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Population Council

Liverpool VCT Care & Treatment

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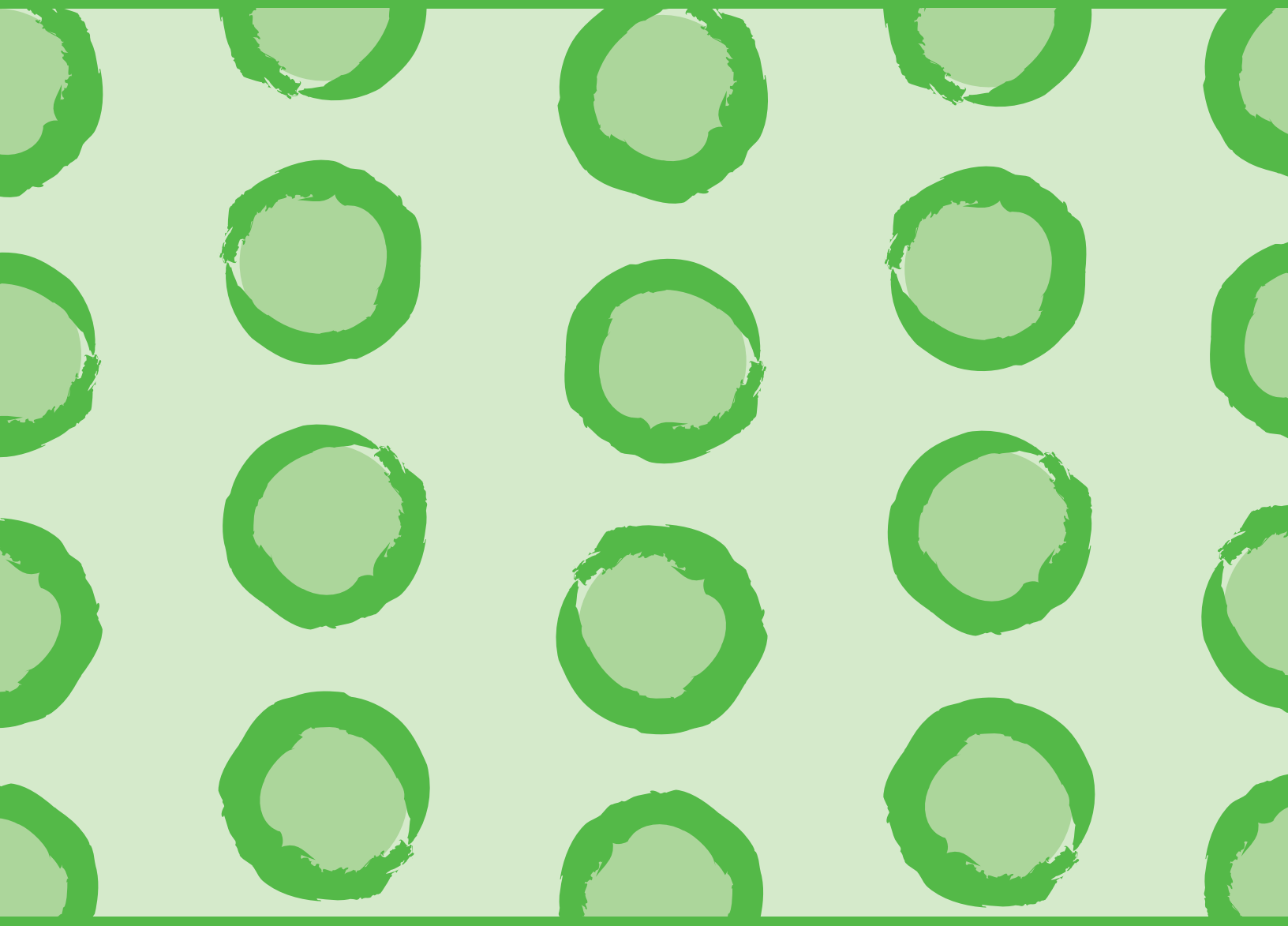

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FEMALE-INITIATED PREVENTION:

Integrating Female Condoms into HIV Risk-reduction Activities in Kenya

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The Population Council conducts research worldwide to improve policies, programs, and products in three areas: HIV and AIDS; poverty, gender, and youth; and reproductive health.

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EXECUTIVE SUMMARY

The Female Condom (FC) is the only female-initiated prevention product on the market today that provides simultaneous protection against STIs, including HIV, and unintended pregnancy. Despite this unique dual protection benefit, the female condom remains limited in supply, not easily or widely available, and under utilized in many settings. Improvements in female condom programming are essential to achieve increased uptake and public health impact, as well as to pave the way for future women's HIV prevention products, such as microbicides. The Population Council's Female-Initiated Prevention Methods (FIPM) project, conducted in partnership with Liverpool VCT, Care & Treatment (LVCT), aimed to stimulate action and generate evidence around FC access through innovative program experimentation.

