prepared compared with those prepared by the Mission is that I used a higher estimate of prevalence of use of orals and condoms for CY's 1982 and 1983 (to insure that sufficient quantities are on hand to meet current demand and an anticipated increase in family planning services with the implementation early next year of the Primary Health Care Project, and to fill the pipeline), and included the contribution the private sector and other donors will make in the full supply analysis section of the tables. As the Primary Health Care Project is further developed it may be necessary to readjust the tables to take into account the final design of the project.

I. PLACES, DATES, AND PURPOSE OF TRAVEL

At the request of USAID/Ghana and AID/W/DS/POP/FPSD, Richard S. Monteith of the Program Evaluation Branch (PEB), Family Planning Evaluation Division (FPED), Center for Health Promotion and Education (CHPE), CDC, traveled to Ghana, June 17-July 1, 1981, to evaluate the contraceptive supply and user reporting systems of the Ghana National Family Planning Program (GNFPP). This travel was in accordance with the Resource Support Services Agreement (RSSA) between the Office of Population, AID, and CDC/CHPE/FPED.

II. PRINCIPAL CONTACTS

A. USAID/Ghana

1. Mr. Larry Saiers, Deputy Mission Director

2. Mr. Larry Eicher, Acting Chief, Health, Population and Nutrition Division

3. Mr. Jim Keene, Management Consultant Specialist, Department of Health and Human Services (DHHS)

4. Mr. Michael Zak, Program Officer

B. Ghana National Family Planning Program Secretariat (GNFPP)

1. Dr. A. Armar, Executive Director

2. Mr. S. K. Kwafo, Deputy Director

3. Mr. M. Aequaye, Senior Supply Officer

4. Mr. E. Osei-Kissih, Supply Officer

5. Mr. Emmanuel Lartey, Accountant

6. Mr. Isaac David Eshun, Statistical Clerk, Office of Research and Evaluation

C. Planned Parenthood Association of Ghana (PPAG)

1. Mrs. Gladys Azu, Executive Secretary

2. Mrs. Georgina Rhule, Regional Coordinator, Eastern Region

D. Christian Council of Ghana (CCG)

1. Mr. D. A. Dartey, Executive Secretary

E. National Council of Ghana Young Men's Christian Associations (YMCA)

1. Mr. Alfred A. Sarkodee, FLEC Project Coordinator

F. DANAFCO

1. Mr. H. Osafo - Acquaah, Production Manager

G. Ministry of Health (MOH)

1. Mr. Hansen, Principal Supply Officer
2. Mr. T. A. Glover, Supply Officer, Greater Accra Regional Medical Stores
3. Mr. Addico, Senior Supply Officer, Korle Bu Hospital
4. Dr. Esther Boohene, Chief, MCH/FP Division
5. Mr. S. B. Ampaw, Senior Supply Officer, Eastern Regional Medical Stores
6. Dr. Yaw Abaogye-Ata, Deputy Director, Medical Services (Public Health)
7. Dr. Joseph Otoo, Chief of Training
8. Dr. Edward A. Neequaye, Tetteh Quarshie Memorial Hospital, Mampong
9. Mrs. Grace Mansah, Midwifery Superintendent, Jumapo Health Clinic
10. Dr. Bruce Konuah, Senior Medical Offcier, Tafo Hospital
11. Mrs. Beatrice Addo, Community Health Nurse/Midwife, Kibi Health Clinic

H. Institute of Statistical, Social and Economic Research (ISSER), University of Ghana, Legon

1. Mrs. M. Kumekpor

III. BACKGROUND

In 1969 the Government of Ghana published a population policy entitled "Population Planning for National Progress and Prosperity." The aims set forth in this document, which has been considered as one of the most comprehensive population policy statements in the developing world, were implemented in 1970 and 1971 by the creation of the Ghana National Family Planning Program (GNFPP) Secretariat. The GNFPP, which is an entity of the Ministry of Economic Planning, is charged with planning and coordinating all family planning activities in Ghana. The GNFPP has worked with the Ministries of Health, Information, Labor and Agriculture, and with private sector organizations such as the Planned Parenthood Association of Ghana (PPAG), the Christian Council of Ghana (CCG), and Young Men's Christian Association (YMCA) in providing family planning information and services in the country.

The GNFPP does not operate any family planning clinics of its own in the country. Clinic services are provided through the facilities of the MOH (63 clinics), the PPAG (28 clinics) and the CCG (11 clinics). In addition to clinical services, the PPAG and YMCA employ 90 and 50 field workers, respectively, who sell contraceptives during home visits. From January 1979 to March 1981 Westinghouse Health System operated a Commercial Retail Sales (CRS) program in the country.

Logistically, the GNFPP supplies contraceptives only to the MOH clinics. These supplies are obtained from AID. The CCG and the YMCA receive their contraceptive supplies from Family Planning International Assistance (FPIA) and the PPAG from the International Planned Parenthood Federation (IPPF). Each of the private sector organizations operate their own supply system. Contraceptives that were sold through the CRS program were also donated by AID. Although the contraceptives were consigned to the CRS program, the GNFPP was responsible to clear them through customs and deliver them to DANAFCO, the packer/distributor for the program.

