Findings from the Sub-Saharan Africa Urban Family Planning Study

BLANTYRE
City Report

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<th>Full Form</th>
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<tr>
<td>AIDS</td>
<td>Acquired Immunodeficiency Syndrome</td>
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<tr>
<td>BDHO</td>
<td>Blantyre District Health Office</td>
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<td>CAFS</td>
<td>Centre for African Family Studies</td>
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<tr>
<td>CBD</td>
<td>Community-based distribution</td>
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<td>COC</td>
<td>Combined oral contraceptive</td>
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<td>DPHN</td>
<td>District Public Health Nurse</td>
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<tr>
<td>DHBM</td>
<td>Department of Health Blantyre Municipality</td>
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<tr>
<td>FEFO</td>
<td>First expiry / first out</td>
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<td>FP</td>
<td>Family planning</td>
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<td>FPPMES</td>
<td>Family Planning Program Monitoring and Evaluation System</td>
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<td>GTI</td>
<td>Genital tract infection</td>
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<td>GTZ</td>
<td>German Agency for Technical Cooperation (Gessellschaft fur Technische Zussammenarbeit)</td>
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<td>HHRAA</td>
<td>Health and Human Resources Research and Analysis for Africa</td>
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<td>HIV</td>
<td>Human immunodeficiency virus</td>
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<td>IEC</td>
<td>Information, education and communication</td>
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<td>IUD</td>
<td>Intra-uterine contraceptive device</td>
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<td>LMP</td>
<td>Last menstrual period</td>
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<td>MCH-FP</td>
<td>Maternal/child health and family planning</td>
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<td>MDHS</td>
<td>Malawi Demographic Health Survey</td>
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<td>MHDPHN</td>
<td>Municipal Health Department Public Health Nurse</td>
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<td>MOH</td>
<td>Ministry of Health</td>
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<td>NFP</td>
<td>Natural family planning</td>
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<td>NFWCM</td>
<td>National Family Welfare Council of Malawi</td>
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<tr>
<td>NGO</td>
<td>Non-governmental organization</td>
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<tr>
<td>OCP</td>
<td>Oral combined pill</td>
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<td>POP</td>
<td>Progesterone only pill</td>
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<td>PV</td>
<td>Per vaginum</td>
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<tr>
<td>PVO</td>
<td>Private voluntary organization</td>
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<tr>
<td>RPHN</td>
<td>Regional Public Health Nurse</td>
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<td>SDP</td>
<td>Service delivery point</td>
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<td>SRHO</td>
<td>South Region Health Office</td>
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<td>STD</td>
<td>Sexually transmitted disease</td>
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<td>USAID</td>
<td>United States Agency for International Development</td>
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<td>VSC</td>
<td>Voluntary surgical contraception</td>
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<td>WHO</td>
<td>World Health Organization</td>
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Acknowledgements

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We are grateful to the family planning clients, service providers, and organizations in the public and private sectors who participated in the study. We are also grateful to the Government of Malawi for approving the conduct of the study. We thank the Population Council for its assistance in adapting the situation analysis approach to this study. We also wish to thank the USAID Bureau for Africa HHRAA Project for financial support and the USAID Mission to Malawi for concurrence to conduct the study.

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Introduction

The SEATS project of John Snow, Inc., in collaboration with the Centre for African Family Studies, Columbia University's Center for Population and Family Health, and the Population Council, with funding from the USAID Bureau for Africa, recently completed a major study to determine how family planning service delivery programs in Sub-Saharan African cities can be made more efficient and effective. The working hypothesis is that many/most urban family planning programs are overwhelmed by the recent rapid growth of urban populations and are not equipped to satisfy potential demand for contraceptive services. In part, past decades of focusing development assistance on unserved and underserved rural areas has contributed to the inability of urban infrastructure to keep pace with rapid urbanization. Three cities are included in the study: Mombasa, Kenya; Blantyre, Malawi; and Bulawayo, Zimbabwe.

This report covers the work done in Blantyre, Malawi, during the period January through November 1994, using new situation analysis data, service statistics, geographical data, and an assessment of the capacity required for future family planning services.
Summary of findings and conclusions

Overall, family planning service delivery in Blantyre has the potential to expand and reconfigure itself in response to changing demand.

• Estimates of the future family planning service load in Blantyre suggest that the current system must be substantially expanded to maintain and to raise the contraceptive prevalence rate. This service burden is increased in light of post-Cairo Conference mandates for greater integration of family planning and other reproductive health services.

• All SDPs in Blantyre offer resupply methods but very few offer long term methods, which increases the city's future client load dramatically. However, the 1992 Malawi DHS shows that the unmet need for long term methods is high in Malawi, so eligible women should be responsibly encouraged to adopt them.

• Family planning services are available at 79% of public sector SDPs, but only 35% of private and 29% of NGO/other SDPs. This constitutes a major opportunity for the expansion of services to those SDPs not currently offering them.

• Many factories in Blantyre run clinics for their workers, but do not offer FP services. Since the clients are mainly men, the clinic staff generally feel that FP services are not appropriate. This indicates that further education of staff and clients is necessary, particularly on methods that males can use.

• Pharmacies appear to be a tremendously underutilized FP outlet in Blantyre: most pharmacies report that FP sales are important to their business, their
infrastructures are in place, their hours of operation are convenient for customers, and there is significant interest among pharmacy staff for expanded FP training. However, very few methods are offered, and training is low.

- CBD is another major opportunity for expansion in Blantyre. The four CBDs currently in operation are eager for improvements to their program.

- Recordkeeping and reporting systems at SDPs are not entirely complete, particularly in the private sector. The reporting system would benefit if all SDPs reported to one centralized point, and if periodic feedback on reports were implemented. Supervision activities are extremely scarce in Blantyre.

- The majority of clients (79%) would continue using FP even if they were required to pay for services. However, this willingness to pay does not seem to be backed up with an ability to pay.

Although it is acceptable in some respects, the quality of services in Blantyre is in need of improvement.

- The vast majority of SDPs have commendable basic physical infrastructure.

- Although most SDPs offer a range of resupply methods (largest in the public sector), very few offer sterilization or Norplant®. If the availability of long-term methods is not improved, the future client load will be extremely heavy.

- Those SDPs that provide FP services do not generally publicize the availability of these services.
• IEC materials are very effective in client motivation and education, but they are generally scarce in Blantyre.

• Overall, both nurses and doctors are in need of increased training in FP, and particularly on long-term methods, male-involved methods, and IEC.

• During the client/provider interactions, new FP clients receive complete clinical assessments prior to initiation of a contraceptive method. Revisit clients do not receive the same level of examination.

• In general, adequate information about spacing methods is given to clients, but far less is provided about limiting methods.

• Sufficient follow-up information is given to most new clients.

• The majority of new acceptors and revisits were satisfied with their interactions with service providers.

Non-family planning services are available at some SDPs, but the level of integration of these services with FP varies across SDPs.

• Consultations on STDs are provided at 65% of the SDPs in this study, and 77% of SDPs provide information on HIV/AIDS.

• However, during the client/provider interactions, HIV was discussed with only 30% of new clients and 2% of revisits. Although most of the SDPs have favorable policies toward integration, very little if any has actually taken place.
• Staff lack strong technical training on managing STDs, and knowledge of signs and symptoms is generally low. Improved staff training is necessary for full integration of FP and STD services.
Background

Malawi

Urbanization

Southern Africa, like the rest of Sub-Saharan Africa, is urbanizing at a rapid pace\(^1\) (Figure 1). By 2025, fully 66% of the Southern African population is expected to reside in urban areas, up from 44% in 1990.

![Figure 1](image)

![Figure 2](image)


\(^1\) The United Nations definition of 'Southern Africa' includes Botswana, Lesotho, Namibia, South Africa, and Swaziland. The UN considers Malawi to be an East African country. For the purposes of this report, however, Malawi will be compared to the Southern African region.
Figure 2 shows that Malawi is less urban than the region as a whole, but its urban population is growing much faster than the region. In 1990 the proportion of Malawi's population in urban areas was only 12%, as compared to 44% in Southern Africa. By 2025, 32% of Malawi's population will live in urban areas, as compared to 66% in the region. In each decade, however, the percent urban in Malawi grows markedly faster than the regional average.

*Family planning and fertility*

In general, fertility in Malawi is high and modern contraceptive use is relatively low, but the TFR is nonetheless declining. The 1992 DHS survey in Malawi shows that the modern CPR among all WRA is 6.3%, and among urban married WRA it is 17.2%. The TFR among all women is 6.7, down from 7.6 as recorded in the 1984 Family Formation Survey. Although data on previous CPR are not readily available, an increasing CPR over the last decade would certainly account for the observed decline in fertility.