The study was conducted from March to August 2008 across three unique service environments so as to understand the challenges and opportunities these different access models present: 1) FP/RH clinics; 2) VCT centres; and 3) private sector workplaces. Broadly speaking, the study aimed to answer the following questions:

- What are the gaps in knowledge (and prevailing attitudes) about the female condom among clients and potential users?
- What is the acceptability of FC in different types of service environments?
- To what extent does the mode of provision, including information and supply, promote willingness to use the FC?
- What triggers do women respond to vis-à-vis promotion of FC in different service environments?

The study began with in-depth training of peer educators and counselors from the selected sites, followed by specific efforts to integrate FC into service protocols. Educational materials directed toward users were developed and tested. Free, adequate and "on-demand" supply of female condoms was provided to all sites and potential users were encouraged to take them free of charge.

A combination of qualitative and quantitative techniques gathered information from clients at two time points at the VCT and Family Health Options of Kenya (FHOK), sites, and at one time point only at the workplace sites. Data were gathered on knowledge, attitudes, and experiences with the product. Convenience samples were drawn of women in the general population at risk of STIs in a typical month at the clinical sites (FHOK, VCT). At the workplace sites, samples were drawn from among the employee population.

This study suggests that *consistent* and *free or low cost supply* of FC in a variety of settings is both feasible and acceptable. Across the three unique service environments, FC appears to be an acceptable method; almost all participants were willing to recommend FC to others, and agreed that FC should be made widely available in Kenya. Almost all were willing to pay for FC, though at amounts (Ksh 20 to 40 on average) lower than actual market prices. However, as expected, some respondents were not willing

to try FC for a variety of reasons ranging from "not needing such a method", fear of partner's reaction, or simply "not liking the looks of it". The study suggests that the main triggers to use were: providers' recommendation to try it, the idea of trying something new, "novelty" demand, and the fact that female condoms provide simultaneous protection against STIs/HIV *and* pregnancy.

To improve FC uptake there is need for a consistent supply of affordable FCs, culturally-appropriate and tested behavior change communication (BCC) materials to inform and educate users and providers, and strategic promotion using a variety of techniques, including social marketing. Providers need to be adequately trained so that they can confidently demonstrate FC to clients, provide accurate information and counselling, and support its use. Female pelvic models enhance effective demonstration and should be made available at service delivery sites. Reliable supply promotes familiarity and bolsters confidence in product availability, allowing for potentially greater uptake. In addition to technical information about the product, underlying messages addressing issues such as "body-esteem", sexuality, communication and negotiation skills, and related issues need to be incorporated into FC programming. Although FC is a female-initiated method, and is targeted at women, successful uptake and effective use necessitates engaging men as partners. Broader outreach would improve overall awareness and encourage more positive attitudes toward female condoms.

From a program and policy perspective, setting realistic expectations about level of uptake is important. FC should be considered within the context of comprehensive condom programming (CCP) (male and female) and viewed as an additional option to prevent pregnancy *and* STIs/HIV, and thus increase the chance that some protective method will be adopted. Indeed, this study indicates an interest and demand for female condoms among segments of the population, e.g. those who perceive themselves at risk for STIs and/or HIV. Correct use is an achievable goal, and though consistent use is optimal, experience suggests that this is difficult to achieve. Perhaps a more realistic goal is to aim for improvement in rates of overall protection by some method.

Sustainable procurement, logistics support, and supply chain management are essential elements which can lead to increase uptake; commitment to improvements in these areas is needed from decision-makers at all levels. Finally, convening key stakeholders is needed to develop a national strategic plan for FC within the context of comprehensive condom programming. A strategic plan would help ensure adequate, sustainable supply, improve training and outreach, promote awareness, and—ultimately—use of FC in Kenya.

BACKGROUND

The Female Condom (FC) is the only female-initiated prevention product that provides simultaneous protection against STI/HIV *and* pregnancy on the market today. Although the FC has been available for over a decade, it remains limited in supply, not readily available, and under utilized. Underutilization has been attributed to notions such as "high cost," "difficulty in negotiating its use," or simply, "lack of availability." To overcome these obstacles, feasible and appropriate access models are needed, tailored for specific context. Thoughtful and strategic female condom programming is essential for the uptake of the FC itself, and also to pave the way for future women's HIV prevention products. Therefore the Population Council's Female-Initiated Prevention Methods (FIPM) project, conducted in partnership with Liverpool VCT, Care & Treatment (LVCT), aimed to stimulate action and generate evidence around FC access through innovative program experimentation.

The need for female-initiated prevention is underscored by worldwide estimates of more than 340 million new cases of STIs annually. These include approximately 2.5 million new HIV/AIDS infections, half of which are among women, with young women being at greater risk especially in sub-Saharan and Southern Africa (UNAIDS 2007; Pettifor et al. 2004). At the same time, there remains an unmet need for contraception to space or limit births. Barrier methods of contraception (of which the female condom is one) can avert unintended (mistimed + unwanted) HIV-positive births; these methods are estimated to prevent over 120,000 unintended HIV-positive births per year in South Africa, over 14,000 in Kenya, and over 11,000 in Tanzania, at a cost savings of over US $ 6 million, 2 million, and 1 million respectively (Reynolds et al. 2008).

