Family Planning Market Segmentation in Jordan:

An Analysis of the Family Planning Market in Jordan to Develop an Effective and Evidence-Based Strategic Plan for Attaining Contraceptive Security

By

Suneeta Sharma
Issa Almasarweh

March 2004

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1. Introduction

Context

Jordan has been successful in increasing the prevalence of modern family planning (FP) methods from 27 percent in 1990 to 41 percent in 2002 (JPFHS, 2002). As a result of population growth and continued increase in demand for FP, the number of contraceptive users is expected to increase by 78 percent in the next 13 years—from 370,000 users in 2002 to approximately 650,000 users in 2015 (POLICY Project, 2003).

At any given time, 12 percent (79,000) of the approximately 660,000 married women of reproductive age are pregnant. Of these pregnancies, 15 percent (12,000) are unwanted and 28 percent (22,000) are mistimed. High fertility rates (3.7 births per woman), high unmet needs (11%), and high discontinuation rates (42.4%) demonstrate that Jordan has a long way to go to achieve the replacement-level fertility (JPFHS, 2002).

Currently, the Jordanian government finances 100 percent of its contraceptive commodity requirements through donor support. The U.S. Agency for International Development (USAID) provides funding and procures and ships all of the contraceptives for the Jordanian Contraceptive Logistics System (JCLS). However, a phaseout of USAID funding for contraceptives may occur in the next two to five years. The ability of the government of Jordan to meet the coming challenges is constrained by competing priorities and lack of resources.

The private sector plays an important role in the FP market. According to the 2002 Jordan Population and Family Health Survey (JPFHS), the commercial sector serves about 38 percent of modern method users, nongovernmental organizations (NGOs) have FP clinics that serve about 28 percent, and government hospitals and health centers serve the remaining 34 percent.

Jordan is striving for contraceptive security[1] and must mobilize all potential resources to meet the demands and needs of all men and women. Policymakers require a better understanding of the FP market[2] in order to develop contraceptive security strategies and interventions that would mobilize the public and private sectors to satisfy growing FP needs. Within this context, this paper presents a market segmentation analysis of the FP market to help Jordan develop an effective and evidence-based strategic plan for attaining contraceptive security.

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[1] Contraceptive security exists when every person is able to choose, obtain, and use quality contraceptives whenever s/he needs them.

[2] The **market** for FP services includes contraceptive methods, consumers, and providers. Contraceptive methods extend to both modern methods of FP (such as pills, condoms, IUDs, and sterilization) and traditional methods (such as withdrawal, periodic abstinence, and vaginal douche). **Consumers** are defined as women of reproductive age (15–49), including those using a modern or traditional FP method and those with an unmet need for FP. **Providers** are defined as government, private for-profit (commercial sector), and not-for-profit (NGOs). How these components of the FP market fit together is referred to as the FP market structure (Cakir and Sine, 1997). See Cakir, V. and J. Sine. 1997. "Segmentation in Turkey's Family Planning Market." Washington, DC: Futures Group International, POLICY Project.

Objectives

A market segmentation analysis can help define and promote complementary roles for the public, commercial, and NGO sectors—specifically which segments of the population each sector should cater to. This type of analysis helps answer a number of policy-relevant questions such as those listed below.

- What are the key sources of FP products and services (e.g., public sector, NGOs, commercial sector)? What is the relative market share of each source of FP services?
- What methods does each source offer and at what price?
- Who is the intended market for each provider, both current and planned?
- What is the socioeconomic and demographic distribution of current contraceptive users?
- What is the profile of current public, commercial, and NGO sector clients?
- What profile of the population will be most at risk if contraceptives were no longer available in the public sector?
- What is the untapped potential for commercial products among users of subsidized products?
- Who has access to and can afford commercial FP services and products?
- Does service delivery identify whether FP clients obtain services that coincide with their ability to pay, linking subsidization with the ability of clients to pay?

Answers to these questions will help establish a better match between current/potential users and the appropriate source of contraceptives, taking into account the users' location, need, preferences, and ability to pay. The market segmentation analysis will help identify and define the target groups, potential market, and niches for the public, commercial, and NGO sectors. The information on current and potential markets will help those involved in the strategic planning process to achieve contraceptive security in Jordan.

Method of Analysis

An important element of the analysis is establishing households' ability to pay for FP services. This knowledge can be gleaned from a standard of living index (SLI) that ranks households from poorest to richest. This section presents the methodological framework used to create the SLI and the market data analysis.

This study presents a secondary data analysis of the 2002 Jordan Population and Family Health Survey. The sample size in JPFHS 2002 was 6,000 ever-married women ages 15–49. The wealth index constructed by MACRO was used for the market segmentation analysis. In developing a wealth index, each household asset or amenity is assigned a factor score generated through principal component analysis. In this way, MACRO defined the standard of living in terms of assets, rather than in terms of income or consumption.[3]

[3] This method of constructing a standard of living index has become more popular in recent years. See www.worldbank.org/poverty/health/data/index.htmfor a complete technical discussion of the general approach, as well as examples from other countries in the previous round of USAID-funded Demographic and Health Surveys.

This paper analyzes various socioeconomic and demographic characteristics—such as education, parity, age, rural/urban residence, and place of residence—across the five SLI quintiles. Method use and provider sources are compared across SLI quintiles to determine the extent to which contraceptive use patterns and provider choice behavior differed. FP providers are categorized as:

- Government facilities (government hospitals, health centers, maternal and child health [MCH] centers, Jordan University Hospital, Royal Medical Services, and mobile clinics);
- Commercial providers (private hospitals and clinics);
- Pharmacy (pharmacies, drugstores);
- Jordanian Association for Family Planning and Protection (JAFPP clinics); and
- United Nations Relief Works Agency (UNRWA) clinics inside and outside refugee camps.

A careful analysis of socioeconomic characteristics, method use, and provider sources across SLI quintiles by rural and urban areas helped in the formation of the market segments.

Organization of the Paper

This paper presents a detailed market segmentation analysis of the FP sector in Jordan. Section 2 provides an overview of the provider market. Section 3 analyzes the consumer market in terms of consumer characteristics, needs, method use, and sources of contraceptives. Section 4 studies profiles of the public-, NGO-, and private-sector clients. Section 5 presents a comparative analysis of the 1997 and 2002 markets. Section 6 assesses the current targeting behavior in the public sector. Section 7 segments the current market to establish a better match between current/potential users and the appropriate source of FP methods and services. Section 8 projects the potential demand across SLI quintiles and the potential market for the public, NGO, and commercial sectors; while Section 9 presents policy options for achieving contraceptive security based on market segmentation results.

2. Provider Market

Women use a wide range of service providers in Jordan. Public, commercial, and NGO sectors play an equally important role in the delivery of FP methods and services (see Figures 1 and 2).

Figure 1: Sources of Family Planning Methods among Current Users of Modern Methods in 2002

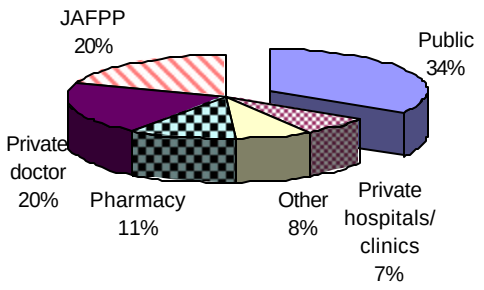
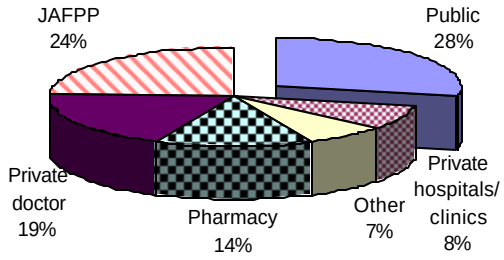


Figure 2: Sources of Family Planning Methods among Current Users of Modern Methods in 1997



Public Sector

The public sector serves 34 percent of the current users of modern methods in Jordan. It supplies all methods and is almost completely subsidized by the government and donors. FP methods and services are delivered by a wide network of Ministry of Health (MOH) facilities, including 347 primary health centers, 20 comprehensive post partum (CPP) clinics, and 28 hospitals. In addition, 81 ambulatory care centers, 5 clinics, and 10 hospitals of the Royal Medical Services (RMS) and one Jordan University Hospital (JUH) provide FP services and methods. RMS serves public security and armed forces staff and their dependents.

NGO Sector

The NGO sector is quite strong and serves about 30 percent of the current users of modern methods in Jordan. The NGO sector supplies all methods except sterilization and is financed partially by donors and partially by fees charged to clients. There are a number of NGOs, including the JAFPP, the Jordanian Hashemite Fund for Human Development, the Soldiers Family Welfare Society, the Arab Women's Organization, and the Noor Al-Hussein Foundation. JAFPP serves 20 percent of current users with 19 clinics and two mobile units. JAFPP provides free contraceptives and charges a nominal price for FP services. For example, JAFPP charges only 4.50 JDs[4] for an IUD insertion.