Moreover, unmet need for FP is high in Malawi; the 1992 DHS shows that 36% of WRA have such an unmet need. The need for limiting is particularly high, as 45% of the women with unmet need want to limit their births (this figure is 55% in urban areas). This proportion of limiting unmet need is much higher than that reported for most Sub-Saharan African countries, and bodes well for Malawi's prospects for a higher CPR. Abortion is illegal in Malawi.

Although some efforts toward a national family planning program were begun in Malawi in the 1960's, they encountered opposition and were eventually abolished. In the ensuing decades, the need for such a program became increasingly clear, and in 1982 a national child spacing program was established that offered an integrated MCH
approach. This program included some FP activities, but did not offer clear and strong policy, legal support or guidelines to FP providers.

In 1993 a National Population Policy was adopted by the Government of Malawi, which resulted in the September 1993 National Family Planning Strategy for 1994-1998. Coordinated by the National Family Welfare Council of Malawi (NFWCM), the plan represents the combined efforts of the governmental, parastatal, NGO, and private sectors. Its stated goal is to "increase the modern contraceptive prevalence rate (CPR) from an estimated 7% in 1992 to at least 15% in 1998, and to reduce the total fertility rate from 6.7 to 6.0 or less during the same period."

The rapid urbanization in Malawi as well as the stated goal of doubling the CPR by 1998 will place an extraordinary burden on urban family planning systems. Although many of the concerns that this report brings up are more than adequately addressed by the national plan, the particular circumstances of Blantyre (and by extension, urban areas in Malawi in general) are investigated here in detail.

**Blantyre**

*Geography and population*

The city of Blantyre serves as the administrative and business capital of Blantyre district, which is in the southern region of Malawi. It is the largest city in Malawi, covering 220 km². The 1987 census showed that the population of Blantyre was 333,120, and women of reproductive age constituted 23% of the overall population. These figures give a population density of 1,514 people/km², the highest density in Malawi.
Map 1 in Appendix 3 shows the basic outlines of the Blantyre/Limbe area, giving the main roads, neighborhood names, and developed or residential areas. The two downtown areas are located by the large city names ("Blantyre" and "Limbe"), and the railroad pattern just north of the Chichiri area is an industrial region.

**Family planning and fertility**

The FPPMES found the Blantyre CPR to be between 5% and 6% in 1993. The 1992 DHS found the urban CPR among married women to be 17%\(^3\). The difference between these estimates is due to two factors. First, because the FPPMES is based on distributed commodities, it does not distinguish between married and unmarried clients. Its base is all WRA, whereas the DHS base is the smaller population of married WRA. This inflates the DHS figure relative to the FPPMES results. Secondly, the FPPMES does not include previous sterilizations or IUDs, nor does it include the private sector, from which no service statistics were available. As a compromise between these two estimates, this study uses a CPR of 10% in the projections of future service delivery requirements (see "Future capacity requirements", below). The urban TFR in Malawi is 5.5, which serves as the best estimate for Blantyre.

\(^2\) Unfortunately, no district-level data were available at the time of this report, so the density of women of reproductive age by district cannot be calculated.

\(^3\) The DHS for Malawi did not oversample Blantyre, so a CPR and TFR for Blantyre specifically are not possible.
The DHS shows that on a national level, fully 70% of WRA who are currently using contraception get their supplies from public sources. The FPPMES in Blantyre agrees with this national estimate. It shows that about 67% of users get supplies from municipal or central government SDPs, and the remaining 33% are served by the NGO sector (again, there were no available data from the private sector, so these estimates may not be directly comparable). Table 1 gives a summary of population and demographic indicators for Blantyre.

A 1993 survey by the NFWCM found that Blantyre district had 85 registered health facilities, of which 60 were located in Blantyre city. Almost half (26) of those in the city were known to be providing FP services. For the present study, a new listing of Blantyre city SDPs was drawn up, and it contains 71 SDPs, 32 of which offer FP services. The distribution of these SDPs by sector is discussed further below (see "SDPs by type - Distribution by sector").
Methodology

Following a series of planning meetings between the USAID Africa Bureau HHRAA project staff, the John Snow Inc. SEATS project staff, Population Council Operations Research project staff and the Centre for African Family Studies staff, a methodology to be used for the study was developed and agreed upon. CAFS was then given the responsibility for developing the data collection instruments and the necessary field logistics. The Centre was also responsible for the data collection, analysis, preliminary preparation of city reports and coordination of the in-country dissemination workshops. The Center for Population and Family Health and SEATS staff were responsible for the FPPMES service statistics analysis, mapping reports, and editing of the city reports, as well as for the logistical arrangements for the final conference in Blantyre in March 1995.

In all, the study in Blantyre included the following activities.

Reconnaissance activities

After obtaining concurrence for the study from the USAID Mission in Malawi, CAFS staff visited Blantyre to solicit assistance from local family planning organizations. Discussions were held with the National Family Welfare Council of Malawi (NFWCM), the MCH-FP Department of the Ministry of Health, the Southern Region Health Office (SRHO), the Blantyre District Health Office (BDHO) and the Department of Health of Blantyre Municipality (DHBM)

A listing of the existing SDPs in Blantyre was prepared with assistance from the above agencies. The listing, which is included as Appendix 1, includes 68 SDPs, 41 of which
offer family planning services. See "Distribution by type" below for further discussion of these SDPs.

**Recruitment and training of data collection assistants**

During the reconnaissance visits, the NFWCM, SRHO, BDHO and the DHBM agreed to collaborate with CAFS in the proposed study. The regional public health nurse (RPHN), district public health nurse (DPHN), municipal health department public health nurse (MHDHPH) and the head of the research and evaluation unit at the NFWCM were seconded to the project by their institutions.

These contact people identified potential data collection assistants. Following interviews conducted jointly by CAFS staff and the collaborating agencies in Blantyre, several nurses and statistical clerks were recruited. A ten-day residential training of these assistants involved theoretical and practical training on the study objectives, methodology and instruments. The assistants also participated in translating the questionnaires into Chichewa, which is the most commonly used language in the district.

At the end of the training, both the data collection assistants and the customized data collection instruments were pretested in two of the clinics in the municipality. The final selection of assistants was based on performance in the pretest.

**Data collection**

*Situation Analysis data*

Using a modified Situation Analysis methodology (based on the approach developed by the Population Council), data were collected on the status of SDPs, management
systems, human resources, client/service provider interactions, non-clinic-based and other FP service delivery systems, and integration of FP services with other reproductive health services, especially STDs and HIV. Information was also collected on the feasibility of cost sharing in the FP programs and on pharmacy family planning activities. (This was an expansion of the areas usually covered by the Population Council Situation Analysis methodology, which does not usually include STD/HIV management, cost sharing, pharmacy, or private sector modules.)

The client/provider interactions were observed by trained nurses. The data were collected with as much objectivity as possible (a standard checklist was used), but the consultations were probably affected by the presence of observers. Over the course of the data collection, however, it became clear that behavior modification on the part of providers decreased with each client. Nonetheless, these results should be viewed with this potential bias in mind.

Service statistics

Using the available records at SDPs, service statistics covering the longest continuous period of at most twelve months in the past 24 months were collected. The data cover the number of new clients, number of revisits, and contraceptives dispensed by type. Since the private sector’s records were not available, only public and NGO SDPs are included. The data were then processed with the FPPMES (Family Planning Program Monitoring and Evaluation System) to generate estimates of contraceptive prevalence, method mix, and service delivery capacities.

Mapping data
Geographical data on SDP location and district population data were collected in Blantyre by SEATS staff. CPFH then translated these data into computerized maps showing the geographical distribution of SDPs by type. The maps generated in this analysis are included as Appendix 3.

Data management and processing

The Situation Analysis data were entered and primarily analyzed at CAFS, using EPIINFO. The service statistics were entered and analyzed at CPFH using FPPMES (Lotus). Geographical data were collected by SEATS staff, and were entered and analyzed at CPFH using AutoCAD and MapInfo software packages.

Dissemination workshop

After data entry, a preliminary analysis was undertaken and the findings presented at a one day dissemination workshop in Blantyre. The objectives of the workshop were to interpret preliminary findings and to generate practical recommendations for program improvement.