The new generation of female condom, known as FC2, has several advantages over the original model and has also been shown to be effective in preventing both pregnancy and STIs, including HIV/AIDS. In a randomized trial, both male and female condoms appeared highly protective against "high level" semen exposure (Galvao et al. 2004). Like the original female condom product, FC2 can be used by a broad range of women of all age groups, various relationship statuses, and in diverse settings. While this study provided FC2 to clients, for the purposes of this document we have chosen to refer to FC2 as female condom or FC as that is the commonly used term to describe the product category.

How FC is positioned in a given context (i.e. primarily pregnancy prevention to avoid stigma associated with STI prevention, as a dual protection method, or specifically for HIV prevention) is a strategic decision for national policy makers. Women can use the FC to protect themselves even if (when) their partners refuse to use male condoms (PATH 2006). Married and/or cohabiting women's perception of HIV risk from her partner is a very strong predictor of (male) condom use (OR 4.0). Research suggests that increasingly, women are beginning to successfully negotiate male condom use, which may logically be extended to female condoms as well (Maharaj and Cleland 2005). Overall, increased *access* to FC results in *increased use*, and a greater proportion of

sex acts being protected (Vijaykumar et al. 2006). In order for female condom efforts to translate into a population-level effect, they must be used widely and consistently; they should augment—not replace—the level of protection achieved by male condoms.

COMPREHENSIVE CONDOM PROGRAMMING (CCP)—GLOBAL CONTEXT

Condom programming for dual protection is a means to ensure that sexually-active people at risk of STI/HIV infection and /or unintended pregnancy are motivated to use male and female condoms, have access to quality condoms, and are able to use them correctly and consistently. A "comprehensive" condom program (CCP) addresses all key components including leadership, coordination, demand, supply, and support. Efforts by UNFPA and other key agencies to bolster CCP efforts at global and country levels are underway, with the aim of more robust and strategic condom programming to enhance the adoption and use of both male and female condoms.

MALE CONDOM PROMOTION IN KENYA

Male condoms have been vigorously marketed in Kenya with some good results. The Ministry of Health has documented strong gains annually in demand beginning from 50 million pieces in 2002 to projected demand in 2005–2007 of at least 500 million (MOH 2005). Despite this, a National Condom Policy and Strategy report highlighted higher rates of HIV infection among young women aged 15–24 years in 2006 (4.4 percent compared with young men at 0.8 percent), despite declines in population prevalence from 5.9 percent in 2005 to 5.1 percent in 2006 (NACC 2007). It is feared that many young people use condoms incorrectly, inconsistently, or not at all: less than half the males and females aged 15 to 24 had used a condom at their last sexual encounter (MOH 2005).

Biological, social, economic, and cultural factors make women more vulnerable to HIV infection than men. In Eastern Africa, HIV discordance among married couples approaches 50 percent (Bunnell 2006), and it appears that fear of pregnancy, not HIV or STIs, motivates condom use. Thus condom use typically declines with increased use of oral contraceptives. Since the male condom requires active participation of the male partner, men exert disproportionately greater control over the decision to practice safer sex (Weeks 2004). Female-initiated prevention methods can play a critical role in enhancing women's autonomy and protection.

FEMALE CONDOM EFFORTS IN KENYA

In Kenya, both the Kenya National HIV/AIDS Strategic Plan (NACC 2005) and the National Condom Policy and Strategy (MOH/NACC 2001) acknowledge that female condoms are a useful female-initiated strategy, and give priority to ensuring adequate, high-quality, national supplies and accessibility. Implementation of these policies however is complex and is executed by two departments of the Ministry of Health: the Division of Reproductive Health (DRH) and the National AIDS and STIs Control Program (NASCOP). Under DRH, FCs are intended to be offered as a contraceptive product to women at FP and MCH clinics, and by community distributors. Under NASCOP, FCs are intended to be programmed with male condoms among the methods offered for STI/HIV protection, through VCT centres, public and private-sector workplaces, pharmacies/chemists, and more commercial establishments, such as bars, restaurants, shops and supermarkets. The Kenya government, through KEMSA, and with financial support from donors including UNFPA, DFID, and World Bank, procure both male and female condoms which are then distributed through various channels and levels. FCs are offered free in many public sector health facilities, but are sold in the private sector. However, supply of FC remains negligible compared to male condoms. Between January and March 2007, Kenya procured 203,904 FCs through the UNFPA compared with the 12 million male condoms per month (Neondo 2007).