In addition to several NGOs, there are some donor-owned and operated facilities, the largest being the United Nations Relief Works Agency. It serves about 7.5 percent of the FP users (who are Palestinian refugees), through a network of 23 clinics both inside and outside refugee camps. All services and methods provided by the UNRWA are free.

[4] 1 JD (Jordanian Dinar) = $1.485

Commercial Sector

The commercial sector provides all methods and is completely financed by clients' fees. It serves about 38 percent of the current modern method users through private hospitals (6.5%), private doctors, (19.5%), and pharmacies (11%). The commercial sector provides FP services and methods through a large network of about 56 private hospitals, 200 obstetricians-gynecologists, 700 general practitioners, and 1,500 pharmacies. The private sector facilities and providers are mainly concentrated in Amman. The commercial sector prices vary greatly across the different types of providers. For example, prices charged for an IUD insertion range from 20 to 60 JDs.

Jordan provides a favorable policy environment for private sector growth and expansion. In 2001, duties, tariffs, and sales tax on imported contraceptives were abolished by the government, making the commercial sector an affordable source for many potential FP clients.

3. Consumer Characteristics

This section analyzes the consumer market in terms of socioeconomic and demographic characteristics, method use, place of residence, and provider sources.

Socioeconomic and Demographic Profile

Analysis of the level of education across SLI quintiles indicates that, overall, wealthy women attain a higher level of education than poor women. In Jordan, the level of education increases with the increase in economic status. Table 1 shows that about 14 percent of the women in the lowest quintile never attended school, as compared with less than 2 percent of women in the uppermost quintile. Only 8 percent of the poorest women attained higher secondary education in comparison to 44 percent of the women in the wealthiest quintile. About 32 percent of the poor women live in rural areas, whereas wealthy women are mainly concentrated in urban areas (92%).

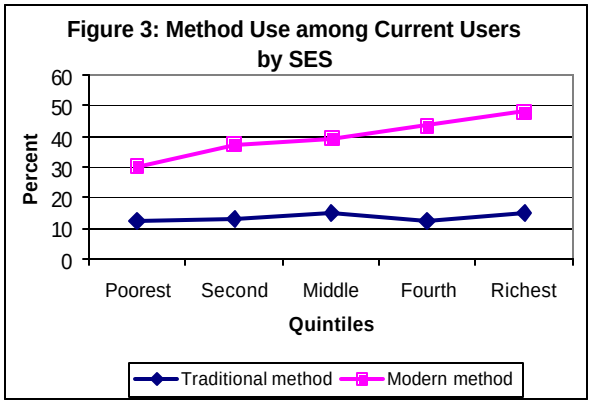
Table 1: Sociodemographic Indicators Across SLI Quintiles

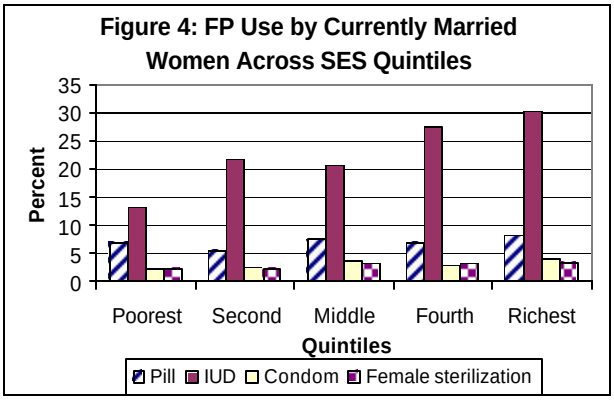
	Quintiles					Total
	Poorest	Second	Middle	Fourth	Richest	
LEVEL OF EDUCATION						
None	13.7	5.8	5.0	3.5	1.6	6.1
Primary	17.6	11.3	11.3	10.8	5.8	11.5
Preparatory	24.6	23.8	21.7	18.8	12.3	20.5
Secondary	36.3	39.1	37.4	36.8	36.2	37.2
Higher	7.9	19.9	24.6	30.1	44.1	24.7
Total	100%	100%	100%	100%	100%	100%
URBAN/RURAL RESIDENCE						
Urban	67.9	77.8	80.6	85.1	92.2	80.3
Rural	32.1	22.2	19.4	14.9	7.8	19.7
Total	100%	100%	100%	100%	100%	100%
PARITY						
0	10.3	10.3	9.0	7.3	7.2	8.9
1	14.8	13.4	11.1	7.4	8.6	11.2
2	13.2	14.8	13.7	12.9	12.2	13.4
3	14.5	17.1	15.4	16.0	15.4	15.7
4	13.8	10.9	16.1	15.8	15.9	14.4
5+	33.5	33.6	34.8	40.6	40.7	36.4
Total	100%	100%	100%	100%	100%	100%
AGE GROUP						
15–19	5.1	1.8	2.4	1.8	1.8	2.6
20–24	19.0	15.2	11.7	7.1	5.6	12.0
25–29	21.6	23.6	21.0	16.8	12.7	19.4
30–34	21.5	24.0	25.2	22.4	17.2	22.2
35–39	15.0	18.3	17.4	19.6	19.4	17.9
40–44	10.1	9.4	14.0	18.5	22.9	14.6
45–49	7.7	7.8	8.3	13.8	20.4	11.2
Total	100%	100%	100%	100%	100%	100%
PLACE OF RESIDENCE						
Central	55.8	61.8	62.8	69.1	78.5	65.1
North	29.5	28.1	28.8	23.1	16.2	25.5
South	14.7	10.1	8.4	7.8	5.3	9.4
Total	100%	100%	100%	100%	100%	100%

In Jordan, a large proportion of women (33–40%) have five or more children regardless of their economic status. Interestingly, rich women tend to have more children.

Family Planning Use

The percentage of women using modern contraceptives increases as economic status increases. About 41 percent of the currently married women in Jordan use modern contraceptives, varying from 30 percent in the bottom quintile to 48 percent in the top quintile (see Figure 3). About 15 percent of the married women of reproductive age rely on traditional methods, and folk methods (0.1%) are rare. The use of traditional methods is more or less the same across quintiles. About 44 percent of the women use no method at all, varying from 57 percent of the poorest quintile to 37 percent of the wealthiest quintile. This indicates that a considerably higher proportion of poor women as compared to rich women do not use any FP method.



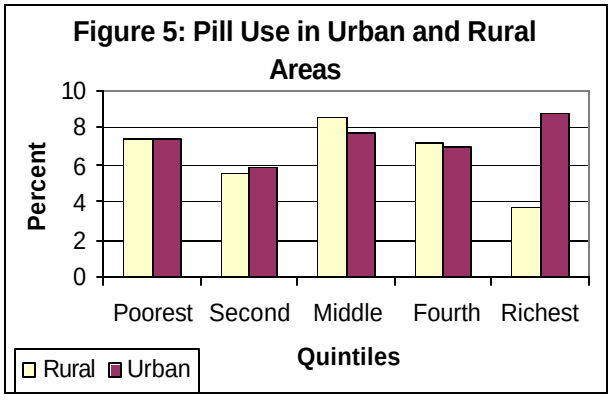


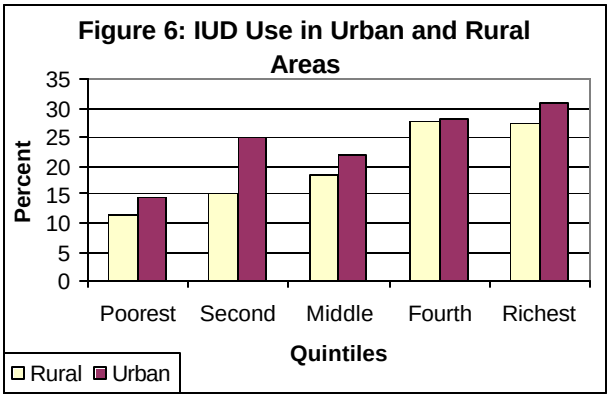
The most commonly used modern methods are IUD (24%; more than 60% of modern methods); the pill (7.5%); male condom (3.4%); female sterilization (2.9%); lactational amenorrhea, or LAM (2.6%); and other modern methods (1.2%). The use of the pill ranges from 6 to 8 percent across quintiles. The use of IUDs increases significantly as wealth increases. The wealthiest women (30%) are two times more likely than the poorest women (13%) to use IUDs (see Figure 4). The difference in modern method use is mainly due to a much higher use of IUDs among the richer women. The use of condoms ranges from 2.5 percent in the bottom quintile to 4 percent in the top quintile. The use of LAM drops significantly with the increase in wealth. Only 1 percent of the women in the top two quintiles use LAM as compared with 4 percent of the women in the bottom two quintiles (see Table 2).