The workshop was attended by a cross section of individuals involved or interested in FP services in Blantyre, who would appreciate the findings and enhance the output of the workshop. The majority of the participants were invited by the NFWCM, DMOH, and MMHD, and included representatives of the various types of SDPs and of the provincial, district and municipal administration, as well as community opinion leaders. In addition to the Blantyre residents, representatives from the Ministry of Health headquarters in Lilongwe, SEATS, USAID, Mzuzu City Council, GTZ, WHO, Project Hope, Ministry of Local Government, Southern Region Health Office, and CAFS attended the workshop.
The workshop consisted of plenary and group work sessions. At the start of the workshop, presentations of the study objectives, methodology and preliminary findings were made. The participants then divided into three working groups to interpret study findings and generate practical recommendations. Each group was assigned an area of the study to review in detail: status of SDPs and management systems, client/provider interactions, and service integration. The group discussions were facilitated by CAFS, SEATS, and HHRAA staff.

The dissemination workshop yielded useful comments and recommendations that are discussed together with the results. A report of the Blantyre dissemination workshop is included as Appendix 2.
Principal findings and conclusions

Future capacity requirements

The magnitude of the task facing family planning programs in Blantyre in the coming decades is formidable. Estimating this magnitude into the first quarter of the next century requires several assumptions and invokes numerous unknowns. This study's assumptions include continued high rates of urban growth, increasing urban demand for family planning services, and differing proportions of use of longer term and more effective methods. Among the important unknowns are social and economic changes in the coming decades, changes in reproductive behavior and contraceptive technology, whether new urban service delivery strategies will evolve, the impact of stronger links between family planning and other reproductive health services, and the role of the private sector.

Nevertheless, it is important to develop estimates of future workloads to illustrate the capacities required. The first assessment is of the current Blantyre services, and the second is of the magnitude of services needed in coming decades.

For the first task, the FPPMES was used to estimate contraceptive prevalence for Blantyre. Service statistics were first collected on all distributed methods for the 12 months prior to the study. Reports were received from ten public SDPs and nine NGO/PVO/mission SDPs, but none were available from private SDPs. The resulting estimate of CPR is just over 5%, and about 6% when the non-reporting SDPs are taken into account (see Appendix 4 for a technical discussion of these estimates). As mentioned above, this estimate is probably low due to the absence of private sector data and the lack of accounting for previous sterilizations and IUDs. Moreover, the DHS found Malawi's urban CPR to be 17% among married women, far higher than the
FPPMES result, which measures CPR among all women of reproductive age. In light of these considerations, the CPR for Blantyre is estimated here to be 10%. Thus, the current family planning system is probably capable of sustaining at least 10% CPR given the current population.

For the second task (estimating future service delivery needs), our model was developed as follows. First, the current CPR and method mix are used to construct a baseline of client contacts. The method mix used here is the one observed among urban WRA by the 1992 DHS (see "Method mix", below). Next, the population of WRA is projected through 2025 from the current population estimate, using United Nations urban growth rates.

Two additional parameters are introduced at this point. The first considers maintaining, doubling, or tripling the current estimated CPR of 10%, and the second introduces various levels of use of longer term methods. The results are then expressed as the

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4 With the given data, more detailed estimates of Blantyre's potential capacity are not possible. (This analysis is carried out for Mombasa; see "Family Planning Services in Mombasa, Kenya: Findings from the Sub-Saharan Africa Urban Family Planning Study").

5 In this case, the 1987 population of Blantyre (333,120) was inflated by the national urban population growth rate (7.89% growth/year) to an estimate of 418,354 people in 1990. Assuming 23% of the total population is WRA, then the 1990 WRA population is estimated to be 96,222 people. This is the figure used as the 1990 baseline in the ensuing analysis.

6 These levels are set at 0%, 20%, 40%, and 60% users of IUD's, sterilizations, and Norplant®. Note that these figures do not refer to the percent of all WRA using long-term methods. Instead, they refer to the percentage of the overall CPR attributable to long-term methods. For example, if the CPR is 20%, and half of those users are practicing long-term methods, then for these purposes the "level of use of long-term methods" is 50%.
number of client contacts\(^7\) required in a future year under various combinations of these assumptions.

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**Figure 3**

- **Client contacts to maintain 10% CPR in Blantyre**

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\(^7\) Standard numbers of client contacts are estimated as follows. These values may vary for individual programs, so the projections should be evaluated in light of these defaults.

- **oral contraceptives**: 4 visits per year
- **injectables**: 4 visits per year
- **sterilization**: 2 visits/current year acceptor (with 10% of total sterilization users assumed to have accepted in the current year)
- **IUD**: 2 visits/current year acceptor (with 33% of total IUD users assumed to have accepted in the current year)
- **Norplant®**: 2 visits/current year acceptor (with 33% of total Norplant® users assumed to have accepted in the current year)

Condons are not included in this analysis. Assuming a condom user requires 12 contacts per year, including condoms in this projection resulted in astronomical figures. This was judged to be fairly misleading, since condom resupply visits normally take very little staff time as compared to other methods.
Figure 3 shows the estimated number of client contacts to maintain the 10% CPR, assuming 0%, 20%, 40%, or 60% of that CPR is comprised of long term methods. In the most extreme scenario, in which no women use long term methods, Blantyre would face almost 300,000 client contacts in the year 2025, up from about 23,000 in 1990. The DHS shows that currently about 36% of all contraceptive users in Blantyre use long term methods: continuing with this mix would result in roughly 200,000 client contacts by 2025.

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**Client contacts to achieve 20% CPR in Blantyre**

![Graph showing client contacts to achieve 20% CPR in Blantyre from 1990 to 2025. The graph indicates that without long term methods, client contacts would increase significantly by 2025.]
Figure 4 shows a similar estimate of future client contacts given a doubled CPR of 20%. This projection is particularly relevant because doubling the CPR is a stated goal of the National Family Planning Strategy. This estimate predicts almost 600,000 client contacts with no long term method use, and about 400,000 contacts at the current level of 36% long term use. A final projection estimates client contacts given a tripled CPR of 30% (Figure 5), and it predicts about 600,000 contacts by 2025 at the current rate of 36% long term method use among all users.

![Client contacts to achieve 30% CPR in Blantyre](image)

*Figure 5*
Clearly, the service delivery "burden" of maintaining clients on resupply methods is dramatically lessened by increasing the proportion who choose longer term methods. Nevertheless, this "burden" requires substantial expansion of services if contraceptive prevalence rates are to be increased by 2025. This client load is further increased in the light of post-Cairo Conference mandates for greater integration of family planning and other reproductive health services.
SDPs by type

Availability of FP services at SDPs

The listing of SDPs in Appendix 1 contains 71 SDPs, 32 of which offer family planning services. In this study, a total of 56 SDPs were visited, 27 of which offer FP services. The remaining 29 visited SDPs do not provide these services, but their ability to do so was assessed.

For the purposes of this analysis, the 27 visited SDPs that provide FP are divided into three sectors: the public sector, which includes central maternity hospitals, municipal clinics, central government clinics, and parastatal clinics (14 SDPs); the private sector, which includes private hospitals, doctors, and clinics (8 SDPs), and NGO/other, which is a miscellaneous category including NGO, PVO, mission, and industrial (5 SDPs).

Table 2 gives the number of SDPs in each sector by FP service delivery status as represented in Appendix 1. This shows that 27% of the total SDPs are public (19 out of 71), 44% are private (31 out of 71), and 30% are NGO/other (21 out of 71). Thus, the
largest share of SDPs are private, but since these SDPs tend to be small, this sector does not necessarily serve the most people. The best estimate of the proportion of clients served by sector in Blantyre comes from the 1992 DHS, which shows that in the country as a whole fully 70% of women receive supplies from public SDPs.

Family planning services are available at 79% of public sector SDPs, but at only 35% of private and 29% of NGO/other SDPs. This constitutes a major opportunity for the expansion of services, particularly in the private and NGO/other sectors. As the National Family Planning Strategy puts it, "meeting the demand for services requires the involvement of more agencies, including private practitioners and communities who have clinics and other suitable facilities that can be used for FP service delivery."

To investigate this opportunity, the non-FP providing clinics were visited to assess their status. Most have adequate space and privacy to provide FP services, but only six of the 26 staff interviewed had attended some training in FP. Most of these SDPs service industries that employ mainly men (with no provision for family members), so the interviewees generally felt that FP services would not be appropriate. This indicates that further education of staff and clients is necessary, particularly on methods that males can use. The National Family Planning Strategy includes plans to "add family planning counselling and service delivery centres to selected programmes serving men...[and] establish condom information and distribution centres in at least 1500 workplaces, and social/community/ sports settings frequented by men." In Blantyre, these industrial SDPs constitute a significant opportunity for the expansion of FP services to men.

9 The FPPMES shows the majority (67%) of Blantyre clients get supplies from the public sector, but no private service statistics were available for that analysis, so the national figure must be used.