In 1969 a computerized family planning data system was implemented with the technical assistance of the Ford Foundation. The Institute of Statistical, Social and Economic Research (ISSER), University of Ghana, Legon, has been under contract to the GNFPP since 1969 to edit, computer process and analyze data submitted to it monthly by the clinics of the participating programs. However, ISSER has not processed any clinic data nor have reports been prepared on the national program since the end of 1978. Nevertheless, data on new acceptors and revisits are available from the PPAG and CCG programs. The CCG manually processes the client record forms completed in its clinics before they are submitted to the GNFPP. The PPAG also operates its own user data system in addition to submitting forms to the GNFPP system. The largest provider of clinic-based family planning service in the country, the MOH, does not process the client record forms manually. The forms are sent directly to the GNFPP and, thus, user statistics are not available for the MOH program. Also the GNFPP family planning data system does not include sales of contraceptives by field workers and through the CRS program.

The scope of work for my TDY in Ghana was: (1) to identify problems and bottlenecks in the GNFPP contraceptive supply system; (2) to assist the GNFPP to develop an improved user reporting system; (3) to review and, if necessary, adjust the FY 1983 Contraceptive Procurement Tables; (4) to differentiate oral and condom requirements for the CRS and GNFPP programs; (5) to determine usage rates for foaming tablets (NeoSampoon); and (6) to assist the Mission in projecting contraceptive needs for a Primary Health Care Project which is currently in the planning stage. The following sections of this report include my findings and recommendations. A handwritten report of my preliminary findings and recommendations was submitted to USAID/Ghana before I departed Ghana.

IV. THE GNFPP CONTRACEPTIVE SUPPLY SYSTEM

A. General

Contraceptives donated by AID for the MOH clinic and the CRS programs are shipped to Ghana in care of the GNFPP. Shipments consigned to the CRS program

are transported from the port of entry directly to DANAFCO, the private sector packer/distributor for the CRS program. Contraceptives consigned to the MOH clinic program are stored in two different locations in Accra, in the Greater Accra Medical Stores, a MOH warehouse facility which serves as a holding area for the GNFPP for large quantities of contraceptives, and in GNFPP's own storeroom, which serves as a storage area from which the regional warehouses and clinics are resupplied.

Nine regional warehouses are resupplied with contraceptives in one of two ways: the GNFPP delivers the contraceptives directly to the warehouses or regional personnel go to Accra to obtain them from the GNFPP storeroom. Once the contraceptives reach the regional warehouses they essentially come under the control of the MOH.

In the regions the MOH clinics are resupplied in one of three ways: (1) by going to the regional warehouse; (2) by going to Accra; or (3) a combination of these two.

The standard forms to record supply transactions, i.e. requisition and issue and inventory control, are used by the GNFPP in the central and intermediate (regional) warehouses. However, Tally Cards (the British equivalent to an Inventory Control Card) are not used at the clinic level.

B. Problems Identified

The overriding problem of the GNFPP appears to be its inability to insure a continuous availability of contraceptive supplies in the regional warehouses and in the clinics. This finding is based on a field trip to the Eastern Region where I encountered low inventory levels and in some cases stockouts (no supplies on hand) of some contraceptives in the regional warehouse and local clinics. This finding takes on greater significance since the headquarters of this region is approximately only 1 hours drive from Accra. Other regions are more distant from Accra.

Once contraceptive supplies reach the regional warehouses, the GNFPP does not have the transportation capability to resupply the clinics. In order to obtain supplies clinic personnel must travel to the regional warehouses or to Accra using any form of transportation they can arrange. These trips do not always coincide with low or depleted stock levels in the clinics.

When the availability of transport is sporadic and uncertain, high inventory levels of contraceptives should be maintained in the regional warehouses and in the clinics. This was not the case in the Eastern Region. The low inventory levels I found in this region, however, reflect in part the low inventory levels in general the GNFPP is currently experiencing.

It did not appear that there was any policy in the Eastern Region regarding resupply or, if there was one, it was not being enforced, despite the fact the GNFPP has a coordinator assigned to this region. Some clinics in the region resupply themselves from the regional warehouse while others from the GNFPP

storeroom in Accra. In my professional judgment it is very inefficient for a clinic to obtain its supplies in Accra when a regional warehouse is nearby and is stocked with the desired contraceptives, albeit in small quantities. The only contraceptive not in stock in the regional warehouse was NeoSampoon. Finally, it was the understanding of personnel in one clinic that it was the responsibility of the regional warehouse to deliver contraceptives to their clinic. Needless to say, this clinic hasn't received any supplies for two years.

There was additional evidence of poor supply management and field supervision in the region:

- The First-In, First-Out (FIFO) principal of supply management was not being observed. While the regional warehouse had a large stock of oral contraceptives on hand with manufacture dates of 1974 and 1975, some clinics were distributing orals with a manufacture date of 1976.

- Condoms with a manufacture date of 1975 that were ordered to be destroyed in 1979 because they were defective were found in the regional warehouse.

Although the GNFPP contraceptive supply system has the necessary forms to monitor the flow of supplies, i.e., issues, quantities dispensed to users, balances on hand, it did not appear that data collected on these forms are being used to determine method mix and usage rates, to establish maximum and minimum stock levels for the warehouses and clinics, and to project future contraceptive requirements. I also found that reporting of supply data was not universal and that clinic personnel were confused with respect to who should report to whom and when.