Barriers to use of female condoms

Although the FC was introduced in 1993, the 2003 KDHS shows that very few women in Kenya have ever used it (only 0.3 percent of women aged 15–49 years). Among sexually active single women, none had ever used this device (Central Bureau of Statistics and Macro International 2004). These negligible levels can be attributed to lack of access and availability of the product in public and private sector outlets, inadequate and inconsistent supply, high cost, insufficient human resources to deliver FC, and lack of effective logistics systems. Further, lack of an awareness campaign and public education contribute to misinformation among both users and providers. In a previous study in VCT centres, counselors reported that most clients believed FCs were "not as good" as male condoms, and had little or no knowledge or experience of FCs. Counselors' knowledge, too, was largely based on hearsay and constrained by lack of experience; many had doubts about the product (Mung'ala et al. 2006). A search for behavior change communication (BCC) materials on the FC among NGOs revealed that they are virtually non-existent.

RATIONALE FOR THE FIPM STUDY

The National HIV/AIDS Strategic Plan (NACC 2005) and the National Condom Policy and Strategy (MOH/NACC 2001) acknowledge that implementation of their

FC policies is lacking, and thus access to FCs remains limited. While numerous female condom acceptability studies have been conducted, comparatively little research has been done on the policy and program factors that foster or impede access and availability of FC.

The current study examines how FC can be integrated into diverse service settings, including VCT centres, FP/RH clinics, and workplace peer education programs. Women's and men's perceptions and use of the product is explored, along with willingness to pay and other key issues. Findings from this study will inform a more nuanced and programmatically acceptable delivery of FC to Kenyan men and women, and will suggest the most powerful paths that the FC can carve to enhance current programming, as well as to prepare for future female-initiated prevention methods.

Formative research with health providers and program managers indicated that once providers receive comprehensive training on FC, and become aware of its efficacy, including its utility against STIs, many become positive toward it. Still, most providers consider FC a "niche" product, suitable for subgroups such as sero-discordant couples, women with multiple partners, or women concerned about their partners' sero-status, alcohol use, or his other sexual partners.

Historically, female condom programs have been hampered by several factors. There have been limited resources for—or investment in—training, communications, and outreach. Provider bias against FC, which has long been a problem, remains, thus there are few champions for the product among the provider community. One possible solution is to raise awareness among potential users of FC. However, in the absence of studies under a range of conditions, doubts remain about potential market size and demand for FC, and users' willingness to pay at different levels of cost. Most settings are characterized by limited infrastructure for distribution and promotion of FC, due to challenges in supply chain logistics and in adequate product supply. Thus, this study aims to clarify key questions that can shape future FC programs. Most prior literature on FC explores one particular service delivery approach (e.g. public sector FP/RH programs), or a specific target population (e.g. sex workers); few have attempted to look broadly at the potential constellation of program entry points and tease out the specificities of working within them. Although acceptability of the FC to end users has been established in many countries, the "acceptability" of the delivery mechanism has not been adequately explored.

INTRODUCTION TO THE FIPM PROJECT

The FIPM Project in Kenya is a descriptive study to explore the feasibility and acceptability of three different service delivery settings in urban Kenya:

a. Voluntary Counselling and Testing (VCT) centres,
b. Family Health Options of Kenya (FHOK) clinics (FP/RH sites),
c. Workplace HIV/AIDS education programs, described as follows:

VCT centres

Liverpool VCT, Care & Treatment (LVCT) is one of the major providers of HIV counselling and testing services in Kenya. LVCT endeavours to use research results and technical resources to inform HIV and AIDS policy formulation and to build the capacity of government, private and civil society organizations to provide quality HIV counselling and testing, treatment and care services. LVCT provides a range of services for HIV prevention, care and support; as well as training and sensitization for communities and service providers. Of the roughly 1,000 VCT sites in Kenya, LVCT has helped to establish over 400 and trained over 70 percent of Kenya's VCT counsellors that serve Government, private sectors and other partners.

Male condoms are readily available at VCT centres as one of the HIV risk reduction measures, but the FC has not been fully integrated into counselling processes. The current project trained VCT counsellors on FC and integrated the FC into discussions of HIV prevention strategies. FCs were offered along with the male condom as part of an "enhanced package of protection".

FHOK centres

Family Health Options of Kenya (FHOK) has implemented reproductive health activities in Kenya since the 1950s, and early on recognized the need for integrating STI and HIV/AIDS-related work into their services. Male condoms are readily available at most FHOK centres, but FC have had limited uptake and integration. The selected FHOK study site offered the FC to all who requested, but particularly those clients who were provided with male condoms, and/or those seeking STI services.

Workplace sites

Del Monte Kenya Limited is a subsidiary of Fresh Del Monte Produce Inc. Based in Thika, an industrial town about an hour's drive outside Nairobi, its core business is growing, processing marketing and distribution of pineapples and Del Monte beverage juices. Del Monte Kenya has a workforce of close to 6,000 employees, with 2,500 in the production factory, and 3,500 in the agricultural farms. About 50–75 percent of its multi-cultural workforce is female, and of these, about half are unmarried. Del Monte's workplace HIV/AIDS program is managed by one trainer and a clinical matron, each spending about 5 percent of their time on HIV/AIDS issues. They have had some experience, albeit not very favorable, with the FC. In 2006, they had obtained 1,000 pieces but had to return them because of low uptake among employees, yet noted considerable "demand" from sex workers working within Thika town. The current FIPM study has provided an opportunity to revive the program with a more comprehensive approach. HIV/AIDS_education has now been integrated into the orientation program for new hires and all in-house training programs.