Table 2: Method Use Among Currently Married Women Across Quintiles

	Poorest	Second	Middle	Fourth	Richest
Not using	57.0	49.6	45.4	43.9	36.7
Pill	7.1	5.6	7.8	6.9	8.3
IUD	13.2	21.9	20.7	27.7	30.2
Condom	2.5	2.7	4.0	3.1	4.0
Female sterilization	2.2	2.2	3.2	3.3	3.6
Lactational amenorrhea (LAM)	3.6	4.0	1.9	1.2	1.4
Other methods	1.5	0.9	1.7	1.1	0.5
Traditional	13.0	13.1	15.3	12.8	
Total	100%	100%	100%	100%	100%

In recent years the percentage of couples using FP for spacing has increased (54%), while the percentage using FP for limiting has decreased (46%). Wealthy women are more likely to opt for sterilization (3.6%) than the women in the bottom quintiles (2%). The use of Norplant, foam, and jelly are negligible in Jordan.



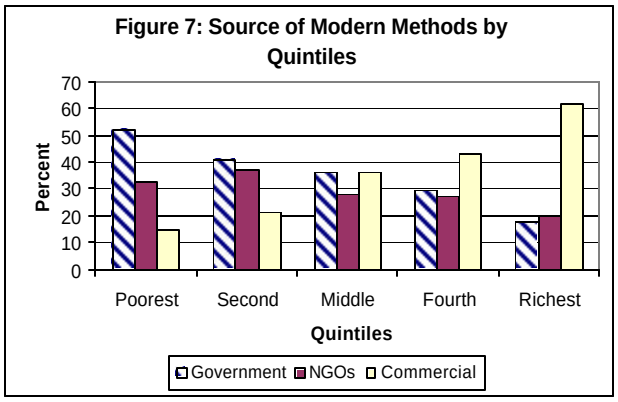


A comparative analysis of rural/urban areas and different regions presents significant disparity in the use of methods and sources. About 65 percent of the poorest women in rural areas use no modern method at all, compared with 57 percent of their urban counterparts. The disparity in IUD use is more prominent among the lowest two quintiles (see Figures 5 and 6). About 9 percent of the currently married women, who belong to the richest quintile, use pills in urban areas as compared with only 4 percent in rural areas.

Source of Contraceptives

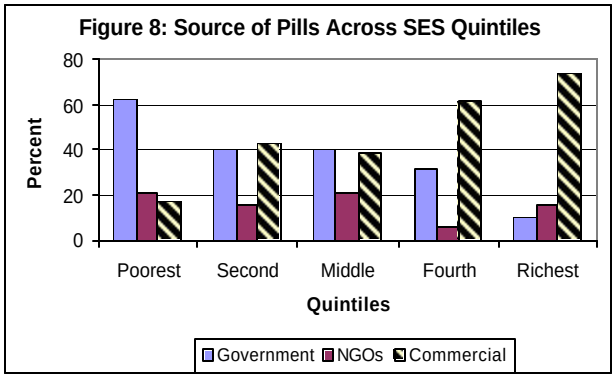
Nearly two-thirds of the FP users rely on the private sector, including the commercial sector (38%) and NGOs (28.5%). About 34 percent of FP users obtain contraceptives from the government sector, varying from 52 percent in the bottom quintile to 18 percent in the top quintile (see Figure 7).

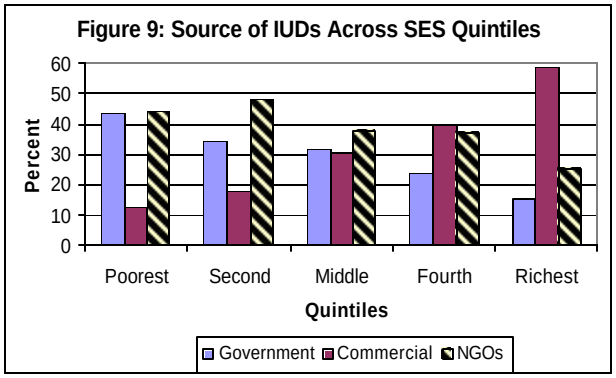
A significant proportion (28.5%) of women in all of the categories relies on NGOs, varying from 33 percent in the bottom quintile to 20 percent in the top quintile. The use of the commercial sector varies considerably across the wealth categories and demonstrates economically rational behavior by the clients. Use of the commercial sector increases fourfold from the poorest to the wealthiest quintile. About 15 percent of women from the bottom quintile and 62 percent of women from the top quintile obtain contraceptives from the commercial sector.



Pill users obtain pills from the government (37%), private sector (47%), and NGOs (16%). While 37 percent of the pill users obtain pills from the government sector, it varies from 62 percent in

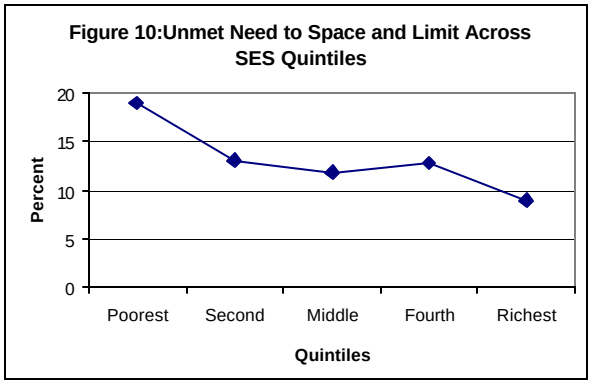
the bottom quintile to 10 percent in the top quintile (see Figure 8). Use of the commercial sector increased more than four times, as about 17 percent of the pill users from the bottom quintile and 74 percent from the top quintile obtain pills from the commercial sector. IUD users rely more on the NGO sector (38%) than the commercial (34%) and government sectors (28%) for IUD insertion. This is due to the relative availability of female physicians in the private sector. About 44 percent of the IUD users from the bottom quintile and 26 percent from the top quintile obtain IUDs from NGOs (see Figure 9). Use of the commercial sector for IUDs varies between 12 percent from the bottom quintile and 59 percent from the top quintile. Use of the government sector for IUDs declines threefold from the bottom to the top quintile. Sterilization services are mainly provided by the government sector, varying from 96 percent in the bottom quintile to 47 percent in the top quintile.





Unmet Need

In Jordan, the unmet need among women of reproductive age is about 13 percent. Poor women have a much higher unmet need in comparison to rich women. About 19 percent of women in the bottom quintile have unmet needs as compared to 9 percent in the top quintile (see Figure 10). About 11 percent of women in the poorest quintile have an unmet need to space births and 8 percent have an unmet need to limit.



Among the 11.7 percent of married women of reproductive age (MWRA) who are currently pregnant, 43.1 percent of their pregnancies are unintended—they are either mistimed (27.8%) or unwanted (15.3%). Similarly, one-third of births in the last five years were either unwanted (15.9%) or mistimed (17.2%).

About 18 percent of the poorest women wanted to have their last child later (mistimed) and 20 percent did not want the child at all (unwanted). Among 14 percent of the wealthiest women, the last birth was mistimed and one-fourth of the women reported it as unwanted. Except for the

higher unmet need for limiting among the wealthiest women, the consequences of unmet needs for spacing and limiting do not vary significantly across the socioeconomic categories.

Cost Paying Mechanisms

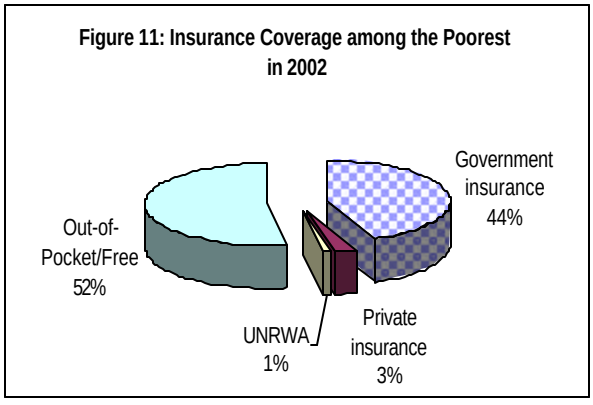
Question 428A in the survey provides information on who paid for most of the costs of the last and next-to-the-last births by insurance type. This information was used to analyze the source of payments for different socioeconomic groups.

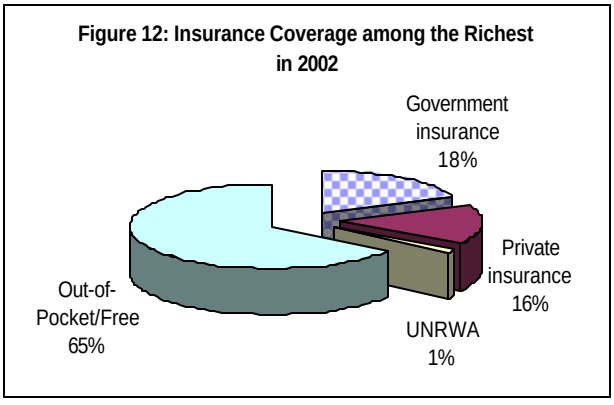
Women reported the use of government insurance, private insurance, and out-of-pocket expenditures to pay for reproductive health care services. About 35 percent of women have government health insurance. More than 55 percent of the women made out-of-pocket payments for MCH services (see Table 3).