Exacerbating the GNFPP's supply management problems are its low inventory levels of contraceptives. This is due in part to the fact that since 1978 all AID-procured contraceptives have been consigned to the CRS program. In April of this year the GNFPP did receive an emergency shipment of oral contraceptives from FPIA and is currently awaiting a sea shipment of the same. The arrival of the sea shipment will provide some relief for the MOH clinic program as far as orals are concerned, but additional shipments of all methods will be required this calendar year to alleviate the problems brought about by short supply, i.e., low inventory levels in the clinics, and to fill the pipeline.

In summary, the GNFPP contraceptive supply system is an informal system run on an ad hoc basis. If policies regarding resupply and inventory management exist, they are not applied evenly throughout the country. In addition, supervision of the system is sporadic and ineffective. Theoretically the GNFPP has the potential to monitor the flow of contraceptives and to generate data for management purposes, i.e. setting maximum and minimum stock levels, but this is not being done. A lack of vehicles and petrol has affected the GNFPP's ability to insure a continuous availability of contraceptives in the

clinics; however more efficient use of existing vehicles may go a long way in resolving this problem. Finally, current inventory levels in the GNFPP are critically low. In order to alleviate this problem and to fill the pipeline, additional supplies will be required to be shipped to Ghana this calendar year.

C. Recommendations

The GNFPP contraceptive supply system could be improved by:

1. Developing a supply manual that outlines the responsibilities of each administrative level in the supply system and supply management policies of the GNFPP. The policies set forth in this document should be strictly enforced by GNFPP supervisors.

2. Providing in-country training to existing supply personnel and regional coordinators in supply management and inventory control. Included in the training should be data analysis techniques to monitor and to control the flow of contraceptive supplies, to determine usage rates, and to forecast future contraceptive requirements.

3. Establishing maximum and minimum stock levels in the warehouses and clinics in keeping with demand and the ability to resupply each program level. This will insure that the warehouses and clinics have adequate supplies on hand at all times, reduce the frequency of resupply, and provide the opportunity to determine actual maximum and minimum stock levels based on conditions of full supply and on program performance.

4. Improving field supervision. Regional coordinators should be required to supervise every contraceptive outlet in their region at least once a month. During their supervisory visits inventory levels should be checked and maximum and minimum stock levels adjusted, if required. The regional supervisors should also insure that supply records are up to date and that reports are accurate and submitted on a timely basis.

5. More efficient use of vehicles. The GNFPP currently has two vehicles stationed in Accra that could be used more extensively to resupply the regions. Theoretically, 102 of the MOH's 348 facilities (static and mobile) in the country provide family planning services. However, in 1979 (the last year for which the MOH MCH director had data), only 63 reported. Given the small number of MOH clinics that provide family planning services, it is conceivable that the GNFPP with its 2 vehicles could resupply directly all active MOH clinics as well as the regional warehouses during a specified time period. If high maximum and minimum stock levels are established in the clinics, the frequency of resupply could be as often as once every quarter, instead of monthly. If GNFPP and/or MOH supervisors accompanied the vehicles, family planning services could be established in MOH facilities that currently do not provide them.

what role, if any, the GNFPP will play in the future is uncertain at this time. It was unofficially reported while I was in Ghana that, when the GOG presents its budget for FY 1982, the role of the GNFPP may be diminished considerably or the GOG may decide to disban it altogether. In addition, the bilateral agreement USAID/Ghana currently has with the Ministry of Economic Planning terminates in November of this year. The Mission has the option to extend the agreement until April or May of next year, but this decision had not been made at the time I was in Ghana. If the GNFPP does not continue to exist in the future or its role in the National Family Planning Program is reduced considerably, the Mission should consider the following alternatives to the GNFPP contraceptive supply system:

1. The MOH supply system. Under this alternative the MOH would manage its own contraceptive supplies, which it does to a certain extent now. Mechanisms for inventory control and shipping and receiving already exist in the system. But like the GNFPP, the MOH lacks a transportation capability in the regions.

2. Establish a vertical contraceptive supply system in the MOH supply system. The difference between this option and option No. 1 is that contraceptives would be managed separately from other supplies in the MOH system. Greater control would be exercised over the flow of contraceptives than would be possible under option No. 1, but this option would require the appointment of a contraceptive supply officer, a staff of 4 to 6 to supply the clinics directly, and vehicles. This option is similar to the model used by the CDC Yaws/Yellow Fever Project.

   In considering either option No. 1 or No. 2, the Mission should evaluate the organization and staffing of the MOH MCH division, and its ability to monitor the flow of supplies, since this division is the logical choice in the MOH to accept this responsibility.

3. DANAFCO. When the CRS program was operational, DANAFCO was successful in supplying its outlets. If the GOG concurred, it is conceivable that DANAFCO's supply network could be extended to include the resupplying of MOH clinics that currently and potentially could provide family planning services. This option may minimize the need to make investments in vehicles, as might be the case under options No. 1 and No. 2.

FPED/CDC consultants would be available to assist the Mission in studying the feasibility of each of these options.

V. CURRENT SUPPLY STATUS OF THE NATIONAL FAMILY PLANNING PROGRAM

In Tables 1 and 2 the current supply status of the National Family Planning Program is presented. In general, the number of contraceptives (orals, condoms, NeoTampoon) on hand in the central stores of the participating programs is extremely low. Translated into Couple Years of Protection (CYP),

only 40,818 CYP is currently on hand. This figure represents enough supplies for only 2.3 percent of married women age 15-44 in the country. Based on issues of contraceptives to clinics during CY 1980, a maximum prevalence of contraceptive use was 7.3 percent for these methods in that year (Table 3). (This analysis assumes that all issues to clinics are dispensed to users). Similarly, an analysis of supply data through May 1981 shows a projected 7.6 percent prevalence for 1981.