Unilever Kenya is a subsidiary of Unilever International, and manufactures cooking oil and margarines, toiletries, and laundry detergent. Based in Nairobi's Industrial Area, Unilever has a staff of 2,000. They have a strong HIV/AIDS program including VCT services with a VCT counsellor and an outside provider. This outside provider sources commodities. Support for the program is strong. The program is managed by

a dedicated company nurse matron and a clinical officer. In addition, Unilever has 25 peer educators and a well-organized structure for holding group talks and discussions with staff. All new employees receive orientation about HIV and AIDS.

Integration of female condom into the selected study sites

The FIPM project integrated female condom into the service protocols at each of the sites, and ensured an adequate supply during the study period. Peer educators and counsellors from the sites received intensive training on FC by an internationally recognized Master Trainer, using a standardized curriculum encompassing reproductive health and HIV/AIDS, as well as broader issues of male involvement and negotiation. Post training, all sites developed a strategy to integrate FC into their service protocols. Peer educators counseled clients about FC and offered samples free of charge. The counsellors were provided pelvic models to demonstrate, and informational materials such as flyers and brochures. In the spirit of comprehensive condom programming, both male and female condoms were made available.

METHODOLOGY

Study objectives

The study objectives were to:

1. Explore the feasibility and acceptability of three different service delivery types (RH, VCT, workplaces);
2. Identify the range of access barriers at the program, policy, and institutional levels; and
3. Explore clients' attitudes, knowledge, and use of FC.

The study aims to answer the following questions:

1. What are the gaps in knowledge (and prevailing attitudes) about the female condom among clients/potential users?
2. In general, what is the acceptability of FC in different types of service settings?
3. To what extent does the mode of provision, including information and supply, promote wiliness to use the FC?
4. What triggers do women respond to regarding the promotion of FC in the three service environments?

Study design

This descriptive study incorporates a three-arm study design, including:

a. Women (and men) receiving services (including FC) at VCT centres;
b. Women (and men) receiving STI services (including FC) at RH clinics; and

c. Women (and men) having access to FC via condom dispensers at workplace sites.

Site selection

The sites were selected on a convenience basis with the assistance of LVCT, targeting Nairobi city and the peri-urban area, and focusing on sites serving the general population at risk for STIs/HIV. Sites included:

- Four VCT centres located at: **Supkem, Hurlingham, Sokoni, and Githurai**. Each centre received at least 10 walk-in clients per day, and were in areas that served the general population rather than niche groups such as sex workers.
- One FP/RH clinic run by FHOK. FHOK clinics provide a range of FP/RH services; however the **Ribeiro clinic** site was marked by a comparatively high STI case load (as indicated by clinic records), thereby making it a suitable site for this study.
- Two workplace sites **(Del Monte (K) Ltd. and Unilever Ltd**) were selected due to their active HIV/AIDS prevention programs and large population of female employees.

At the workplace sites, supplies of FC were stocked and supplied via condom dispensers in both the men's and women's washrooms. In addition, peer educators were given supplies to distribute to those who expressed interest. The washroom supplies were checked and re-stocked periodically by peer educators. Pre-tested information flyers were placed at strategic locations in all the sites.

Sampling

To select ***study participants***, the interview team focused primarily on recruitment of females, and a smaller number of males; thus the group of respondents reflects a greater proportion of females. In the VCT and FHOK sites, interviews were conducted by a research team of two to three persons at each site over the period of one month. They attempted to interview *every* female and *every third male client* who met the study criteria (described below) and agreed to be interviewed during this period. The total number of interviews reflects the typical one month case load, rather than a pre-determined sample size. In the workplace sites, interviews with peer educators and focus group discussions with workers were scheduled with management input, based on shift hours, and did not aim to capture a specific time frame or client profile.

VCT centres: The focus of the sample was on all women and every third man coming for VCT services. This included walk-in *individual* clients of VCT centres, i.e., those coming in alone, not those who came in as part of a couple (previous "couples studies" have been conducted, and were considered outside the scope of this particular study). Due to confidentiality, the study did not ascertain the HIV status of clients. Clients were informed about FC and offered samples as part of the clinic protocol.

Exiting clients were requested to participate in the Round 1 interview. Of Round 1 interviewees, only those who had taken FC samples were invited for a Round 2 interview a month later.

FHOK Clinic: Since FHOK clinics provide a range of FP/RH services, the Ribeiro clinic staff took the responsibility of screening in patients who came in for STI services. After consultation, clients were counseled by clinic staff on the FC and referred to the study team for interviews. Clients (all females and every third male) who agreed to be interviewed and who had taken FC samples were asked to return for Round 2 interviews.