Table 3: Payment Mechanisms for MCH Services in 2002

	Government	JAFPP	UNRWA	Private Providers	Pharmacies	Other	Total
Government insurance	46.2	44.6	20.0	13.5	21.3	48.7	34.7
Private insurance	4.5	10.4	2.2	12.6	10.1	4.5	7.7
UNRWA	1.3	0.0	3.7	1.5	0.0	1.3	1.2
Respondent/ family	47.5	45.0	74.1	70.9	67.5	44.8	55.8
Other	0.5	0.0	0	1.5	1.2	0.6	0.7
Total	100%	100%	100%	100%	100%	100%	100%

Poor women are more likely to have insurance coverage. Forty-four percent of women in the poorest quintiles have government insurance, compared with 18 percent in the top quintile. Cost payer mechanisms for the poorest include government insurance (44%), private insurance (3%), UNRWA (1%), and out-of-pocket (52%). Cost paying mechanisms for the richest women are government insurance (18%), private insurance (16%), UNRWA (1%), and out-of-pocket (65%) (see Figures 11 and 12).





4. Comparative Analysis: 1997[5] and 2002

Although all of the sectors have experienced large growth, the source mix has changed considerably from 1990 to 2002 (see Table 4). The government sector gained market shares at the expense of the commercial sector, probably due to improvements in the availability of FP methods and in the quality of services. The overall number of users increased due to an increase in contraceptive prevalence and in the number of MWRA. The public sector market share increased from 24 percent in 1990 to 34 percent in 2002. Due to the increase in contraceptive prevalence, the number of MWRA, and market share, the number of public sector users increased threefold: from 30,000 to 92,000. The NGO sector market share remained about the same during the period, but its users doubled during the reference period. Although the commercial sector market share declined from 45 percent in 1990 to 37 percent in 2002, its users increased substantially. Overall, the absolute number of commercial users doubled during the period (see Table 4).

Table 4: Use of Service Delivery Points for Family Planning Services, 1990, 1997, and 2002

Outlets	1990			1997			2002		
	% of FP users who use a given source	% of all married women who use a given source	Number of FP users who use a given source	% of FP users who use a given source	% of all married women who use a given source	Number of FP users who use a given source	% of FP users who use a given source	% of all married women who use a given source	Number of FP users who use a given source
Government	24.3	6.5	30,000	28.1	10.6	62,000	33.9	14.0	92,300
NGOs	30.1	8.1	38,000	29.5	11.1	66,000	28.5	11.7	77,140
Commercial sector	45.1	12.1	57,000	42.3	15.9	95,000	37.4	15.4	101,530
Total	99.5	26.7	125,000	99.9	37.7	223,000	99.8	41.1	270,970

Notes: Calculations based on the following formulae:
Percent of all married women = (percent of FP users)*(modern method FP prevalence)
Number of FP users = (percent of all married women)* (number of married women)

Table 5 analyzes the change in source mix for major methods from 1990 to 2002. The public sector market share for pills increased fourfold at the expense of the commercial sector: from 8.5 percent in 1990 to 37 percent in 2002. The commercial sector pill market share declined from 80 percent to 47 percent in the last 12 years. The government sector has more than doubled its share of the IUD market. In regard to the IUD market, the public sector increase was at the expense of the NGO sector and to a lesser extent the commercial sector. In the case of female sterilization, the commercial sector picked up the market share from 1990 to 1997 but lost market share from 1997 to 2002. Overall, the commercial sector's market share increased from 26.5 percent in 1990

[5] Almasarweh, I. and W. Winfrey. 1999. "Segmentation of Family Planning Services by Sector in Jordan." Washington DC: National Population Commission and POLICY Project.

to 32 percent in 2002. In spite of the increase in the government sector's market share in female sterilization from 1997 to 2002, its share declined from 73.5 percent in 1990 to 68 percent in 2002 (see Table 5). The government sector's share in female sterilization is expected to increase again now that tubal ligation services have become free to all clients.

Table 5: Sources for Family Planning 1990, 1997, and 2002 Disaggregated by Major Method*

Outlets	Pills			IUDs			Female Sterilization		
	1990	1997	2002	1990	1997	2002	1990	1997	2002
Government	8.5	20.7	36.5	11.5	23.9	28.0	73.5	59.1	68.0
NGOs	9.4	10.9	16.3	48.9	41.7	37.7	0.0	0.0	0.0
Commercial sector	80.0	68.4	47.0	37.6	34.4	34.3	26.5	40.9	32.0
Don't know	2.1%	-	-	2.0%	-	-	-	-	-
# of cases	285	358	426	942	1,265	1,349	356	235	173

* Percentages/cases in this table will not match those in the final report of the JPFHS 2002 because of slightly different definitions and observations that are not included in this data set because of missing variables.

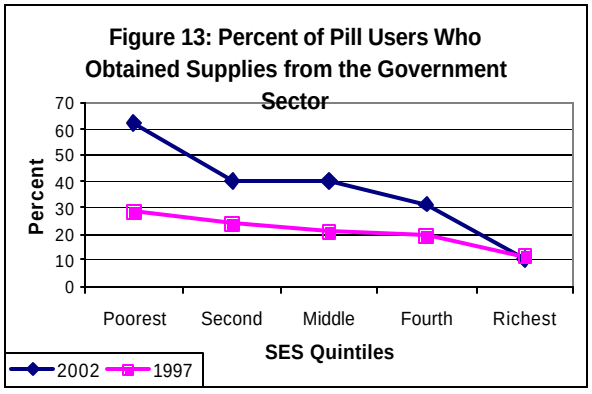
The source mix has changed significantly among the poorest women. In 2002, about 52 percent of women in the bottom quintile obtained FP methods from the government sector as compared to about 38 percent in 1997. This led to a significant reduction in the dependence on the commercial sector among the poor quintile. There is a very slight change in the source mix among the wealthiest quintile. Table 6 clearly indicates that the government sector's market share increased across all of the quintiles from 1997 to 2002. The shift toward the public sector was not equal among all of the quintiles. Specifically, poor women substantially increased their reliance on the government sector. It is encouraging that the government sector resources were better targeted and directed to the poor in 2002 (see Table 6).

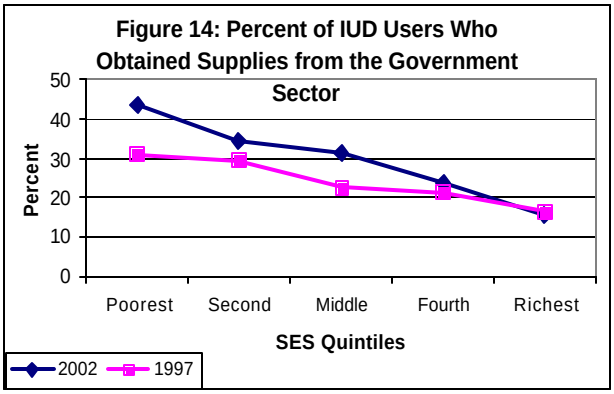
Table 6: Source of Family Planning Methods across SES Quintiles

	Poorest		Second		Middle		Fourth		Richest	
Outlets	2002	1997	2002	1997	2002	1997	2002	1997	2002	1997
Government	52.2	38.2	41.2	31.7	35.9	29.1	29.5	24.0	17.9	17.3
NGOs	32.7	30.6	37.4	29.2	27.9	32.5	27.2	34.5	20.2	19.6
Commercial	15.1	31.2	21.4	39.1	36.3	38.4	43.4	41.5	61.9	63.1
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%

The change in source mix for specific FP methods is quite significant across socioeconomic status (SES) quintiles. About 62 percent of the women in the poorest quintiles obtained pills from the government sector in 2002, compared with only 28 percent in 1997. It is encouraging that a larger proportion of the poorest women who use pills are being served by the government sector. Similarly, an increasing proportion of IUD users are being served by the public sector, and the shift from the commercial sector to the public sector is prominent among the bottom

quintiles (see Figures 13 and 14). In the case of sterilization services, women from the top quintiles are relying more on the government sector. As very few women opt for sterilization in Jordan, this shift is only slightly affecting the use of public sector services.





5. Client Profiles

This section presents socioeconomic and demographic profiles of the government, JAFPP, UNRWA, private providers, and pharmacy clients (see Table 7).