The contraceptive in shortest supply is oral contraceptives. In 1980, 60,328 CYP's of orals were issued from central stores to the clinics. As of May 1981, 22,409 CYP's have been issued (Table 3) and only 1,806 CYP's (Table 2) are currently on hand. Based on issues through May 1981, prevalence of use of orals for 1981 is projected to be 53,781 CYP's.

In April of this year the GNFPP received an emergency shipment of 223,200 cycles from FPIA, and it is the understanding of the Mission that an additional 760,000 cycles will be shipped this year by sea. In addition, the PPAG is expecting a shipment of 260,000 cycles from IPPF and the CCG is expecting a shipment of 480,000 cycles this calendar year. The expected shipments represent the following percent of CYP equivalents issued in 1980.

	CYP's Issued in 1980 (1)	CYP's Expected to Arrive this Year (2)	CYP's Expected in 1981 Relative to CYP's Issued in 1980 (3) = (2) ÷ (1)
GNFPP	46,753	58,461	125%
PPAG	11,637	20,000	172%
CCG	1,938	36,923	1,905%

If these shipments indeed arrive, it does not appear that any of the participating agencies will suffer a shortage of orals during the remainder of this calendar year. However, the timing of the arrival of these shipments is critical. As shown in Table 2 the balance on hand of orals in each of the participating programs is extremely low.

In order to alleviate the current shortage of oral contraceptives in the GNFPP and CCG, I recommend that:

1. The 287,00 cycles of orals in the DANAFCO warehouse that are not repackaged for sale through the CRS program be loaned immediately to the GNFPP and CCG with the understanding that DANAFCO's stocks will be replenished once the GNFPP and CCG receive their expected shipments. The manufacture date of the oral contraceptives in DANAFCO's warehouse is 1976. This loan will insure the rapid distribution of these older stocks.

2. The shipment of orals (760,000 cycles) the GNFPP and the Mission are expecting should be expedited in order to arrive in Ghana no later than August of this year.

3. An additional shipment of 304,200 cycles should be sent to the GNFPP via air. This shipment should be scheduled to arrive in Ghana no later than December 1981. Since the Mission does not have funds to purchase these contraceptives, they will have to be centrally funded by AID/W. This shipment, which represents 50 percent of the orals issued by the GNFPP in 1980, will sustain the MOH program at current levels until July 1982. Therefore, the Mission should schedule the first shipment of orals for the contract shipping period of July 1982 - June 1983 to arrive in Ghana in July 1982.

Based on issues of condoms in 1980 and current balance on hand, the GNFPP will require in addition to the 636,500 units it currently has on hand, 886,100 more units of condoms in order to equal the number of condoms that were issued in 1980. Later this year, 1.5 million units of non-colored condoms are scheduled to be shipped to Ghana, but this shipment is consigned to the CRS program. In order to insure that the MOH clinic program does not run out of condoms, I recommend that 888,000 condoms be procured and shipped to the GNFPP no later than September 1981. In the meantime, DANAFCO should loan sufficient quantities of condoms to the GNFPP in order to avert a stockout of condoms. In addition, the mission should schedule the first shipment of condoms for the contract shipping period of March 1982 - February 1983 to arrive in Ghana in March 1982.

VI. USER REPORTING SYSTEM

Current data on new acceptors and revisits for the Ghana National Family Planning Program are virtually non-existent. The latest report that I could find was for the month of October, 1978. According to Mrs. Kumekpor of the Institute of Statistical, Social and Economic Research (ISSER), University of Ghana, Legon, no clinic data have been processed nor have reports been prepared on the national program since the end of 1978. Although work is currently underway to prepare clinic data submitted to ISSER since 1978 for computer processing and analysis, it is unlikely that any reports on the National Family Planning Program will be forthcoming before AID's project with the GNFPP terminates in November of this year if the data has to include more than tables on new acceptors and revisits by method. Any tabulations on active users would require matching all visit records for each individual user. This would require computer programming that could not be completed by November.

Mrs. Kumekpor is interested in negotiating a new contract with GNFPP later this year for ISSER to continue to process the clinic data. Under the new contract, however, she will propose an up-grading of the computer facilities used by ISSER. Currently, ISSER uses an IBM 1140; she will propose renting time on an IBM 360 or 370 computer that utilizes magnetic tapes. The new system would have the capability to estimate the number of active users in the national family planning program. In addition, the information recorded on the tapes, which would essentially constitute a longitudinal record for each user that ever registered in the National Family Planning Program since 1969, could serve as a sampling frame for research and special studies.

The data that could be generated from an up-graded computer system would indeed be useful for program management and planning, especially the estimates of active users. They would also be useful to AID in estimating contraceptive requirements for the future. Nevertheless, there are several factors that mitigate against up-grading the system, or using a computer at all, to process the clinic data:

1. Cost, especially those costs associated with file maintenance of a computerized longitudinal record system.

2. Reporting has not been universal (between 30 and 90 percent of the clinics ever report during a given month) and thus the results of any analysis would only be representative of what occurred in the reporting clinics.