10 One industrial SDP, David Whitehead, already provides condoms. For the purposes of this study, it is not included as a family planning SDP since it offers no other methods, but it is the first apparent example of condom offerings to men in particular.
Geographical distribution of SDPs

Appendix 3 contains maps showing the locations of all municipal, central government, parastatal, NGO, and industrial SDPs offering family planning in the city. In the private sector, 8 out of 11 SDPs are located. As for those not offering family planning services, all the parastatal and mission SDPs are identified, as are 10 of 13 industrial SDPs and 9 of 20 private SDPs.

Map 2 shows the overall distribution of SDPs that do offer FP services. They are fairly well distributed throughout the residential areas, as well as clustered in the two downtown areas. Map 3 shows those that appear not to provide FP services, and they are also distributed throughout the city (two are located off the map). A cluster of these SDPs appears in the central industrial region: this is the group of industrial clinics that serve mainly men and therefore do not feel family planning services are required. Although not drawn on these maps, the catchment areas of the four CBDs in Blantyre lie in the outermost residential neighborhoods pictured here.

Map 4 gives the pharmacy locations. As observed in other cities, they are heavily concentrated in the downtown areas. This represents an opportunity for expansion into the outer residential areas.

Maps 5 through 10 show the distribution by type of those SDPs that do offer family planning services. Map 5 gives central government SDPs, which are almost exclusively located in residential areas, and map 6 shows that the four municipal clinics are located even further from the centers. The parastatal SDPs are located mainly in the Limbe downtown (these are clinics attached to the railroads). The central parastatal SDP is at the Polytechnic University. Map 8 shows that the NGO and mission SDPs, like the
central government and municipal SDPs, are mainly distributed throughout residential areas. Map 9 gives the location of the two industrial SDPs that offer family planning, one in downtown Limbe, and one in the central industrial area.

Finally, map 10 shows the locations of the private SDPs that offer family planning services. With one exception, they are all located in the two downtown areas. Like the pharmacies, private providers show room to expand into residential areas.

Pharmacies

Eight pharmacies were visited in this study, and they all have appropriate basic facilities and operating hours. They each have water, electricity and a telephone or radio, and all except one have a refrigerator. They are all open for a full working day during weekdays, and three are open partial hours on weekends. One, Malawi Pharmacy - Haile Selaisse, is open seven days a week for nine hours per day.

The contraceptive supply at these pharmacies is scanty. Only three pharmacies offer condoms (up to four brands). One is well-stocked with five brands of pills, and two others offer one brand, but the remaining five pharmacies do not stock pills at all. Two pharmacies offer Depo-Provera, and none offer spermicides. Moreover, there are virtually no IEC materials to accompany these supplies: only one pharmacy reports to have some pamphlets on various FP topics, but they are not displayed.

Given this relative lack of supply, it is not surprising that fully half of the eight respondents are never asked FP questions by customers. The other half stated that they are asked about avoiding pregnancy, condom and injectable brands, and problems with the pill.
The fact that pharmacies are at times seen as sources of FP information by the public sets some importance on pharmacy staff training. Unfortunately, FP training among pharmacy staff appears to be low. Of the eight staff people directly interviewed, two were pharmacists, both of whom had received FP training, and one non-pharmacist had been trained, but the remaining five had no training in FP. Each respondent was then asked about the complete staff at his/her pharmacy, and training information about a total of 64 staff was obtained. Of these 64 staff, only five were known to have received any FP training, and those five are clustered in two pharmacies. Six out of the eight respondents expressed an interest in attending additional FP training.

Nevertheless, the eight respondents seemed to be fairly well-informed about methods. With regard to the pill, for example, six out of seven who answered the questions knew when clients should start taking pills, how often they should be taken, and what to do if clients forget a pill. All of them were able to name at least one complication with the pill.

In general, then, pharmacies appear to be a tremendously underutilized FP outlet in Blantyre. Supplies are quite low, training is rare, and the public does not generally seem to turn to pharmacists for FP information. However, an extraordinary potential exists, since six of the eight pharmacies report that FP sales are important to their business, their infrastructures are in place, their hours are convenient to customers, and there is significant interest among pharmacy staff for expanded FP training.

Establishing pharmacies as FP outlets would involve several tasks: establishing contraceptive supplies (especially pills and injectables), retraining staff, producing and distributing IEC materials, and reorienting the public to think of pharmacies as such outlets. The National Family Planning Strategy does not address pharmacies as such.

A caveat about these data is in order. Since the information on FP training was not gathered directly from 64 staff members, it reflects eight respondents' knowledge about the training of their co-workers. There is thus a significant chance that the training levels are actually higher among pharmacy staff.
but contains plans for stimulating the private sector in general. In Blantyre, attention to the specific needs of pharmacies can have a tremendous impact on contraceptive availability and hence increase contraceptive use.

**Community-Based Distribution (CBD)**

There are four CBDs operating in Blantyre, and all of them were interviewed for this study. They had all attended a basic course and felt the training prepared them well for their tasks. All four provide oral contraceptives and condoms, and two also provide spermicides and injectables.

However, there were difficulties with the services CBDs provide. All the CBDs instruct a new pill user, for example, on how to use the method, and two CBDs also explain side effects and encourage a clinic follow-up appointment. Only one uses a checklist to establish the woman's candidacy for the pill, and none ask about reproductive goals or breastfeeding status, take blood pressure, or establish a time the CBD will return. Even fewer of these activities are provided to resupply clients.

The CBDs offered several suggestions for improving their services. First, improved administrative support would include increased supervision, increased supplies of blood pressure machines and IEC materials, and occasional accompaniment by the responsible officer on their rounds. Second, every clinic should accept CBD referrals, as some currently do not do so. Third, an identifying badge or uniform would increase the CBD's visibility and standing in communities. Fourth, increased training in FP methods would certainly improve quality of services, and fifth, peer counselling programs would involve the community more in FP service delivery.
In general, CBD programs have been quite successful in other Sub-Saharan African settings. Since this mode of delivery has not been fully developed in Blantyre, and since the four working CBDs are eager for improvements, this type of program represents another substantial opportunity for expanding services. The National Family Planning Strategy contains decisive language about community worker involvement, and dedicates a significant portion of its plan to developing a network of CBDs throughout the country.

In establishing a CBD program, however, it must be closely monitored for its effect on method mix. That is, the CBDs do not currently have strong referral powers. If a CBD sees a new FP client who wants no more children, the CBD might put her on the pill, even if the woman is a strong candidate for sterilization. In this way, the lack of referral powers might increase use of short-term methods where long-term methods would be more appropriate. The National Family Planning Strategy states that "The current situation where the pill and condoms are more popular than other methods is to the advantage of the CBD programme currently gaining ground in the country. However, the programme needs to put in place an effective referral system for a more balanced contraceptive mix."
Overall status of SDPs

Physical infrastructure

The basic physical infrastructure at the vast majority of SDPs in Blantyre is highly commendable. Figure 6 shows that well over 90% have piped running water, electricity, a waiting room, and client toilets, and 89% have a private counseling room. Examination rooms are found in 93% of the SDPs (the two SDPs without them are in the private sector). Moreover, these examination rooms are in fairly good condition: about 90% have adequate light, water, and auditory/visual privacy. All the NGO SDPs have sufficiently clean examination rooms, but 1 public SDP and 2 private SDPs were observed to have unclean facilities.

In addition, contraceptive storage arrangements are generally acceptable, but in need of some improvement: 7% of SDPs were not observed to have storage areas that are clean, protected from heat and the elements, and free of rodents. Furthermore, a sizeable number of SDPs (30%) do not store their contraceptives by expiration date, which can lead to wastage and inappropriate dispensing. Overall, although there is some room for improvement in examination rooms and commodity storage, the basic facilities in Blantyre are generally in very good condition.
In addition, more advanced facilities such as sluice rooms and laboratories were found in relatively few clinics. Sluice rooms (storage areas for soiled laundry and other materials) are crucial to preventing cross-infections in clients and are a necessity for quality health care. Half of public sector SDPs have sluice rooms, as do 4 out of the 5 NGOs, but only 2 out of 8 private SDPs have this facility.

Laboratories are also fairly scarce. Of all three sectors, the shortage is tightest in the public and NGO sectors, and less so in the private sector, where 50% of SDPs have laboratories. Since laboratories are costly to maintain, however, some SDPs probably have access to centralized laboratories. In general, although laboratory tests are not
strictly required for prescribing pills, injectables, and condoms, general reproductive health care does require laboratory work in the form of testing for STDs, conducting pap smears, etc. If one goal of the system is to integrate family planning with other reproductive health services, then access to laboratory services, via whatever mechanisms, will be paramount.