Public Sector

About 53 percent of government sector clients belong to the middle (22%), upper middle (19%), and richest (12%) quintiles. About 47 percent are from the bottom quintiles. This shows that highly subsidized government services and commodities are also being used by clients (31%) who can afford to pay commercial sector prices. About one-fourth of the government sector clients are from rural areas. About 54 percent of the clients live in central Jordan, 34 percent live in the north, and 12 percent live in the southern part of Jordan. About 18 percent of the public sector clients have less than a primary level of education. Approximately 32 percent of the public sector clients are in the 15–29 age group. More than 50 percent of clients already have four or more children. The public sector clients mainly use IUDs (50%), pills (21%), female sterilization (16%), and condoms (10%).

JAFPP

About 62 percent of JAFPP clients belong to the middle (21%), upper middle (24%), and richest (17%) quintiles. About 38 percent are from the bottom quintiles, indicating that the subsidized services provided by JAFPP are affordable to women in the bottom quintiles. About 20 percent of the JAFPP clients are from rural areas. Nearly 95 percent of the clients live in the central or southern part of Jordan. Thirteen percent of the clients have less than a primary level of education. More than 72 percent of JAFPP clients are ages 30–44. Similar to the government sector, 51 percent of its clients already have more than four children. More than 90 percent of the clients come for IUD insertion. IUDs are the most popular FP method at JAFPP—due to the provision of all of their FP services by female providers—followed by pills (3.5%) and condoms (3%).

UNRWA

UNRWA serves Palestinian refugees through a large network of clinics. More than 57 percent of its clients belong to the two bottom quintiles. About 43 percent of UNRWA clients belong to the middle (21%), upper middle (11%), and richest (11%) quintiles. These percentages show that highly subsidized donor-funded services and commodities are also being used by the women in the top two quintiles. Almost all of the UNRWA clients are from urban areas. A majority (79%) of the clients live in the central part of Jordan, followed by about 21 percent in the north, and none from the south. More than 70 percent of the clients have a secondary or higher level of education. About 72 percent of the clients are ages 25–39. Nearly 33 percent of the women already have four or more children. A sizable proportion of clients (42%) have two or less children. UNRWA clients mainly use IUDs (49%), pills (33%), and condoms (12%). The proportion of pill users is quite significant compared with other providers of subsidized care.

Table 7: Percent of Clients Who Use Government, NGO, and Commercial Sector Services by Sociodemographic Characteristics

Characteristic	Government	JAFPP	UNRWA	Private Providers	Pharmacies	Total
SOCIOECONOMIC STATUS						
Poorest	22.5	14.8	22.3	5.2	7.6	14.7
Second	24.8	23.0	34.9	10.6	14.0	20.4
Middle	22.1	20.8	20.5	18.8	24.0	20.9
Fourth	18.9	23.9	10.8	25.9	24.0	21.8
Richest	11.7	17.5	11.4	39.6	30.4	22.2
Total	100%	100%	100%	100%	100%	100%
URBAN/RURAL RESIDENCE						
Urban	74.4	80.3	98.2	91.0	90.4	83.7
Rural	25.6	19.7	1.8	9.0	9.6	16.3
Total	100%	100%	100%	100%	100%	100%
PLACE OF RESIDENCE						
Central	54.2	68.6	78.9	79.5	78.8	68.6
North	34.4	26.1	21.1	13.7	14.4	23.8
South	11.5	5.3	0.0	6.8	6.8	7.6
Total	100%	100%	100%	100%	100%	100%
LEVEL OF EDUCATION						
None	6.9	3.1	1.8	5.0	1.6	4.6
Primary	11.4	10.2	11.4	7.3	6.8	9.7
Preparatory	25.3	21.7	16.9	12.5	16.7	19.9
Secondary	37.0	38.5	53.6	40.7	47.8	40.5
Higher	19.4	26.5	16.3	34.4	27.1	25.3
Total	100%	100%	100%	100%	100%	100%
AGE GROUP						
15–19	0.7	0.2	3.0	0.0	2.0	0.7
20–24	10.4	6.2	13.8	4.7	6.4	7.8
25–29	20.7	14.6	26.9	16.7	19.6	18.7
30–34	22.7	28.3	25.7	23.7	31.6	25.3
35–39	21.9	24.7	19.2	21.9	16.8	21.8
40–44	14.0	19.0	9.6	22.8	15.2	17.1
45–49	9.7	7.1	1.8	10.3	8.4	8.5
Total	100%	100%	100%	100%	100%	100%
PARITY						
0	2.0	1.1	6.0	2.4	8.0	2.9
1	13.1	13.0	15.6	11.5	10.4	12.4
2	14.7	14.6	19.8	22.6	22.7	18.0
3	17.2	19.9	25.7	20.5	24.3	20.2
4	16.2	14.3	10.2	12.9	13.5	14.1
5+	36.8	37.1	22.8	30.1	21.1	32.4
Total	100%	100%	100%	100%	100%	100%
METHOD USE						
Pill	20.8	3.5	32.5	8.0	61.0	19.3
IUD	50.3	91.4	49.4	79.3	2.0	60.9
Injection	3.2	1.8	3.0	2.4	0.0	2.3
Condom	9.6	3.3	12.0	0.0	33.9	8.8
Female sterilization	15.7	0.0	0.0	9.7	0.0	7.9
Other methods	0.4	0.0	3.0	0.5	3.2	0.9
Total	100%	100%	100%	100%	100%	100%

Commercial Sector Providers: Hospitals, Clinics, and Private Doctors

The majority (84%) of clients who obtain services from private providers in the commercial sector belong to the middle (19%), upper middle (26%), and richest (40%) quintiles. About 16 percent are from the bottom quintiles, thus, 16 percent of the clients who cannot afford to pay for FP services and commodities are dependent upon the private sector.

About 91 percent of the commercial clients live in urban areas. A majority of them are from the central region (79%), followed by the north (14%) and south (7%). Three-fourths of the commercial sector clients have a secondary or higher level of education. About 78 percent of the clients are ages 30–44. More then 43 percent of the clients have four or more children. The main contraceptive method among commercial sector clients is the IUD. About 79 percent of the clients use IUDs, followed by female sterilization (10%) and pills (8%). Female sterilization services are only provided by the government and commercial sector hospitals.

Pharmacies

About 78 percent of the pharmacy clients belong to the middle (24%), upper middle (24%), and richest (30%) quintiles. Nearly 22 percent of the clients from the two bottom quintiles also obtain supplies from pharmacies. A wide variety of brands are available at pharmacies, which, unlike physicians, do not charge counseling fees. All of the pharmacies have fixed prices for FP products. About 90 percent of the clients are from urban areas and 10 percent are from rural areas. Seventy-nine percent of the pharmacy clients live in the central region, followed by the north (14%) and south (7%). About 75 percent of clients have a secondary or higher level of education. A majority of clients (83%) fall in the age group of 25–44. Most of the clients obtain pills (61%) and condoms (34%) from the pharmacies.

6. Public Sector Targeting

To achieve contraceptive security, countries must promote and protect equity. Effective targeting contributes to contraceptive security by encouraging better segmentation of the market. In essence, limited public resources are channeled to those who cannot afford to pay for private sector services and new market opportunities are created for the private sector among wealthier clients. In this context, the following section assesses the current targeting behavior in the public sector.

Use of Public Sector Across SES Quintiles

The public sector in Jordan is targeting its FP services and commodities better than many countries in the Asia and Near East region. Still, women in the top two quintiles account for 31 percent of public sector use (see Figure 15). These women can easily afford to buy FP methods and services from the commercial sector. In addition, about 22 percent of the public sector clients who belong to the middle SLI quintile have the ability to buy from NGOs and the commercial sector.

Figure 15: Distribution of Public Sector Use by Quintile

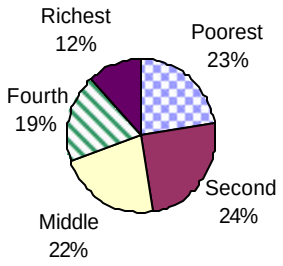
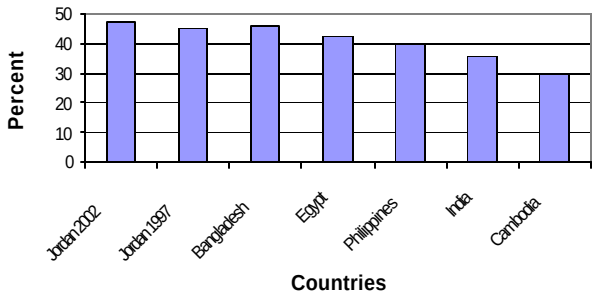


Figure 16: Use of Public Sector by Poor Women



A comparative analysis of the public sector users in Bangladesh, Egypt, the Philippines, Cambodia, and India indicates that Jordan is doing much better in terms of targeting its limited public sector resources. In Cambodia, women in the bottom two quintiles account for less than 30 percent of public sector clients. In India and Philippines, 36 percent and 40 percent of the public sector clients belong to the bottom quintiles. The situation is much better in Egypt, Bangladesh, and Jordan as women from the bottom quintiles account for 42 percent, 46 percent, and 47 percent of public sector clients, respectively (see Figure 16). Still, clients who are not poor consume a large amount of scarce public sector resources in all these countries. Donors and government resources are not sufficient to serve the increasing number of women of reproductive age. Effective targeting ensures that the limited donor and public sector resources are used to provide services and methods to those who cannot afford to pay commercial sector prices. Targeting is particularly important in Jordan, as the government sector is heavily dependent upon donor support for commodities.