3. A computerized data system does not include the private sector, i.e. private physicians, pharmacies, the CRS program. In order to measure the impact of both private and public sector family planning efforts in the country a survey would be required. Conducting surveys periodically can often be done for less cost than is required to support a computerized family planning data system, and surveys almost always yield more information for program management and planning (Ref: Population Reports, Series M, No. 5, May-June 1981).

4. Delays in data processing will continue to occur because of incomplete and inaccurate reporting (due primarily to a lack of effective supervision), and the inefficiency of the Ghana postal service.

In order for USAID/Ghana to meet its quarterly obligation of reporting service statistics to AID/W, ISSER should be requested through the GNFPP to process the following data by quarter for CY 1980 and for the first three quarters of CY 1981:

1. Total new acceptors by method, i.e. orals, condoms, NeoSampoon, IUD's, sterilization, and other.

2. Total number of contraceptives dispensed to users by method (see above). With this information Couple Years of Protection (CYP) can be calculated and used as a surrogate estimation for active users in Part II of AID's quarterly report.

These data are collected on Form A (used only for new acceptors) and Form B (used only for revisits), the client record forms used in the clinics (see Exhibits 1 and 2). These tabulations should be easy to process since only aggregate data is being requested and each form represents a specific type of visit. All forms that contain the data being sought but heretofore would not pass a visual edit, should also be processed. Finally, ISSER should include in its report the number of clinics reporting during a given quarter and the total number of clinics "at a risk" of reporting during the same quarter.

Computer processing of client record forms submitted after September 30, 1980 should cease. Clinics should report monthly to their respective programs the following aggregate data:

1. Number of new acceptors served during the month, by method.

2. Total number of revisits (optional).

3. Quantities of each generic type of contraceptive dispensed to users during the month, i.e. cycles of pills, pieces of condoms, tablets of Neosampoon, tubes of foam, doses of Depoprovera, and number of IUD's inserted.

In the case of the PPAG, this is already being done through its independent reporting system.

If a surplus of forms A and B exists in the MOH and CCG programs, in order to save money, clinic personnel should continue to record data on these forms for each individual patient contact they make until these forms are exhausted. In order to prepare the aggregate monthly report discussed above, only the following items need to be consulted on the two forms to prepare the monthly reports:

Form A (Used for New Acceptors)	Form B (Used for Revisits)
# 15 or	# 9, or
# 16 or	# 10, or
# 17, or	# 11
# 18	

If a surplus of forms A and B does not exist in two programs, forms similar to those used in the PPAG program should be adopted.

Each program (MOH, PPAG and CCG) should individually report quarterly to USAID/Ghana the same aggregate data reported by the clinics, but in this case for their entire program. These data will be used by USAID for its quarterly reports, to estimate the number of active users served by the program, and to estimate future contraceptive requirements. The programs should submit their reports to USAID/Ghana no later than 30 days after the reporting period.

To estimate active users from supply data the number of each type of contraceptive dispensed to users is divided by a factor which is equivalent to the amount a couple will use in a years time. We recommend that the following factors be used to calculate Couple Years of Protection (CYP), which is a surrogate estimation of the number of active users served by the program.

Method	Factor*
Oral Contraceptives	13 cycles/year
Condoms	100 units/year
Foaming Tablets	120 tablets/year
Depoprovera	4 doses/year
Foam/Cream/Jelly	6 tubes/year
IUD	2.5 years (the average retention rate for IUD users)

*Ref. Wishik, S.M., "Couple Year of Protection: A Measure of Family Planning Program Output," International Institute for the Study of Human Reproduction, New York, 1973.

EXAMPLE: During 1980 a family planning program dispensed to users the number of contraceptives that appears in Column 2. To calculate CYP by method, Column 2 is divided by Column 3. By summing Column 4, total CYP is determined.

Method (1)	Quantity Dispensed (2)	Factor (3)	CYP (4=2÷3)
Orals	658,302 cycles	13	50,638
Condom	1,003,200 units	100	10,032
NeoSampoon	82,420 tablets	120	686
Depoprovera	9,017 Doses	4	2,254
			62,610

VII. ORAL AND CONDOM REQUIREMENTS FOR THE GNFPP AND CRS PROGRAMS

In 1979, the last year for which data are available to compare the GNFPP and CRS programs, the GNFPP issued and the CRS program sold the following CYP's of orals and condoms:

	GNFPP	CRS
Pill	3.7	.5
Condom	0.8	1.1

Based on these data the GNFPP issued 7 times more pills than the CRS sold and both programs issued/sold almost an equal amount of condoms. In other words, 88 percent of oral requirements for 1979 can be attributed to the GNFPP program.

Caution must be exercised in translating these data into contraceptive requirements for the two programs: (1) In the table above issues are compared with sales; issues do not directly reflect consumer demand; (2) 1979 was the first full year of operation for the CRS program; and (3) 1980 was not a representative year for the CRS program because all advertising was ceased in January, the program ran out of packaging materials and contraceptive supplies.

If the CRS program operations had not been constrained in 1980, it would have been possible to estimate what proportion of AID-funded contraceptives should be consigned to each program in the future. If the CRS program is revived, I recommend that the Mission maintain accurate records on the sales of both programs in order to make this estimation. In the meantime, I recommend that 75 percent of oral contraceptives and 50 percent of condoms scheduled for shipment to Ghana be consigned to the clinic program.

VIII. USAGE RATES FOR FOAMING TABLETS

It was reported several times during my consultation that NeoSampoon is a very popular method of contraception in Ghana. The clinic personnel I talked with said that NeoSampoon is the method of choice among young couples and that more often than not it is the men that come to the clinics to obtain it. The pill remains the method of choice among older couples.