As discussed below in "Method mix", a very small number of SDPs provide surgical methods in Blantyre, which is consistent with the lack of laboratories and sluice rooms. This reveals an area of potential expansion for Blantyre SDPs; increased laboratory services and sluice rooms would facilitate the provision of long term methods, which would in turn decrease the city's future service delivery burden. The National Family Planning Strategy does not address the laboratory/sluice room issue directly, but directs agencies "to include in all clinic construction and renovation plans appropriate facilities designated for family planning services."

**Method mix**

The 1992 DHS shows that the method mix for urban WRA in Malawi is comprised of about 33% pills, 17% condoms, 13% injectables, 8% other modern methods and a surprisingly high 29% female sterilization (no vasectomy is recorded at all). The DHS further shows that fully 45% of the unmet need for FP among urban women in Malawi is for limiting births, so the demand for sterilizations will probably rise quickly if the CPR rises.

Figure 7 shows the availability of selected methods in all three sectors. The combined oral contraceptive is available in all 27 visited SDPs. The public sector is particularly well equipped in resupply methods, as all its SDPs offer COC and POP, condoms and injectables. Fewer NGO SDPs offer this range of methods, and even fewer private
Methods provided by SDPs

SDPs do so. To the extent that resupply methods should be encouraged in Blantyre, the NGO and private sectors show room to broaden their method mix.

However, the availability of long-term methods is of particular interest to avert an unmanageable client load in the future. IUDs are the most available long-term method, and are largely provided by the public and NGO sectors (see Figure 7). IUD availability in the private sector can be improved. Of the 27 SDPs visited in this study, one offers a particularly wide range of surgical methods: minilaparotomy (general anaesthetic and local anaesthetic), laparotomy, vasectomy, and Norplant®. Another three SDPs offer minilaparotomy/local anaesthetic, and two others offer vasectomy.
These findings reveal a tremendous need for more IUD/sterilization availability in Blantyre. However, the physical infrastructure of the SDPs must be improved before more long-term methods can be introduced: surgical methods require operating rooms, a range of sterile surgical equipment and supplies, and infection prevention guarantees. These capabilities are particularly important in areas of high STD prevalence.

Publicity

The existence of FP services at SDPs in Blantyre is not well advertised. Only 4 of the 27 visited SDPs have a sign inside or outside the facility. All four of these signs announce services in Chichewa, which is appropriate since many women cannot read English easily. However, about 30% of the women in this study could not read Chichewa easily either, so these announcements may not be reaching their targets. Displaying instead a standard FP logo that uses no written words may solve this problem.

IEC activities and materials

IEC materials are very effective in client motivation and education, but they are generally scarce in Blantyre. The most common items are posters (in 48% of SDPs), flip charts (in 52%) and contraceptive samples (in 59%). The public SDPs are generally the most well-supplied with these, as 10 of 14 public SDPs have all three types of materials, but they are less common in the private and NGO sectors. Moreover, other materials are quite scarce: brochures (present in 2 SDPs total), information sheets (4 SDPs), promotional materials (3 SDPs), audio-visual equipment (3 SDPs), and anatomical models (2 SDPs).
Clinics were also asked about conducting 'group talks' on FP with women waiting for services, and only 32% of the SDPs answered affirmatively. These talks present a major opportunity to educate clients and with properly trained staff they can be relatively easily implemented.

Thus, there is distinct room for improvement in IEC activities and materials in Blantyre. Dissemination participants noted that the NFWCM has an on-going IEC project, and suggested that communities become involved in the production of these materials to ensure they will be relevant to local people. On the national level, the Family Planning Strategy includes a remarkably comprehensive plan to improve IEC production and use in general.

Recordkeeping and supervision

All of the public and NGO SDPs keep client record cards, and only half of the private SDPs do so. All the observed record cards are stored systematically. Daily registers of FP activity are kept at about half the public and NGO SDPs. The information in these registers is generally complete in the public sector, but is less so in the NGO sector. Such registers are not kept at all in the private sector.

The daily FP registers are mainly used to generate monthly reports of FP activates. All 14 public sector SDPs and 4 of 5 NGO/other SDPs compile these reports, but only 1 of 8 private SDPs does so. These reports are mainly sent to the MCH-FP coordinator at the District Health Office, but some are sent to NFWCM, the regional health information system, or the community health services unit. Despite the time and effort spent on preparing these reports, none of them had received any feedback from their last two submissions.
These results reveal that the recordkeeping systems must be strengthened at each SDP, particularly in the private sector, that the reporting system would benefit if all SDPs reported to one centralized point, and that periodic feedback on reports should be implemented. Again, the National Family Planning Strategy addresses these points directly in its "Programme management" section.

Supervision activities are extremely infrequent in Blantyre. In the six months prior to the study, only four SDPs were visited by supervisors, three in the public sector and one in the NGO/other sector. Another public SDP reported having had a supervisory visit more than six months prior to the study. 23 SDPs had never been visited or could not remember the last visit.

Of those five visits that did occur, the supervisors' activity did not seem to follow any established protocol. In three instances, supervisors reviewed client records, and in two they observed service delivery and offered praise for good work. In only one instance did the supervisor ask about problems or make any suggestions for improvement.

The National Family Planning Strategy calls for the immediate establishment of supervisory protocols as well as quarterly supervisory visits to all SDPs in all sectors. These recommendations are entirely consistent with this study's findings.

Commodities and logistics

The commodities and logistics systems in Blantyre seem to be in need of improvement. Several SDPs were out of the most common methods at the time of the study: 8% of SDPs were stocked out of injectables, 15% were out of condoms, IUDs, and COC (each), and fully 32% were out of POP. Similar levels of stockouts for the six months
prior to the study were reported, and were particularly notable for POP: fully 41% of SDPs reported a POP stockout at some time in the six month period. Perhaps as a result of these frequent stockouts, very few SDPs in Blantyre were found to have any expired stock on hand.
Staff characteristics

Interviews were conducted with 63 staff who work at SDPs that provide FP services. Of these 63, the vast majority (52) are nurses of various qualifications, 8 are doctors, and the remaining 3 are non-clinical staff involved in the provision of services. Seven of the physicians are from the private sector and one is from the NGO/other sector, so public sector physicians are not represented in this sample. In all, 30 interviews were held in the public sector, 22 in the private sector, and 11 in the NGO/other sector.

Nurse training in family planning services

Figure 8

Nurse training in FP

Percent of nursing staff that has attended courses

n = 52

Figure 8
As Figure 8 shows, nurse training is relatively high in the theory and practice of two popular methods: pills and injectables. Moreover, fully 67% have attended a general family planning service provider course that qualifies them to provide FP services in Malawi. An additional specialized course in IUD insertion is required for a provider to be qualified to insert IUDs; 60% of nurses have completed this course. Another course in IUD/GTIs has been attended by 33% of the nurses. Training in ancillary issues, such as IEC and MCH/FP, is less common.

Although not shown in Figure 8, the three sectors vary in levels of nurse training. Across the board, a higher proportion of the public and NGO sector nurses have attended courses as compared to private sector nurses.

*Physician training in family planning services*

Eight physicians were interviewed about their FP training, and it was found to be rather low. Although almost all of them have had theoretical training in pills and injectables, of the eight, none had had specific training in physicians' skills in FP, and only three had attended the service provider course. Four attended the follow-up IUD course, and two the additional IUD/GTI course. As for long term methods, only two have been trained in minilaparotomy/local anaesthetic, and three in vasectomy. None have attended IEC or MCH/FP training.

*Staff knowledge of FP*

The uneven training among staff is reflected in uneven general knowledge about FP. All staff were asked a series of questions on various methods, and Table 3 gives the percent of all staff answering correctly in all sectors. Although the providers are quite knowledgeable on some points, some areas can be improved.
General FP knowledge among staff

<table>
<thead>
<tr>
<th>Question</th>
<th>Public</th>
<th>Private</th>
<th>NGO/oth</th>
</tr>
</thead>
<tbody>
<tr>
<td>At what time in her cycle should a client start taking a pill?</td>
<td>90%</td>
<td>63%</td>
<td>67%</td>
</tr>
<tr>
<td>How often should a client take the pill?</td>
<td>93%</td>
<td>95%</td>
<td>90%</td>
</tr>
<tr>
<td>If a client forgets to take a pill for one day, what should she do?</td>
<td>83%</td>
<td>86%</td>
<td>63%</td>
</tr>
<tr>
<td>How can a client check if an IUD is in place?</td>
<td>93%</td>
<td>86%</td>
<td>90%</td>
</tr>
<tr>
<td>When should a client return after an initial injection (Depo)?</td>
<td>100%</td>
<td>77%</td>
<td>100%</td>
</tr>
</tbody>
</table>

Table 3

Method preference by staff

Staff were requested to name the methods they would recommend for clients seeking contraception for spacing and limiting. All eight physicians recommended the pill for spacing, and three also mentioned IUDs and injectables. A further two mentioned condoms. Among nurses, the method preference is not as heavily weighted toward the pill: each of three major methods (pill, injectable and IUD) would be recommended for spacing by about two-thirds of the nurses interviewed. About 27% would suggest condoms for spacing. Almost no doctors or nurses recommended Norplant® or NFP.