Public Sector Targeting Behavior from 1997 to 2002

Not only is Jordan doing better than many other countries, it has significantly improved public sector targeting since 1997. About 52 percent of the poorest women obtained contraceptives from the public sector in 2002 as compared with only 38 percent in 1997. The proportion of the poorest women using NGO services basically remained the same during that period, however, it declined by 50 percent for the commercial sector. An assessment of the women from the lowest quintile indicates that the poorest group accounted for 28 percent of the pill users who obtained FP methods from the public sector in 1997 compared with 62 percent in 2002 (see Figure 13). These statistics indicate that a larger proportion of poor women are being benefited by the highly subsidized public sector services and methods.

7. Market Segments

This paper helps determine the sources of supply that are most appropriate for women based on their economic status and reproductive health needs. The following points[6] were considered in determining the most appropriate source.

- **The cost of services and methods is consistent with a woman's ability to pay**. As discussed in the section on provider markets, (1) the public sector is completely subsidized, (2) NGOs are financed partially by donors and partially by fees charged to clients, and (3) the commercial sector is completely financed by clients' fees. In a well-segmented market, poor women frequent the public sector, women with moderate wealth frequent NGOs, and wealthy women frequent the commercial sector.
- **The method is appropriate to a woman's needs**. Temporary methods are most appropriate when a recently married woman would either like to delay her first birth or increase the length of birth intervals. Permanent methods may be appropriate when a woman prefers to have no more children. In Jordan, temporary methods are supplied by all types of public, commercial, and NGO providers, while sterilization is available only in public and private hospitals. It is important to note that the private hospitals are mainly concentrated in urban areas.

Within this context, the paper divides the Jordanian FP market into five segments to establish a better match between current users and the appropriate source of contraceptives, taking into account their location, needs, preferences, and ability to pay (see Figures 17 and 18). These groups are categorized on the basis of the following distinguishing characteristics: SLI, rural/urban residence, level of education, and use of spacing/limiting methods. Table 8 presents the market segments, their size, characteristics, and method use. The estimates are based on the total number of current users (270,000). Table 8 also indicates an appropriate source of supplies or services for each segment.

Segment 1: Rural poor and limiters, which constitute 8.6 percent of the current FP market. There are 23,478 women in this group. The majority of the women in this group belongs to the poorest and second quintiles and resides in rural areas. This group also includes sterilization users (limiters) from the middle, fourth, and richest quintiles. More than 82 percent of the rural poor women have a secondary education or lower. About 29 percent of them use modern contraceptive methods, including condoms (7%), IUDs (46%), pills (23%), injectables (4.7%), and female sterilization (19.8%). The proposed source of supplies and services for this group is the government sector.

Segment 2: Urban poor, which constitutes 21 percent of the FP market. There are 57,338 women in this group. These women belong to the poorest and the second quintiles and reside in urban areas. This group includes only half of the women from the second quintile. This group also includes sterilization users from the middle quintile. More than 81 percent of the urban poor women have a secondary education or lower. About 34.4 percent of these women use modern

[6] Almasarweh, I. and W. Winfrey. 1999. "Segmentation of Family Planning Services by Sector in Jordan." Washington, DC: National Population Commission and POLICY Project.

contraceptive methods, including condoms (8.6%), IUDs (53.5%), pills (19.5%), injectables (3%), and female sterilization (14.8%). The proposed source of supplies and services for this group is the government sector.

Segment 3: Middle rural-urban quintiles, which constitute 27 percent of the FP market. There are 73,535 women in this group. These women belong to the middle quintile and are from both urban and rural areas. Fifty percent of the second quintile women from urban areas are also part of this group. This group includes all methods, excluding sterilization. More than 26 percent of these women have more than a secondary level of education. About 38 percent of them use modern contraceptive methods, including condoms (10.6%), IUDs (65%), pills (21.3%), and injectables (3.1%). The proposed source of supplies and services for this group is the NGO sector. Apart from this, NGOs can also serve as a substitute for commercial FP services for women in the upper middle quintile, and they can serve as a substitute for government services for the second quintile in both urban and rural areas.

Table 8: Proposed Market Segments

Segment	Market Size	Socioeconomic Characteristics	Current Method Use	Proposed Source of Supplies
Rural poor and limiters	8.6% (23,478 women)	▪ Poorest and second quintiles ▪ Sterilization users from upper three quintiles ▪ 82% secondary education or less ▪ 29% use modern methods	▪ Condom (7%) ▪ IUD (46%) ▪ Pill (23%) ▪ Injectable (4.7%) ▪ Female sterilization (19.8%)	Government
Urban poor	21.1% (57,338 women)	▪ Poorest quintile and half of the second quintile ▪ Sterilization users from poorest, second, and middle quintiles ▪ 81% secondary or less ▪ 34.4% use modern methods	▪ Condom (8.6%) ▪ IUD (53.5%) ▪ Pill (19.5%) ▪ Injectable (3%) ▪ Female sterilization (14.8%)	Government
Middle	27% (73,535 women)	▪ 50% of the second quintile in urban areas; middle quintile in rural areas ▪ 88% urban and 12% rural ▪ 74% secondary or less ▪ 38% use modern methods	▪ Condom (10.6%) ▪ IUD (65%) ▪ Pill (21.3%) ▪ Injectable (3.1%)	NGOs
Wealthy rural	4.4% (11,860 women)	▪ Richest quintile ▪ 67% secondary education or less ▪ 44% use modern methods	▪ Condom (10.7%) ▪ IUD (72.3%) ▪ Pill (15.9%) ▪ Injectable (1.1%)	Private providers and pharmacies
Wealthy urban	38.9% (106,010 women)	▪ Upper-middle and richest quintiles ▪ 63% secondary education or less ▪ 48% use modern methods	▪ Condom (8%) ▪ IUD (66%) ▪ Pill (17.5%) ▪ Injectable (1%) ▪ Female sterilization (7.8%)	Private hospitals, private providers, and pharmacies

Segment 4: Wealthy rural, which constitutes only 20 percent of the FP market. There are 11,860 women in this group. All of these women belong to the upper middle and the richest quintiles and reside in rural areas. This group includes all contraceptive methods, except sterilization. About one-third of the women have a higher than secondary level of education. About 44 percent of them use modern contraceptive methods, including condoms (10.7%), IUDs (72.3%), pills (15.9%), and injectables (1.1%). The proposed source of supplies and services for this group is the commercial sector, including private providers and pharmacies (see Figure 18).

Figure 17: Market Size

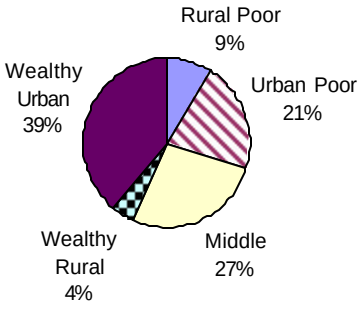
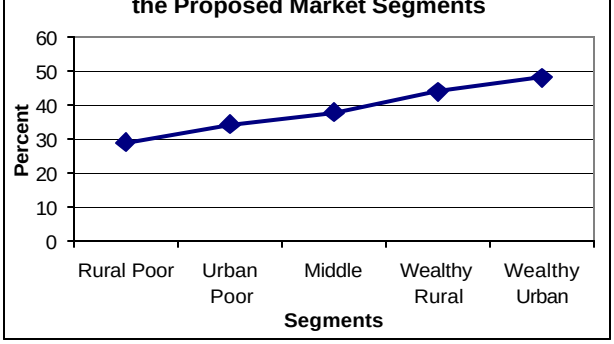


Figure 18: Use of Modern Methods Across the Proposed Market Segments



Segment 5: Wealthy urban, which constitutes 3.9% of the FP market. There are 106,010 women in this group. All of these women belong to the upper middle and the richest quintiles and reside in urban areas. About 37 percent of the women have more than a secondary level of education. About 48 percent of them use modern contraceptive methods, including condoms (8%), IUDs (66%), pills (17.5%), injectables (1%), and female sterilization (7.8%). The proposed source of supplies and services for this group is the commercial sector, including private hospitals, private providers, and pharmacies.

8. Potential Family Planning Market

Contraceptive security exists in a country when all the women and men who need and want contraceptives can obtain them. It is implicit in the definition that contraceptive security includes meeting current and unmet needs. Securing sufficient contraceptives to satisfy current demand does not fully realize the vision of contraceptive security.