Workplace sites: In the workplace sites, participants were selected from the employee population based on shifts and with management input. Workers were recruited for focus group discussions by means of informational flyers and a participant screening questionnaire. Peer educators were also interviewed using a standardized questionnaire. Peer educators were selected for interview on a convenience basis, depending on work schedules and availability for participation during the study period.

Data collection

A combination of qualitative and quantitative techniques were used to gather information from providers, clients, peer educators, and program managers. We report here on data from clients and peer educators. Client level data were collected via a standardized survey at two time points at each of the VCT and FHOK sites**.** At the workplaces, peer educator data were gathered by individual interviews, and client level data was captured through focus group discussions at one time point. Due to workplace logistics it was not feasible to conduct two rounds of survey interviews at the workplace sites.

At the VCT and RH/FP clinical sites, the first interview round gathered baseline data on existing knowledge and exposure to FCs among clients who had received information on FC from the facility staff as part of the education and counselling protocols. The second round of data collection (approximately one month later) ascertained experiences with and use of FC, along with a battery of knowledge and attitude questions. In workplace sites, data were collected at only one time point through focus group discussions with male and female users and via standardized surveys with peer educators at each site, to ascertain experiences with and attitudes toward the product.

Study instruments were developed by the study team. Instruments were developed in English and translated into Kiswahili by a Population Council staff translator, along with a collaborative discussion process with the highly experienced and multi-lingual interviewer team and LVCT staff. The study team developed appropriate translations of all the relevant terms at a language level that was accurate, but not overly technical and could be easily understood by the target population.

Interviewer training

Interviewers took part in a two-day training conducted by Population Council staff in April 2008. Research interviewers were introduced to the aims of the project, background on research design, research methods, research ethics, and interview strategies. The interviewers were a very experienced and skilled group. They participated in developing important aspects of the questionnaire, including analyzing skip patterns and question and answer word choices, and contributed to discussions on appropriate translations of the English questionnaire draft. The interviewer training included interview role-plays, and field-testing of questionnaires in the study sites.

RESULTS

Participant response rate

Table 1 describes the participants and response rates for the two interview rounds in the VCT and FHOK sites. A total of 501 Round 1 interviews took place in the four LVCT sites and one FHOK site. About 56 percent (263 persons) accepted samples of female condoms and were invited for Round 2 a month later. Of these, 193 persons returned and completed Round 2. Of these 193 persons, 24 could not be matched with a Round 1 respondent, and were therefore discarded from analyses, leaving a group of 477 valid interviews for Round 1 and 169 valid interviews for Round 2. This corresponds to a Round 2 follow-up response rate of about 64 percent (of 263 eligible). The response rate was higher in FHOK compared to LVCT sites due to a combination of client characteristics (VCT clients typically are not repeat visitors in a short time frame) and interviewer factors. The majority of interviews were from the Supkem and Githurai LVCT sites. Among matched interviews, the Ribeiro clinic had the highest number.

Table 1 Distributions of Interview Rounds 1 and 2, By Facility

	ALL INTERVIEWS				MATCHED INTERVIEWS ONLY			
	Round 1 (n = 501)		Round 2 (n = 193)		Round 1 (n = 169)		Round 2 (n = 169)	
Facility name	Count	Col %	Count	Col %	Count	Col %	Count	Col %
1 LVCT Hurlingham	69	13.8%	21	10.9%	20	11.8%	19	11.2%
2 LVCT Sokoni	119	23.8%	24	12.4%	19	11.2%	21	12.4%
3 LVCT Githurai	160	31.9%	37	19.2%	34	20.1%	32	18.9%
4 LVCT Supkem	85	17.0%	47	24.4%	41	24.3%	41	24.3%
5 FHOK Riberio	68	13.6%	64	33.2%	55	32.5%	56	33.1%
Total	501	100.0%	193	100.0%	169	100.0%	169	100.0%

Socioeconomic background

Table 2 shows the socioeconomic background for participants by site, sex and interview round. Exploratory analyses (not shown here) show that participants who came only for Round 1 and not Round 2 did not differ in striking ways from those who came for both rounds, in terms of their socioeconomic or marital status. Due to the explicit sampling strategy, there are more females than males in the sample. Males and females at both sites were in their late 20's on average. Many were employed; very few reported having no source of income, although more in the LVCT sites reported receiving income from parents or family members (compared to jobs). In general, participants at the FHOK site had higher levels of education, were economically better off, and more reported savings, compared to those in the LVCT sites. Participants were distributed among being single with no steady partner, single with steady partner, and married (very few responses in polygamous unions). About 20 percent to 73 percent of males reported being employed or self-employed, as did 31 percent to 51 percent of females. Small percentages reported no source of income, or "other" sources. Most respondents reported that they themselves decided how the money they earned would be spent.