Method preference by service providers usually influences the information they provide to clients, which in turn affects the method mix. Although the present study does not
investigate the reasons behind these provider attitudes, at a recent conference on quality of care in East and Southern Africa\textsuperscript{12}, provider bias was identified as a major barrier to contraceptive use. The results for Blantyre show that nurses seem to encourage a larger spectrum of methods than doctors do, at least among spacing clients. This suggests that further training is necessary, particularly for doctors.

*Staff training in the National Family Planning Strategy*

The above evidence for nurses and doctors indicates that improved FP training is required in Blantyre. The National Strategy contains a detailed plan to improve training, including provisions to "ensure that every health facility has at least one trained family planning service provider", to ensure that physicians are fully trained in FP, and to provide pre-service and in-service training in FP to nurses, particularly those in underserved areas. These measures seem to fit the need in Blantyre appropriately.

Client/service provider interaction

Of the 98 interactions observed, 89 were in public SDPs, 8 were in NGO/other SDPs, and only one was in a private SDP. Because the private and NGO samples are so small, this section will not disaggregate the data by sector. In 45 of the observations, the clients were new FP acceptors.

Client characteristics

The mean age of the women who participated in this study is 29.1, which matches the mean age of WRA in Malawi found in the 1992 DHS. Almost 90% of the present sample is currently married, as opposed to 69% of WRA in general in Malawi.

The women in this sample are of high parity, with an average of four living children. Only three women interviewed have no children, possibly indicating that women in Blantyre prefer to demonstrate their fertility before initiating contraception. Fully 69% of the women were breastfeeding.

The FP clients are more educated than the general public. Almost 90% of these clients had completed primary school or higher, as compared to about 30% in the general population of WRA (1992 DHS). Nevertheless, fully 28% of the sample could not read a letter in Chichewa easily, and 64% could not read an English letter easily. This has strong implications for the development of IEC materials, which should be produced in Chichewa or designed for illiterate people (see "IEC materials", above).
Factors considered in selecting an SDP

SDP choice in Blantyre is motivated by several factors, most strongly quality of services (27% of respondents) and anonymity (18% of respondents). A further 9% each are motivated by convenience, range of services, and trustworthiness of providers.

That quality of services is a motivating factor is encouraging: as the quality of services rises, so might clinic attendance. Since anonymity is also of such importance, SDPs should implement policies to assure the confidentiality of client records.

Medical history and examination

The type of medical history taken and examinations performed on clients should clearly differ depending on the client's medical status, reproductive intentions, and method of choice. For this reason, it is difficult to establish a standard set of procedures that should be followed in every case, particularly for revisit clients. A woman does not require a pelvic examination, for example, every time she refills her oral contraceptives prescription. However, for the purposes of this study, the procedures listed in Figure 9 are taken to be a basic standard for new acceptors. For revisits, the 'optimum' level for each procedure is debatable, but some information about quality of care is nevertheless discernable from these data.

Figure 9 shows that new FP clients receive fairly complete clinical assessments prior to initiation of a contraceptive method. Staff ask almost all new clients about their medical history and last menstrual period, take their blood pressure and weight, and perform general, pelvic, and breast examinations. Fewer, but more than half, are asked about abnormal bleeding and discharge. Moreover, 82% are asked about their reproductive intentions (spacing/limiting), and 98% are asked about breastfeeding status. Fewer
(57%) are asked about method preference, and fewer still (31%) are asked if they have any concerns with their current method of choice.

Revisit clients do not receive the same level of examination. Apart from asking about LMP and taking weight and blood pressure, less than half had any other history taken or examinations performed that would have been useful in their management. Although such detailed assessments are not always necessary in revisit clients, no protocol was observed to ensure that the proper measures were taken on an individual basis.
In general, adequate information about spacing methods was given to new clients. Figure 10 shows that the vast majority of providers mentioned the pill, condom, IUD, spermicide, and injectable. Figure 11 shows that after these methods were mentioned, a discussion of their use followed in almost every case.

Far fewer providers mentioned or discussed tubal ligation, vasectomy, or Norplant®. One possible explanation for this is that the new users are mainly spacers, so providers appropriately do not
mention limiting methods. However, the DHS shows that over half of Malawi's unmet need in urban areas is for limiting. This means that half of the new clients in this sample (assuming it is representative) actually exhibit a need for limiting methods. In this case, limiting and spacing methods should be discussed with equal frequency. The fact that they are not discussed equally could reflect provider bias or simply the availability of methods.

Again, these results indicate the need for increased provider training on various methods. At the dissemination seminar, participants further suggested that a standard poster be developed for use with new and revisit FP clients. It would contain information on all methods and required examinations, and would establish a standard protocol for providers to follow.

Follow-up

Follow-up information was given to most new clients. Fully 86% were informed of what to do if they have a problem with their method, and 81% were told of the possibility of changing methods. All the new clients were given a date for a resupply/follow-up visit, but in only 72% of the observations did the provider write the date of the revisit on the client's card. Thus, although it would be preferable for all these activities to take place with all clients, the follow-up procedures appear to be largely in place.

Client Satisfaction

The majority of new acceptors and revisits were satisfied with their interactions with service providers. More than 90% felt that they had received the information and services they wanted during this interaction. They also felt that the consultation time
was adequate, the service providers were easy to understand, and adequate privacy was provided.

However, relatively few new acceptors (56%) and revisits (35%) asked any questions during their consultations, probably because they were intimidated by the medical personnel's knowledge, a common reaction in Sub-Saharan Africa. Nonetheless, the majority of those who did ask questions felt that they had received satisfactory answers.

The single element of client dissatisfaction was with the waiting time. About a third of clients waited for more than two hours for a consultation that lasted on average 12.4 minutes. The new clients generally waited a bit longer than the revisits, and those who had to wait more than an hour felt that it was already an unacceptable wait.
Cost sharing

FP services are provided free at public clinics, whereas private and NGO clinics charge at market rates. The National Family Planning Strategy assesses the national health budget as follows:

"The Government's recurrent expenditure on health care for 1993/94 is estimated at K58,460,000 (approximately US$14,500,000). If expenditures of family planning represent 7% of this amount, expenditures on family planning are less than 50 tambala (about one US cent) per capita. Fortunately, international donor assistance related to family planning is substantial and growing. External assistance, however, is transitory in nature and cannot be relied upon for the long-term sustenance of FP activities. The challenge for the programme is to address the financial situation through advocating for increased Government contributions, efficiently utilizing donor assistance while it is available, seeking mechanisms to increase the cost-effectiveness of service delivery and equally important, by exploring ways of recovering costs."

The exit interview of this study includes a cost module, which assesses client's willingness and ability to pay for services. Because the majority of the interviewed clients attended public clinics, most did not pay for the observed services, but fully 79% state that they would continue using FP even if they were required to pay.

Although the clients are generally willing to pay for services, their ability to do so is moderate at best. A bit over half of the clients (57%) are involved with income-generating activities, but 42% of those women do not control their income. 95% of the clients report that their spouses are involved in income-generating activities, but 33% of those felt that their spouses would not support them financially if it became necessary to pay for FP. Thus, there is some ability of women to pay, but the cost
recovery potential is not overwhelming. One means to expanding this potential is to increase the number of men willing to pay for FP, through male-centered education and motivational activities.

Integration of STD/HIV management with FP service programs

Consultations on STDs are already provided at 65% of the SDPs in this study. This includes 7 of 13 public, 6 of 8 private, and 4 of 5 NGO/other SDPs. Another 77% of the SDPs provide information, education, and communication on HIV/AIDS. However, during the client/provider interactions, HIV was discussed with only 30% of new clients and 2% of revisits. This shows that although most of the SDPs have favorable policies toward integration, very little if any has actually taken place.

The need for integration

The need for STD/HIV services among FP clients is great. STDs including HIV are common in Malawi in general; recent data show that Malawi has 2.97 AIDS cases per 1,000 people, the highest cumulative incidence of AIDS in Africa. The prevalence of HIV among pregnant women in Blantyre was found to have risen from 2% in 1987 to 32% in 1993.