Table 3 shows the popularity among users of NeoSampoon relative to the pill and condom. It is interesting to note that as of May 1981 the use of NeoSampoon exceeded that of the pill: 25,136 CYP versus 22,409 CYP. Under conditions of full supply the difference of use might have been even greater.

The prevalence of use of NeoSampoon has been increasing since 1979, as shown in the table below.

Prevalence of Use of Orals, Condoms and NeoSampoon
Among Married Women Age 15-44, 1978-1980 and 1981 (Annually Adjusted)
(Based on Issues)

	Year			
Method	1978	1979	1980	1981 (Annually Adjusted)
Orals	3.4	4.3	3.4	3.0
Condom	0.7	0.9	1.4	1.3
NeoSampoon	2.7	1.6	2.5	3.3
TOTAL	6.8	6.8	7.3	7.6

Under conditions of full supply this trend is likely to continue. For planning purposes the following table can be used as a guide in ordering additional supplies of NeoSampoon for the National Family Planning Program. The estimates of prevalence of use of NeoSampoon should be adjusted based on the results of the 1979 Ghana Fertility Study and on program performance.

	Year				
	1982	1983	1984	1985	1986
(A) No. of Married Women 15-44(000's)	1,854	1,908	1,963	2,020	2,078
(B) % Using NeoSampoon	5.0	6.0	7.0	8.0	8.5
(C) Supply Requirement (000's) (C = A x B x 120 Tablets/year/couple)	9,270	11,448	13,741	16,160	17,663

It should be noted that in 1979 the GNFPP and CRS programs issued/sold the same CYP equivalents of NeoSampoon - 0.2 CYP's each.

IX. PROJECTING CONTRACEPTIVE NEEDS FOR THE PRIMARY HEALTH CARE PROJECT

The Primary Health Care Project (Project 0082) is still in the planning stage and the Project Proposal (PP) is not expected to be approved before December of this year. If the PP is approved, the first 6 months of the project will be devoted to training and ordering of commodities, including contraceptives.

The Primary Health Care (PHC) Project will replace the Population Program Support Project, which, expires in November 1981. Under the PHC Project basic health services will be implemented at the community level in 3 districts in the Brong-Ahafo Region. In addition, USAID/Ghana will continue to provide contraceptive and other support to the MOH's family planning program. The mechanism by which the Mission will support the MOH family planning program is still under consideration.

In estimating AID's bilateral contraceptive requirements in the FY 1983 Contraceptive Procurement Tables I estimated high, especially for CY's 1982 and 1983, in order to have sufficient supplies on hand to meet current demand and to fill the pipeline. I also anticipated an increase in family planning services with the implementation of the PHC project. However, as the PHC PP is developed it may be necessary to readjust the tables based on the answers to the following questions:

(1) Will the community health workers distribute contraceptives in their localities? If so, how many health workers will there be, and which methods will they distribute? How many married women of reproductive age live in the catchment areas?

(2) Under the PHC Project will the MOH be encouraged to include family planning services in its clinics that currently do not provide these services? How many clinics will be included?

(3) Will AID provide contraceptive commodity support to the World Bank Primary Health Care Project in exchange, for example, for vehicles?

X. FY 1983 CONTRACEPTIVE PROCUREMENT TABLES

A. Discussion

Based on an analysis of contraceptive supplies currently on hand in Ghana, expected shipments, and the quantities of oral contraceptive and condoms issued by the central warehouses of the GNFPP, PPAG, CCG and YMCA programs from 1978 thru May 1981 (to estimate prevalence of use), I revised the FY 1983 Contraceptive Procurement Tables prepared by the Mission earlier this year. The major difference in the revised tables I prepared compared with those prepared by the Mission is that I estimated a higher prevalence of use of orals and condoms (to insure that sufficient quantities are on hand to meet current demand and to fill the "pipeline"), and included the contribution the private sector and other donors will make in the full supply analysis section of the table.

The method I used to estimate the prevalence of use of each method is subject to further revision since it is based on issues from the central warehouses to clinics rather than on the quantities of each method dispensed to users, which is not available. When the results of the 1979 Ghana Fertility Study conducted under the auspices of the World Fertility Survey become available, it may be necessary to change the prevalence figures I estimated.

The FY 1983 Contraceptive Procurement Table I prepared are found in Appendix A to this report.

RS Monteith

Richard S. Monteith, M.P.H.

TABLE 1

Contraceptives[1] On Hand in Central Stores As Of June 1981,
Ghana National Family Planning Program,
By Method And Agency

Method of Contraceptive	Total	Agency[2]			
		GNFPP	PPAG	CCG	YMCA
Orals (cycles)	23,500	3,000	20,500	0	NA[3]
Condoms (pieces)	1,553,060	636,500	152,640	703,920	60,000
NeoSampoon (tablets)	2,817,880	2,880	2,815,000	0	NA[3]

[1] Includes only orals, condoms and vaginal tablets (NeoSampoon)
[2] Agencies: GNFPP - Ghana National Family Planning Program
PPAG - Planned Parenthood Association of Ghana
CCG - Christian Council of Ghana
YMCA - Young Men's Christian Association
[3] Currently the YMCA does not distribute orals or vaginal tablets, but has requested that FPIA supply it with the latter.