Table 2 Selected Socioeconomic Characteristics of Participants, By Site, Interview Round, and Sex

	VCT SITES				FHOK CLINIC			
	Round 1[#]		Round 2[##]		Round 1[#]		Round 2[##]	
	M (n = 131)	F (n = 302)	M (n = 28)	F (n = 85)	M (n = 18)	F (n = 50)	M (n = 15)	F (n = 41)
Age (mean years age)	27.25	27.71	25.68	30.56	28.33	30.28	28.20	29.29
Education								
% Primary	16.8	32.3	28.6	42.4	11.1	14.0	13.3	12.2
% Secondary	42.7	40.4	42.9	36.5	27.8	42.0	33.3	43.9
% College or university	40.5	27.3	28.6	21.2	61.1	44.0	53.3	43.9
Marital status								
% Single, no steady partner	33.6	19.2	32.1	20.0	5.6	25.0	6.7	22.0
% Single, with steady partner	42.0	36.1	39.3	28.2	55.6	26.0	66.7	26.8
% Married	21.4	30.1	42.5	41.2	38.9	48.0	26.7	48.8
% Widowed, divorced, other	3.1	14.6	3.6	3.5	0	2.0	0	0
Sources of income (% mentioned)								
Employment	45.8	36.8	28.6	34.1	66.7	42.0	73.3	51.2
Self-employment	37.4	33.4	35.7	41.2	22.2	34.0	20.0	31.7
No source of income	3.8	2.3	5.0	1.2	5.6	2.0	0	0
Who decides how to spend respondent's earnings (% mentioned self)	83.6	78.9	75.0	76.5	94.4	76.0	100.0	76.9

[#]Round 1 participants: unmatched data.

[##]Round 2 participants: matched data.

Sexual partners, risk perception, and use of FC among participants who came for both rounds

Table 3 focuses on participants who came for both rounds, and provides information on participants' sexual partners and protection strategies. Most respondents reported having between one and two sexual partners currently and in the last year, except males at the VCT centres, who reported greater number of partners. Large percentages of both males and females (ranging from 32 percent to 60 percent) reported that their risk of getting infected with HIV was moderate or high. At Round 1 at VCT centres, a higher percentage of women (45.3 percent) versus men (38.8 percent) reported being at moderate to high risk of getting infected. At Round 2, these proportions dropped slightly, while the use of condom increased between Rounds 1 and 2. At the FHOK sites, a greater proportion of males compared with females (albeit based on smaller n's) reported self-perception of risk as moderate to high.

FC use as a reason for lower HIV risk perception also increased from Round 1 (almost zero, both sexes and both sites) to 46 percent and 20 percent (females and males respectively at LVCT sites), and 27 percent and 51 percent (females and males respectively at FHOK sites).

Table 3 Sexual Partners, Risk Perception and Use of FC

	VCT SITES				FHOK CLINIC			
	Round 1[#]		Round 2[##]		Round 1[#]		Round 2[##]	
	M (n = 131)	F (n = 302)	M (n = 28)	F (n = 85)	M (n = 18)	F (n = 50)	M (n = 15)	F (n = 41)
Sexual partners and plans								
Mean number of current sex partners	1.36	0.94	1.71	0.98	1.33	0.98	1.33	1.24
Mean number of sex partners in last year	2.59	1.31	3.86	1.35	1.61	1.22	1.60	1.22
Self-perception of HIV risk (%)								
No/Low risk	58.1	52.3	60.7	57.1	56.6	56.0	40.0	53.7
Moderate/High risk	38.8	45.3	32.1	41.7	44.4	36.0	60.0	46.3
Don't know/No response	3.1	2.4	7.1	1.2	0	8.0	0	0
Reason for HIV risk perception (%)								
Sex without condom	11.2	15.1	15.4	11.0	5.6	24.5	40.0	36.6
Condom broke	4.0	1.4	0	0	0	2.0	0	0
I have multiple sex partners	16.8	7.0	3.8	1.2	16.7	4.1	33.3	14.6
My partner not faithful to me	2.4	25.3	15.4	13.4	5.6	16.3	0	12.2
Not sexually active	17.6	11.9	7.7	9.8	0	8.2	0	0
Stayed with only one partner	25.6	25.3	26.9	22.0	61.1	40.8	60.0	65.9
Used Male Condom	14.4	11.6	50.0	31.7	11.1	0	26.7	48.8
Used Female Condom	0	0.4	46.2	19.5	0	0	26.7	51.2
Other	33.1	30.5	24.0	27.2	11.1	24.5	0	0

[#]Round 1 participants: unmatched data.

[##]Round 2 participants: matched data.