Essentially, contraceptive security exists when all needs are met. For those whose needs have been turned into use for services, and are currently satisfied clients, access must be maintained. For those not using services now but who want to or intend to use them soon, they must become satisfied clients. For those who have a need for services (e.g., they say they do not want to become pregnant now but are not doing anything to prevent pregnancy), their need must somehow be satisfied.

In this context, our estimation of potential demand takes into account the current users, intenders and traditional method users, their socioeconomic status, and their location (i.e., urban or rural). Tables 9, 10, and 11 are estimates of the potential market for FP in Jordan for urban, rural, and all women, respectively. The estimates are based on the total number of ever-married women of reproductive age. We assume that the government has an important role in providing services for the poor who cannot afford to pay for unsubsidized commodities and services.

Potential Market for the Public Sector

It is indicated in the section on public sector targeting that 31 percent of the public sector clients belong to the top two quintiles. These clients can easily afford to pay commercial sector prices. Meanwhile, a small proportion of the poorest women obtain contraceptives from the commercial sector. For example, 8 percent of the pharmacy clients and 5 percent of the private provider clients belong to the poorest quintile. Effective market segmentation and targeting strategies dictate that the public sector should focus its highly subsidized resources on those most in need—those who cannot afford to pay commercial sector prices. Also, the government should possibly consider spending more money on promoting the use of modern contraceptive methods.

Women in the bottom quintile are targets for subsidized or free services and contraceptives in the government sector. This segment of the population would be most at risk if contraceptives were no longer available in the public sector. Within this context, this study recommends that the poorest have access to free FP methods in the public sector. Based on the proposed market segments, it is recommended that, in urban areas, the government serve all of the poorest women, half of the women from the second quintile, and the sterilization users in the middle quintile. This recommendation includes 7,893 condom users, 85,500 IUD users, 27,145 pill users, 3,474 injectable users, 8,590 female sterilization users, and 1,164 women who use other modern methods and are in the bottom quintiles in urban areas. This study recommends that the government sector serve the poorest and the second quintiles in rural areas, because the private and NGO sectors are not well developed in those areas. However, JAFPP does provide some outreach services through its mobile clinics. As a result, the government must provide free commodities and services for 2,831 condom users, 44,358 IUD users, 13,308 pill users, 3,704 injectable users, and 4,929 female sterilization users in rural areas.

Only the government and private hospitals provide sterilization services. This study recommends that government facilities provide sterilization services to 5,568 and 3,828 women who belong to the middle and higher quintiles in urban and rural areas, respectively.

Potential Market for the NGO Sector

The NGO sector has an important role to play in helping the country achieve contraceptive security goals. Currently, it serves about 29 percent of FP users.

This study recommends that the NGO sector focus on the lower middle and middle SES quintiles. This includes 13,574 condom users, 97,095 IUD users, 28,612 pill users, and 3,368 injectable users in urban areas. Likewise, the NGO sector may have a provision for 2,459 condom users, 15,325 IUD users, 5,213 pill users, and 789 injectable users in rural areas. Apart from this, NGOs can also serve as a substitute for commercial FP services for women in the upper middle quintile, and they can serve as a substitute for government services for the second quintile in both urban and rural areas.

UNRWA serves Palestinian refugees, and most of its clients belong to lower quintiles—yet 22 percent belong to the top two quintiles. In the case of contraceptive shortages, UNRWA should consider directing these clients to the commercial sector and targeting its subsidized FP services and commodities to those who cannot afford the commercial sector prices. However, by regulation, all of the refugees are eligible for free health services.

Potential Market for the Commercial Sector

The commercial sector market share declined from 45 percent in 1990 to 37 percent in 2002. An increasing number of women are using public sector services and contraceptives. The trend has been positive, as a larger number of poor women are shifting to the government sector. However, rich women are not being directed to the private sector; consequently, a large number of these women—who can afford to pay commercial sector prices—also benefit from the free public sector services. About 18 percent of the wealthy women have health insurance with the government sector, however, which makes them eligible for free government health services. They cannot be denied these services or diverted to other sectors.

In this context, this study recommends that women who belong to the upper middle and richest SLI quintiles should be encouraged to use commercial sector services, unless they have government insurance. This group of women in urban areas may include 12,656 condom users, 123,972 IUD users, 36,852 pill users, 2,646 injectable users, 12,527 female sterilization users, and 1,511 users of other modern methods. Similarly, 1,273 condom users, 18,096 IUD users, 4,016 pill users, and 125 injectable users in rural areas may form the private sector clientele.

Table 9:
Potential FP Market for the Public and Private Sectors: Number of Users in Urban Areas

Quintile Percents	17.1	21.9	20.6	20.2	20.1	99.9
				Percent		
	Poorest	**Second**	**Middle**	**Fourth**	**Richest**	**Total**
% of intenders converted	1.0	1.0	1.0	1.0	1.0	1.0
% of traditional method converted	1.0	1.0	1.0	1.0	1.0	1.0
Condom						
Existing users	**3,096**	**3,709**	5,293	3,657	4,695	20,420
From intenders	**874**	**1,496**	951	1,567	526	5,235
From traditional method users	**702**	**1,237**	887	1,479	731	4,198
Total condom use	**4,672**	**6,442**	7,132	6,703	5,953	29,853
IUD						
Existing users	**14,680**	**31,974**	26,347	33,503	36,389	142,938
From intenders	**19,121**	**22,293**	17,794	14,884	10,527	83,766
From traditional method users	**15,352**	**18,427**	16,607	14,053	14,616	67,171
Total IUD use	**49,153**	**72,694**	60,748	62,440	61,532	293,874
Pill						
Existing users	**7,390**	**7,546**	9,384	8,258	10,330	43,173
From intenders	**5,682**	**6,284**	5,026	5,353	3,290	25,522
From traditional method users	**4,562**	**5,194**	4,691	5,054	4,568	20,466
Total pill use	**17,633**	**19,024**	19,100	18,665	18,187	89,162
Injectable						
Existing users	**1,298**	**895**	1,323	590	352	4,667
From intenders	**656**	**598**	543	392	395	2,618
From traditional method users	**526**	**495**	507	370	548	2,099
TotaliInjectable	**2,480**	**1,988**	2,374	1,351	1,295	9,384
Female sterilization						
Existing users	**2,097**	**2,686**	**3,729**	3,775	4,461	16,919
From intenders	**1,202**	**898**	**951**	914	1,053	5,235
From traditional method users	**965**	**742**	**887**	863	1,462	4,198
Total female sterilization	**4,264**	**4,326**	**5,568**	5,552	6,975	26,353
Other modern method						
Existing users	**300**	**000**	000	000	000	000
From intenders	**328**	**150**	000	131	526	1,309
From traditional method users	**263**	**124**	000	123	731	1,050
Total other method use	**891**	**273**	000	254	1,257	2,358
Total potential modern method use	79,093	104,748	94,921	94,965	95,199	450,984
Total traditional method use	000	000	000	000	000	000
Total all use	79,093	104,748	94,921	94,965	95,199	450,984

Note: Numbers in bold are proposed to use the government sector
Numbers in bold that are shaded are proposed to use the government and NGO sectors
Numbers that are shaded only are proposed to use NGOs
The remaining numbers are proposed to use the commercial sector

Table 10:
Potential FP Market for the Public and Private Sectors: Number of Users in Rural Areas

Quintile Percents	33.1	25.3	20.3	14.2	7.1	100.0
				Percent		
	Poorest	**Second**	**Middle**	**Fourth**	**Richest**	**Total**
% of intenders converted	1.0	1.0	1.0	1.0	1.0	1.0
% of traditional method converted	1.0	1.0	1.0	1.0	1.0	1.0
Condom						
Existing users	**632**	**1,004**	626	626	647	3,526
From intenders	**277**	**406**	852	000	000	1,632
From traditional method users	**162**	**350**	980	000	000	1,108
Total condom use	**1,071**	**1,760**	2,459	626	647	6,266
IUD						
Existing users	**5,690**	**5,613**	5,458	5,737	2,837	25,416
From intenders	**11,017**	**8,365**	4,589	2,883	1,525	28,404
From traditional method users	**6,463**	**7,211**	5,278	2,374	2,740	19,274
Total IUD use	**23,169**	**21,189**	15,325	10,994	7,102	73,094
Pill						
Existing users	**3,599**	**2,044**	2,535	1,502	386	10,137
From intenders	**3,211**	**1,381**	1,246	961	135	7,019
From traditional method users	**1,884**	**1,190**	1,433	791	242	4,763
Total pill use	**8,693**	**4,615**	5,213	3,254	762	21,919
Injectable						
Existing users	**778**	**372**	507	125	000	1,763
From intenders	**609**	**853**	131	000	000	1,632
From traditional method users	**357**	**735**	151	000	000	1,108
Total injectable	**1,744**	**1,960**	789	125	000	4,503
Female sterilization						
Existing users	**1,313**	**1,152**	**1,282**	**876**	**261**	4,848
From intenders	**886**	**568**	**131**	**412**	**135**	2,122
From traditional method users	**520**	**490**	**151**	**339**	**242**	1,440
Total female sterilization	**2,718**	**2,211**	**1,564**	**1,627**	**637**	8,410
Other modern method						
Existing users	**000**	**000**	000	000	000	000
From intenders	**000**	**284**	000	000	000	326
From traditional method users	**000**	**245**	000	000	000	222
Total other method use	**000**	**529**	000	000	000	548
Total potential modern method use	37,396	32,263	25,350	16,627	9,148	114,741
Total traditional method use	000	000	000	000	000	000
Total all use	37,396	32,263	25,350	16,627	9,148	114,741