TABLE 2

Contraceptives[1] On Hand in Central Stores As Of June 1981
Expressed in Terms of Couple Years of Protection (CYP),[2]
Ghana National Family Planning Program,
By Method and Agency

Method of Contraceptive	Total	Agency			
		GNFPP	PPAG	CC	YMCA
Orals	1,806	230	1,576	0	NA[3]
Condoms	15,530	6,365	1,526	7,039	600
NeoSampoon	23,482	24	23,458	0	NA[3]
TOTAL	40,818	6,619	26,560	7,039	600

[1] Includes only orals, condoms and vaginal tablets
[2] Assumes that a couple will use 13 cycles of oral contraceptives, 100 condoms or 120 tablets of NeoSampoon per year
[3] See footnote 3, Table 1.

TABLE 3

Contraceptives Issued to Clinics From Central Stores,
Expressed in Terms of Couple Years of Protection (CYP),
Ghana National Family Planning Program
By Agency and Method, 1978-1981 (May 31)

Agency	1978	1979	1980	1981 (May)	1981 (Annually Adjusted)
			Pill		
GNFPP	40,153	62,723	46,753	19,292	46,300
PPAG	13,932	9,970	11,637	2,194	5,266
CCG	2,014	1,120	1,938	923	2,215
TOTAL	56,099	73,813	60,328	22,409	53,781
			Condoms		
GNFPP	9,034	14,339	23,852	8,626	20,702
PPAG	1,550	640	1,392	763	1,832
CCG	423	358	102	48	115
YMCA	-	-	-	29	69
TOTAL	11,007	15,337	25,346	9,466	22,718
			NeoSampoon		
GNFPP	6,433	4,156	29,880	17,934	43,041
PPAG	37,992	22,696	13,594	7,202	17,284
TOTAL	44,425	26,852	43,474	25,136	60,325
			All Methods		
TOTAL	111,531	116,002	129,148	57,011	136,824
No. of Married Women 15-44	1,654,000	1,701,000	1,751,000		1,802,000
Percent Using All Methods	6.7	6.8	7.3		7.6

EXHIBIT 1

FORM A

CLIENT RECORD FORM

	FOR OFFICE USE ONLY — CARD COLUMN
1. Surname	
Other Names	
Name Commonly known by	
2. Address:	
House No.	
Town/Village	
Region	
3. Clinic Code	1 4
4. Client Identity No.	5 11
5. Date of Visit	12 17
6. Age (last birthday)	18 19
7. No. of Children ever born alive	20 21
8. No. of Children still alive	22 23
9. No. of months since last Pregnancy	24 25
10. Education (Circle highest attained)	
1. Never attended School	
2. Elementary (completed)	26 .....
3. Elementary (uncompleted)	
4. Post Elementary/Technical	
5. Secondary/Post Secondary	
6. University	
11. Referred by (circle one response only)	
1. Friend or relative	
2. Field worker (Government)	
3. Field worker (Private)	
4. Health worker (Government)	27 .....
5. Health worker (Private)	
6. Mass Media	
7. Other, Specify	
12. (a) Have you ever used anything to prevent pregnancy (circle correct response) 1. Yes 2. No	28 .....
(b) If yes, specify	29 .....
13. (a) Have you ever received any service at a Family Planning Clinic 1. Yes 2. No	30 .....
(b) If yes, specify last place service was received (circle correct response) 1. At this Clinic 2. At another Clinic	31 .....
(c) IF at another Clinic, specify the name	32 35
14. Specify service (s) received at that time (Refer to item 15) (1) ..... (2)	36 37

	FOR OFFICE USE ONLY — CARD COLUMN
15. Services given at Current Visit (Circle service(s) given)	
1. Oral Contraceptive	
2. Sterilization	
3. Loop Insertion	
4. Loop Removal	38 39
5. Loop Re-insertion	
6. Infertility Treatment	
7. Check up only	
8. Supply Visit (Indicate in Item 16 below)	
9. Other, Specify	
16. Supply Visit	
1. Supply Visit for Foam (No. cans .....)	
2. Supply visit for Pills (No. cycles .....)	40 42
3. Supply visit for Condoms (No. Pkts. .....)	
4. Other (specify Name and No.)	
17. If Oral Contraceptive (Tick correct box) — WITH IRON / PLAIN	
1. Norinyl (No. cycles .....) 17.1 / 17.2	
3. Ovral (No. cycles .....) 17.3 / 17.4	43 44
5. Norlestrin (No. cycles)	
7. Demulen (No. cycles .....) 17.5 / 17.6	
9. Other, (Specify Name and No .....) 17.7 / 17.8	
18. If IUD (circle the size and Type)	
1. Loop D (White Thread)	45
2. Loop C (Yellow Thread)	
3. Others, Specify Type	
19. Service given by: Dr./Mr./Mrs. Miss	
20. Designation (circle correct title)	
1. Physician	
2. Family planning Nurse	46
3. Family Planning Auxilliary	
4. Other (Specify)	
21. Date of Next Visit	47 52