Although most clients in this study are aware of gonorrhoea, syphilis, and HIV as sexually transmitted diseases, very few know the signs and symptoms associated with these conditions. In addition, significant numbers of the clients interviewed had experienced signs or symptoms in the recent past that are suggestive of STD infection. Less than half of these women thought they were suffering from an STD, indicating that a significant unmet demand for STD services exists.
Some planners fear that integrating STD/HIV management with FP services would stigmatize the FP services and lead to low contraceptive use. Indeed, although 80% of the women interviewed would continue to use the same clinic if STD services were introduced, 17% felt the SDPs would be stigmatized. This does not indicate an overwhelming stigma, but it does suggest a slowdown in FP demand if services are integrated. One means of countering this stigma is through public education.

**Staff training in STD/HIV management**

Most of the staff interviewed (71%) report that they already provide appropriate treatment to FP clients who present symptoms of an STD, and 83% indicate that they would be willing to provide FP to HIV/AIDS patients.

However, the staff seems to lack strong technical training on managing STDs. Although they were all exposed to STD management in their basic training, 35% feel that this training was not adequate to enable them to provide this service. Only about a third of staff have attended any inservice or refresher courses on this topic.

**Staff knowledge of signs and symptoms of STDs**

The relatively low staff training is reflected in the general knowledge of STD signs and symptoms. All staff were asked to list all the STDs they know, and were prompted on some common STDs if not mentioned. Although over 95% spontaneously mentioned gonorrhoea and syphilis, less than 40% named chancroid, herpes, chlamydia, trichomoniasis or candidiasis. 77% mentioned HIV, a surprisingly low figure given the HIV prevalence in the area\(^ {13} \).

\(^ {13} \) However, awareness may be significantly higher than recorded here because of the language of the survey question. The interviewers asked providers specifically about STDs, but many providers are trained about HIV separately from other STDs. That is, they may be aware of HIV, but do not immediately classify it as a traditional STD.
In addition, staff were asked to name the signs and symptoms of certain STDs. Although 97% of the staff are aware that syphilis is an STD and two-thirds know that it presents with a genital ulcer, only 15% can characterize that ulcer as painless. Moreover, only 21% listed skin rashes as a manifestation, and only 6% mentioned enlarged inguinal nodes (Figure 12). Although the staff knowledge of HIV/AIDS signs and symptoms was generally better than for syphilis, for other STDs it was poorer. This evidence indicates a critical need for further training of staff in STD management to facilitate effective integration of services.

**Facilities, equipment and supplies for integration**

As noted earlier, very few SDPs have sluice rooms or access to a laboratory, both of which are essential for the provision of STD management. A significant number are also missing sterilization facilities, examination lights, or vaginal specula. Fewer than 40% of the SDPs have microscopes in working condition, and fewer than 20% have basic diagnostic kits for syphilis, HIV, or abnormal cervical cytology. These findings reveal a critical need for improved supplies and equipment for STD services.
Appendices
Appendix 1: Inventory of service delivery points in Blantyre

SDPs providing family planning services (32 total)

MOH (7 SDPs)

Chileka Health Centre
Chilomoni Health Centre
Limbe
Ndirande
Queen Elizabeth Central Hospital
Sanjika State House
Zingwangwa

City Health (4 SDPs)

Bangwe Maternity
Chigumula
Chirimba
South Lunzu

Industry/Other (2 SDPs)

Lonrho Tobacco
Portland Cement

Parastatal (4 SDPs)

Agricultural Development and Marketing Corporation (ADMC) - Limbe
Railway - Limbe
Railway - Mpingwe
University - Polytechnic Clinic

NGO/Mission (4 SDPs)

Adventist Hospital
Banja La Mtsogolo - Mdima Chinsell
Banja La Mtsogolo - Ndirande
Soche SDA Dispensary and 4 CBDs

Private (11 SDPs)
Chilemba, Dr.
Chilomoni
Chiphangwe, Dr.
Chitawira, G., Dr.
Kahumbe, Dr.
Kidy, F. D., Dr.
Kokris, S., Dr.
Mukadam, Dr. (2 sites)
Patel, Dr.
Thejopals, J., Dr.

SDPs not providing family planning services (39 total)

MOH (1 SDP)

South Lunzu Dispensary

Industry/Other (13 SDPs)

Blantyre Print and Packaging
Blantyre Sawmill Dispensary
Consolidated Textile Dispensary
David Whitehead*
Escom Dispensary
Kanjezda Police
Lever Brothers Dispensary
Makata UTM Dispensary
Mandala Ltd.
Nicholas Lab. Dispensary
NOIL
P.E.W. Ltd. Dispensary
Press Bakeries Dispensary

Parastatal (3 SDPs)

Depot ADMARC Dispensary
Mzedi Sedi ADMARC Dispensary
Shed ADMARC Dispensary

Mission/PVO (2 SDPs)

Montfort Press Dispensary
PVHO Dispensary
Private (20 SDPs)

Chikweza, Dr.
Gatrad, Dr.
Ghumra, Dr.
Girach, B.A., Dr.
Hiwa, E.J., Mr.
Jagot, A.O, Dr.
Japal, Dr.
Kadzola, B.A., Mr.
Kamalizeni, S., Mr.
Kapata, H.D., Mr.
Kumitsonyo, Dr.
Kwada, P.B., Mr.
Makoka, J.H., Mr.
Mutale, Dr.
Mwaiwathu, Dr.
Mwale, Dr.
Phiri, W.D., Mr.
Talwar, A.S., Dr.
Thomas, Dr.
Wirma, Prof.

* Offers condoms only.

Pharmacies (10 total)

CAPS
Kentum Pharmacy
Malawi Pharmacy - Limbe (Limbe MPL)
Malawi Pharmacy - Haile Selassie
Malawi Pharmacy - Victoria Ave (MPC)
Mudi Pharmacy
Pharma C
Pharma Vert
Pharmanova
Warehouse
Appendix 2: Report of the Blantyre dissemination workshop

Note: The table references in this appendix do not correspond to tables in the preceding report.

**Group I: The status of service delivery points and management systems**

Table 1: The observation was made that there are less Service Delivery Points (SDPs) within the townships as compared to those situated within the Blantyre city centre. As such, in order to service as many clients as possible, it is therefore recommended that:-

a. The City Council Authorities encourage the opening of more clinics in the peripheral township areas.

b. That CBDs be introduced into the areas where there are insufficient clinics to manage the population at hand

c. That more Family Planning Outreach Clinics are introduced in the townships.

Table 2: An observation was made that there is only one industrial clinic as compared to the relatively larger number of industries operating within Blantyre. In addition, it was also observed that the issue of contraception seems to form an important component of the income generation activities of various SDPs. Private doctors are also seen as an important source of Family Planning services and information. As such, in accordance with the above, the following recommendations are made:-

a. That more doctors are encouraged to offer family planning services. Hand in hand with this is the need to retrain private doctors on the new policy guidelines developed by the Division of Health.

b. That more industries (especially the larger ones) are mobilised to open SDPs to cater for their staff.

c. That mechanisms be put into place to estimate the number of clients per SDP for planning and monitoring purposes.

Table 4: The observation was made that there seems to be good existing infrastructure in SDPs.
Table 5. The observation was made that there are inadequate IEC materials in circulation within Blantyre. In cases where these materials are available, they exist in English, a language where the majority of clients are illiterate. As such the following recommendations were made:-

a. That more IEC materials be produced in the appropriate language.

b. Where these materials exist, a fair mode of disbursement to all SDPs should be developed to ensure that at any one time, in any one SDP, IEC materials are available.

Table 6: The observation was made privacy is a very important element of service delivery in contraception and that this is one area where anything less than 100 percent is considered unacceptable. In addition, the cleanliness situation is also considered inadequate. It was this recommended that these areas to be improved in, and which will go hand with the supervisory aspect.

Table 7: The shortage of equipment within SDPs especially sterilization equipment was also of concern. This is considered a priority area of action.

Table 8: The current situation where tubal ligation, vasectomy and Norplant® are not widely used was also viewed with concern. The first two methods are considered important for purposes of stopping childbirth. In addition, data seems to indicate that condom choice and availability seems to be inadequate. As such it is recommended that:-

a. Efforts be made to understand why SDP staff do not seem to consider the methods mentioned above to be important.

b. Education of both SDP staff and clients be undertaken.

c. Production of the condom brand "Chisengo" and distribution be increased.

Table 9: The record keeping systems and storage facilities of the SDPs was also viewed with concern. As such, it is recommended:-

a. That supervision of SDPs be intensified at all levels by relevant personnel and government/municipality officials as well.

b. That the retraining of personnel dealing with contraception storage issues, including the relevant supervisors be undertaken.
Table 10: Poor record keeping and low utilisation of client record cards was also viewed with concern since this has implications on the issues of client follow-up. As such it is recommended:-

a. That supervision be intensified at all levels. This is "oversight" is considered serious since these cards are available and it is simply a matter of SDP staff making sure that all client information is entered in the relevant sections.

b. Where necessary, retraining of personnel should be undertaken.