Note: Numbers in bold are proposed to use the government sector
Numbers that are shaded only are proposed to use NGOs
The remaining numbers are proposed to use the commercial sector

Table 11:
Potential FP Market for the Public and Private Sectors: All Users

Quintile Percents	20.3	22.6	20.6	19.0	17.5	100.0
			Percent			
	Poorest	**Second**	**Middle**	**Fourth**	**Richest**	**Total**
% of intenders converted	1.0	1.0	1.0	1.0	1.0	1.0
% of traditional method converted	1.0	1.0	1.0	1.0	1.0	1.0
Condom						
Existing users	3,858	4,625	6,173	4,305	5,244	24,120
From intenders	1,156	1,888	1,846	1,536	571	6,546
From traditional method users	836	1,580	1,812	1,428	801	5,062
Total condom use	5,849	8,093	9,831	7,269	6,617	35,728
IUD						
Existing users	20,328	37,663	31,921	39,163	39,269	168,843
From intenders	30,050	30,583	22,320	17,666	11,994	112,093
From traditional method users	21,725	25,602	21,903	16,417	16,825	86,685
Total IUD use	72,103	93,848	76,144	73,245	68,087	367,620
Pill						
Existing users	10,980	9,581	12,046	9,721	10,745	53,357
From intenders	8,916	7,740	6,209	6,298	3,570	32,728
From traditional method users	6,446	6,480	6,093	5,853	5,007	25,309
Total pill use	26,342	23,801	24,348	21,872	19,322	111,394
Injectable						
Existing users	2,077	1,322	1,807	833	384	6,578
From intenders	1,321	1,510	671	461	428	4,091
From traditional method users	955	1,264	659	428	601	3,164
Total injectable	4,353	4,096	3,137	1,722	1,413	13,833
Female sterilization						
Existing users	3,413	3,799	4,969	4,722	4,733	21,928
From intenders	2,146	1,510	1,175	1,383	1,285	7,364
From traditional method users	1,552	1,264	1,153	1,285	1,803	5,695
Total female sterilization	7,111	6,574	7,296	7,389	7,820	34,986
Other modern method						
Existing users	297	000	000	000	000	000
From intenders	330	378	000	154	571	1,636
From traditional method users	239	316	000	143	801	1,265
Total other method use	866	694	000	296	1,372	2,902
Total potential modern method use	116,624	137,106	120,757	111,794	104,631	566,463
Total traditional method use	000	000	000	000	000	000
Total all use	116,624	137,106	120,757	111,794	104,631	566,463

9. Policy Options

Together, Tables 9, 10, and 11 represent a significant challenge for the government, commercial, and NGO sectors of Jordan's FP program. Table 12 summarizes the growth implied by the preceding tables for each of the sectors.

Table 12: Current and Potential Markets for the Government, NGO, and Commercial Sectors

	Government		NGOs		Commercial		Total	
	Current	Potential	Current	Potential	Current	Potential	Current	Potential
Condoms	8,925	10,724	4,462	23,165	10,442	13,929	23,829	47,818
Pills	19,662	40,453	8,639	33,825	24,918	40,868	53,219	115,146
Injectables	1,842	7,178	1,677	4,157	2,250	2,771	5,769	14,106
IUDs	47,276	129,858	63,654	112,420	57,744	142,068	168,674	384,346
Female sterilization	14,873	22,915	0	0	7,052	12,527	21,925	35,442
Total of FP methods	92,578	211,128	78,432	173,567	102,406	212,163	273,416	596,858

The achievement of contraceptive security poses a significant challenge for all sectors. To expand access and address the varied needs of current and potential clients, each sector must promote and provide contraceptives. Essentially, the efforts of all sectors must be combined in order to increase the number of clients who would like to obtain and use contraceptives.

Jordan provides a favorable environment for the expansion and growth of the private sector. The country needs an effective and feasible plan to mobilize all potential sources for meeting FP requirements for all men and women. The following section presents policy options that can help country move toward contraceptive security.

Targeting

Jordan is fully dependent upon donor assistance for FP commodities. USAID funds the procurement and shipment of all contraceptives to meet the supply needs of the government and NGO sectors. A phaseout of USAID funding for contraceptives may occur in the next two to five years. The ability of the Jordanian government to meet the coming challenges is constrained by competing priorities and lack of resources.

Government resources are not sufficient to meet the needs of all Jordanian men and women. A comparative analysis of public sector targeting indicates that the poor constitute a relatively large proportion of government sector clients. However, there is a positive trend: an increasing number of the poor are shifting to the public sector. Still, about 31 percent of public sector clients belong to the top two quintiles and are able to pay for commercial sector services. Currently, no efforts are being made to encourage wealthy clients to use commercial sector services. The government and donors must improve the private sector's image in order to create demand for commercial sector services among wealthier clients. Generating incentives for using the private sector and disincentives for using the public sector would be prudent. Such strategies could include

requiring the non-poor who use government health facilities to pay user fees, and mandating the inclusion of FP/RH products and services in health insurance policies.

The government must protect the poor from paying for services and commodities. A considerable number of the poor still obtain contraceptives from the commercial sector. Governments hold the ultimate responsibility of ensuring accessibility and affordability of FP services to the poor and needy.

All three sectors play an equally important role in the FP market. This market segmentation analysis is not proposing any changes in the public, NGO, or commercial sector market sizes. However, the government must consider a two-pronged approach that targets public subsidies to the poor and shifts wealthier clients to the commercial sector.

User Fees

Government and NGO sectors provide free or highly subsidized FP commodities and services to all clients. Some NGOs have instituted a nominal user fee; consequently, cost recovery is insignificant. The NGO sector is highly dependent upon external donor assistance. NGOs are under pressure to achieve financial sustainability, as USAID is planning to phase out its support. JAFPP is in the process of broadening its service base and adding a number of reproductive health services (including services for prevention and treatment of sexually transmitted infections, assistance at delivery, and infertility treatments).

Public–Private Roles and Collaboration

Although the private sector is quite active in the delivery of FP services, it is not generally considered a true partner in policymaking and service delivery.

The government needs to communicate with private sector FP providers and recognize the growing role that they play in achieving contraceptive security. Because of a scarcity of government resources, it is critical that resources not be spent on activities that the private sector performs. At the same time, government must support and manage the private sector to enable it to become a cost-effective alternative that offers affordable FP services.

Both the public and private sectors lack basic market and policy information. The availability of market information can facilitate analysis-based discussions of the respective roles of the public, commercial, and NGO sectors. Information on the market can promote dialogue with the public sector and, consequently, help it identify segments of the FP market that are in great need of subsidized services.

10. Conclusion

This study reveals that there is an untapped potential for commercial products and services among users of subsidized products. A collaborative multisectoral effort is needed to maintain access to FP methods for current users, convert intenders into satisfied clients, and shift those who use traditional contraceptive methods to the more effective modern methods.

Better targeting, greater coordination, and improved demand are needed for a more efficient and effective FP market. A better match must be established between current/potential users and the appropriate sources of contraceptives, taking into account the users' location, needs, preferences, and ability to pay. Greater involvement of the commercial sector can free up donor and government resources to serve those who are the most vulnerable and who cannot afford to pay.

Abbreviations

CPP	Comprehensive postpartum
FP	Family planning
IUD	Intrauterine device
JAFPP	Jordanian Association for Family Planning and Protection
JCLS	Jordanian Contraceptive Logistics System
JD	Jordanian Dinar (currency)
JPFHS	Jordan Population and Family Health Survey
JUH	Jordan University Hospital
LAM	Lactational amenorrhea
MCH	Maternal and child health
MOH	Ministry of Health
MWRA	Married women of reproductive age
NGO	Nongovernmental organization
RH	Reproductive health
RMS	Royal Medical Services
SES	Socioeconomic status
SLI	Standard of living index
STI	Sexually transmitted infection
UNWRA	United Nations Relief Works Agency
USAID	U.S. Agency for International Development