RETURN TOP COPY TO: GHANA NATIONAL FAMILY PLANNING PROGRAMME, P. O. BOX M 76, ACCRA

EXHIBIT 2

FORM B

CLIENT RECORD FORM FOR ALL REVISITS

DO NOT FILL FOR FIRST VISITS

		FOR OFFICE USE ONLY CARD COLUMN
1	Surname	
	Other Names	
	Name Commonly Known By	
2	Address:	
	House No	
	Town/Village	
	Region	
3	Clinic Code	1 4
4	Client Identity No	5 15
5	To be answered by clients who do not have their identity cards: At which Clinic did you have your new identity number issued?	
	(a) Name of Clinic	
	(b) Region	
6	Date of Current Visit	16 21
7	Age (last birth day)	22 23
8	Services Given at Current Visit (Circle Service(s) given)	
	1. Oral Contraceptive 2. Sterilization	
	3. Loop Insertion 4. Loop Removal	
	5. Loop Re-insertion	24 25
	6 Infertility Treatment	
	7. Check up only	
	8. Supply Visit (Indicate in item 9 below)	
	9. Other, Specify	
9	Supply Visit	
	1. Supply Visit for foam (No. Cans .....)	
	2. Supply Visit for Pill (No. Cycles .....)	26 28
	3. Supply Visit for Condoms (No. Pkts .....)	
	4 Other Specify Name and No	

				FOR OFFICE USE ONLY CARD COLUMN
10.	If Oral Contraceptive (Tick correct box)	WITH IRON	PLAIN	
	1. Norinyl (No. cycles .....)	10.1	10.2	
	3. Ovral (No. cycles .....)	10.3	10.4	29 30
	5. Norlestrin (No. cycles .....)	10.5	10.6	
	7. Demulen (No. cycles .....)	10.7	10.8	
	9. Other, Specify Name and No			
11.	If IUD (circle the size and Type)			
	1. Loop D (White Thread)			
	2. Loop C (Yellow Thread)			31 .....
	3. Other, Specify Type			
12.	Has Client Changed Method			
	1. Yes 2. No			32 .....
13.	If Yes give previous Method			
	.....			33 .....
14.	If Client changed Method give the reason(s) for the change			
	(1)			
	.....			34 35
	(2)			
	.....			
15.	Service Given by:			
	Dr/Mr/Mrs/Miss			
16.	Designation (Circle correct title)			
	1. Physician			
	2. Family Planning Nurse			36 .....
	3. Family Planning Auxiliary			
	4. Others, (Specify			
17.	Date of Next Visit			37 42

Please Mail at the end of the month to Ghana National Family Planning Programme, P. O. Box M. 76, Accra

PROGRAM ANALYSIS OF ORAL CONTRACEPTIVE AND CONDOM SUPPLIES

	1980	1981	1982	1983	1984	1985	1986
A.1	1,751	1,802	1,854	1,908	1,963	2,020	2,078
A.2.a.	4.0	4.5	11.0	11.0	9.0	9.0	9.5
A.2.b.	2.0	1.5	4.0	2.5	1.5	1.5	1.5
A.3.a	911	1,054	2,531	2,728	2,297	2,363	2,566
A.3.b.	3,502	2,703	7,416	4,770	2,945	3,030	3,117
B.1.a.	69	70	72	74	77	79	81
B.1.b.	350	360	371	381	392	404	415
B.2.a.	77	1,723.2	252	1,483	1,157	1,205	1,261
B.2.b.	66	2,648	2,000	2,887	1,002	1,002	1,002
B.3.a.	0	0	0	0	0	0	0
B.3.b.	0	0	0	0	0	0	0
B.4.a.	146	1,793.2	324	1,557	1,234	1,284	1,342
B.4.b.	416	3,008	2,371	3,268	1,394	1,406	1,417

INVENTORY ANALYSIS - ORALS

	1981	1982	1983	1984	1985
1.a	674.4	2,190.8	2,170	2,392.5	2,363
1.b	16.4				
2.a.	760.8	2,186.2	1,393.5	1,033.5	1,282
2.b.	1,793.2	324	1,557	1,234	1,284
3.	-1,054	-2,531	-2,728	-2,297	-2,363
4.	2,190.8	2,170	2,392.5	2,363	2,566

WORKSHEET FOR CALCULATION OF ORAL CONTRACEPTIVE REQUIREMENTS

	1982		1984
1.	2,190.8	1.	2,392.5
2.	324	2.	1,234
*3.	2,531	3.	2,297
*4.	2,170 (125%)	4.	2,363
5.	-2,186.2	5.	-1,033.5

	1983		1985
1.	2,170	1.	2,363
2.	1,557	2.	1,284
*3.	2,728	3.	2,363
*4.	2,392.5 (125%)	4.	2,566
5.	-1,393.5	5.	-1,282

*This represents the number of cycles needed to meet demand plus an additional amount to fill the pipeline.

INVENTORY ANALYSIS - CONDOMS

	1981	1982	1983	1984	1985
1.a.	3,052	4,992	4,770	2,945	3,030
1.b.	483				
2.a.	1,152	4,823	0	1,636	1,711
2.b.	3,008	2,371	3,268	1,394	1,406
3.	-2,703	-7,416	-4,770	-2,945	-3,030
4.	4,992	4,770	2,945	3,030	3,117

WORKSHEET FOR CALCULATION OF CONDOM REQUIREMENTS

	1982		1984
1.	4,992	1.	2,945
2.	2,371	2.	1,394
3.	7,416	3.	2,945
4.	4,770	4.	3,030
5.	-4,823	5.	-1,636

	1983		1985
1.	4,770	1.	3,030
2.	3,268	2.	1,406
3.	4,770	3.	3,030
4.	2,945	4.	3,117
5.	+323	5.	-1,711