Table 11: The poor reporting system and lack of feedback from "supervisors" to the SDPs was noted. As such, it is recommended:-

a. That the reporting system be standardised to form a channel from the District FP Co-ordinator to the Regional FP Co-ordinator and finally to the CHSU.

b. That feedback be provided from all levels back to the SDPs.

c. That personnel be retrained on this new suggested reporting procedure.

d. That this reporting procedure be used by both public and private SDPs.

Group II: Status of human resources to service family planning programmes

During the group discussions it was observed that:-

1. It is difficult to relate staff to SDPs. There is need for the researchers to split SDP staff along the public and private sector lines.

2. Most of the survey supervisors were enrolled nurses

3. Private doctors are also involved in family planning service delivery although the quality of their work is not known.

4. Some private hospitals refused the enumerators to interview both their staff and their clients.

5. The number of pharmacy assistants and sales personnel is low especially realising the important role they play in family planning service
6. Most pharmacy personnel are not trained in family planning.

7. It is only 55 percent of staff interviewed who are providing family planning services, 12 percent of which is undefined.

8. The Quality of Care provided to clients on medical history, Blood pressure checking, breast examinations, etc is not up to the required standard.

9. There is a deficiency of method specific knowledge on the part of service delivery staff.

10. The management of breastfeeding and the issue of contraception is considered unsatisfactory.

11. Malawi does not support the use of abortion to regulate fertility.

Recommendations:

1. Staff in all cadres must be trained in family planning.

2. More doctors in the private sector should be trained in family planning procedures, especially minilaporotomy and vasectomy.

3. The number of CBDs is too small and efforts must be made to ensure their proper training since they are the motivators and providers of family planning at the community level. In addition to this, the issue of incentives needs to be addresses so as to avoid drop-outs.

4. At every district hospital where there is a trained doctor and a theatre, minilaporotomy and vasectomy should be undertaken.

5. The IUD insertion and IUD/GTI courses should be run simultaneously. In addition, more staff should be trained in TOT.

6. Training and refresher courses for all service providers is needed to deal with the issue of quality of care, including contraceptive technology update and breastfeeding management courses.
Group III: Client/service provider interaction

Table 3: The percentages 57.8 and 31.1 reveal that clients are not given the method of choice. This could be due to the provider rushing through the various contraceptive choices, through lack of commitment or lack of knowledge of the staff in question to deal with this issue it is thus recommended:

a. That the staff undergo refresher courses which stress the issue of a client's rights to informed choice.

b. That a poster be developed that would be present within the counselling room which would serve as a reminder guide as to the type of questions and the type of information the service delivery person should extract from the client.

c. That the client card be reviewed and any gaps in information be dealt with appropriately. In addition, the question on spousal consent should be removed from the client card.

Table 6: It was duly noted that the issue of STDs is a reproductive health issue. Therefore there is need for more information in this area pertaining to the lack of knowledge of staff on issues on STDs including the tendency of staff to be reluctant to deal with STD issues.

Table 4: There is inadequate information on the issue of side effects of the various contraceptives on the part of staff. As such it is recommended:

a. That staff undergo continuous in-service training and refresher courses.

b. It was also duly noted that since some contraceptive methods are particularly common, it is natural that staff would most likely forget information on side effects since they do not deal with the methods in question on a regular basis. A situation where a guide in the form of a poster is available to staff during counselling would alleviate this situation.

Table 5: It is duly noted that there is inadequate supply of IEC materials, in addition to these materials being inappropriate where available. It was also observed that service providers do not seem to request for these materials. As such, it is recommended:

a. That the on-going exercise on IEC material production by the Malawi National Family Welfare Council incorporate community participation in the design of these materials. This will make sure that the communities in
question would actually identify with the messages on the posters and thus reduce instances where posters are produced which are inappropriate for the target audience.

b. That IEC materials that are bought abroad be adapted for local environments.

Table 7: The low level of knowledge on the IUD method was noted with concern. To deal with this, it is recommended:-

a. That refresher courses be offered to service delivery staff.

**Group IV: STD/AIDS integration and cost sharing issues**

The problems identified include:-

1. That there are problems in handling STD/HIV/AIDS issues.

2. That there is a lack of models on FP/HIV/AIDS integration

3. That 48 percent of the population are youth at risk of STD/HIV/AIDS infection and unwanted pregnancies.

The implications of including an FP/STD integration programme include:-

**A. The issue of staff and the implication of:**

1. The cost of staff training

2. The cost of drugs

3. The issue of human resources

4. The issue of an inadequate infrastructure to deal with the combination of both family planning services and STD/HIV/AIDS control.

**B. The issue of lack of uniformity and lack of reference materials and experts in the field of integration**

**C. The issue of cultural beliefs which can sometimes form barriers to the integration process.**

**Recommendations:**
For FP/STD/AIDS integration to work, the following recommendations are made:-

1. That there is need to establish task force groups to examine the issue and propose interventions.

2. That relevant parties seek funding for operations research to develop models to deal with FP/STD/AIDS integration. To this end, it is suggested that the Population Council be contacted through the USAID office in Lilongwe.

3. That there is need to establish and promote peer group counselling/education on reproductive health. A potential donor for this is USAID.

4. That the private sector SDPs be fully involved in all the recommendations above.

5. That proper deployment of staff (staff interested in the issue of STD/HIV/AIDS) is carried out. It would kill the whole exercise to deploy staff hostile to the issue of FP/STD/HIV/AIDS integration.

6. That these problems be presented as a package to concerned donors for financial support. Suggested donors include USAID, UNICEF, ODA and GTZ to mention a few.
Appendix 3: Maps of Blantyre

Map 1: Basic outline of Blantyre/Limbe, showing main roads, railroad, and neighborhoods
Map 2: SDPs offering FP services in Blantyre/Limbe
Map 3: SDPs not offering FP services in Blantyre/Limbe
Map 4: Pharmacies
Map 5: Central government SDPs offering FP services
Map 6: Municipal SDPs offering FP services
Map 7: Parastatal SDPs offering FP services
Map 8: NGO/mission SDPs offering FP services
Map 9: Industry SDPs offering FP services
Map 1: Basic outline of Blantyre/Limbe, showing main roads, railroad, and neighborhoods

Approx. scale: 1 cm = 1.1 km
Map 2: SDPs offering FP services in Blantyre/Limbe
Map 3: SDPs not offering FP services in Blantyre/Limbe

- Industrial clinic
- Mission clinic
- Private clinic
- Parastatal clinic
Map 4: Pharmacies
Map 5: Central government SDPs offering FP services
Map 6: Municipal SDPs offering FP services
Map 7: Parastatal SDPs offering FP services
Map 8: NGO/mission SDPs offering FP services
Map 9: Industry SDPs offering FP services
Map 10: Private SDPs offering FP services
Appendix 4: Technical note on estimating CPR with FPPMES

In Blantyre, the FPPMES (Family Planning Program Monitoring and Evaluation System) was used to generate two estimates of CPR: 'crude' and 'adjusted'. Both of these estimates are described in detail below.

**Crude CPR**

First, service statistics on distributed commodities were gathered from municipal, government, NGO, and PVO SDPs in Blantyre (unfortunately, statistics were not available from the private sector). Some SDPs were found to be missing data for a particular month or quarter, and these data were filled in with method-specific averages from that site. For example, suppose the Mdima Clinic distributes an average of 250 cycles of pills per month in January through October of 1993. If the data for November and December are missing, then the number of distributed cycles of pills for those months is simply estimated as the average, 250.

In addition, because data are scarce for some SDPs, some reports for the late months of 1992 or the early months of 1994 were used for 1993 data. So the timing of these data is approximate.

After the service statistics were made complete in this way, they were entered into the FPPMES, which calculated a 'crude' CPR of 5.3% in Blantyre during the second half of 1993.

**Adjusted CPR**

Service statistics were not available for all SDPs, and the 'adjusted' CPR accounts for these SDPs with no data. Essentially, those SDPs with no data were estimated as distributing the average number of commodities distributed by those SDPs with data.

For example, there are 7 government SDPs in Blantyre, and service statistics were available for 6 of them. In all, the 6 reporting SDPs distributed about 28,000 condoms in 1993. This means each SDP distributed an average of 4,666 condoms per year. The SDP that did not report is then estimated to have distributed 4,666 condoms in 1993, bringing the total distribution to 32,666 (28,000 + 4,666).

In this way, the contribution of non-reporting SDPs was estimated, and the results were again entered into FPPMES. This 'adjusted' CPR in Blantyre was calculated as 6.2% for the second half of 1993.