Risk perception, attitudes toward FC, and use of protection among participants who came for Round 1 only at VCT sites

Table 3B provides information on risk perception, attitudes toward FC, use of protection (male or female condoms) for participants at VCT centres who came only for Round 1. Counsellors at each site had mentioned FC to most of these clients, but fewer (less than a fifth of females and just over a third of males) accepted the samples at VCT centres. The main reasons reported for not accepting the FC was that they were not sexually active at the present or were afraid of their partners' reaction; others simply do not like the look of the product and were unwilling to try it. Some stated that their partners were using other forms of protection. Importantly, substantial proportions—36 percent and 43 percent (females and males, respectively, at LVCT sites) considered themselves to be at moderate/high risk of HIV infection, due to having multiple sex partners or inconsistent condom use. Most had heard of FC prior to the study, but few had seen one and even fewer had ever tried one. Those who had used FC before, had used it once or a few times and found it very or somewhat easy to use and also very or somewhat easy to get their partners to agree to use it. Many knew of various places to get the FC, including community based organizations and supermarkets. In general, these respondents had a high level of knowledge about the FC and their attitudes toward it were moderately positive. Most indicated willingness to pay for FC, and nearly all believed it should be made widely available in Kenya.

Table 3B Participants Who Only Came for Round 1: Risk Perception, Attitudes toward FC, Use of Protection, and FC Use at VCT Sites Only

	VCT SITES			
	M (n = 104)		F (n = 215)	
	Count	%	Count	%
FC uptake and prior experience (full sample)				
Yes, counselor spoke of FC	82	78.8%	206	95.8%
Yes, took FC (of those to whom counselor spoke)	15	18.3%	71	34.5%
No, did not take FC	59	72.0%	123	59.7%
Average number taken by those who took FC		3.1		3.5
Do you plan to use the FC? (of those who took)	9	60.0%	62	87.3%
Yes, heard about FC before today? (full sample)	89	85.6%	163	75.8%
Yes, seen FC today (of those who heard of it)	33	37.1%	69	42.6%
Yes, ever used FC (of those who had seen it)	4	12.1%	12	17.4%
Describe your risk of acquiring HIV? (full sample)	n = 104		n = 215	
No/Low risk	64	62.1%	111	54.4%
Moderate/High risk	37	35.9%	88	43.1%
Don't know/No response	2	1.9%	5	2.5%
Reasons for HIV risk perception				
Had sex without a condom	8	7.9%	28	13.9%
Condom broke during sex	3	3.0%	2	1.0%
Have multiple sex partners	12	11.9%	16	7.9%
My partner is not faithful to me	2	2.0%	47	23.3%
Am not sexually active	19	18.8%	30	14.9%
Stayed with only one partner	27	26.7%	48	23.8%
Use male condoms	16	15.8%	24	11.9%
Use female condoms	0	0.0%	1	0.5%
Other	35	35.0%	69	34.2%
Why did not take FC? (n = those not taking)	n = 29		n = 57	
Not sexually active (no need)	4	13.8%	12	21.1%
Believe it is too difficult to use	7	24.1%	20	35.1%
Partner objection/disapproval	2	6.9%	6	10.5%
Not available	5	17.2%	8	14.0%
Did not know about it	2	6.9%	0	0.0%
Other	15	51.7%	21	36.8%
Do you know another place you can get FC? (n = all)	n = 103		n = 214	
Yes	53	51.5%	85	39.7%
Of yes				
Hospital/Health centre/Clinic/Mobile clinic	35	64.8%	57	66.4%
Pharmacy	26	48.1%	46	53.5%
Kiosk	2	3.7%	5	5.8%
From a friend/work/other	0	0.0%	1	1.2%
Would you be willing to pay for FC?				
Yes	74	71.2%	151	70.9%
Average will pay (range 1–500 Ksh, mode 10,20, 50)		44.5		40.2
Should FC be made widely available in Kenya?				
Yes	94	90.4%	193	90.6%

Acceptance and intention to use female condom

Table 4 illustrates some of specific workings of the FIPM project intervention. In both clinic settings (VCT centres and FHOK), the majority of participants reported that counsellors did speak to them about FC. In Round 1, at the inception of the program, counsellors at VCT centres were less likely to talk with males than females about FC. In VCT centres, about 38 percent of males and 53 percent of females took the offered samples, while 100 percent of males and 98 percent of females in the FHOK site accepted them. The main reasons for not accepting FCs included: not sexually active, using another method, fear about partners' reaction, or simply unwilling to try the product. Those who took samples took an average of three to four pieces.

Table 4 Participants Who Were Offered FC, Those Who Took It, Intention to Use; by Site, Round, and Sex

	VCT SITES				FHOK CLINIC			
	Round 1[#]		Round 2[##]		Round 1[#]		Round 2[##]	
	M (n = 131)	F (n = 302)	M (n = 28)	F (n = 85)	M (n = 18)	F n = 50)	M (n = 15)	F (n = 41)
Did a counselor talk to respondent about FC2?								
% Answering yes	83.2	97.0	n/a	n/a	100.0	98.0	n/a	n/a
Respondent took FC2 samples?								
% Answering yes	38.5	53.2	n/a	n/a	100.0	95.9	n/a	n/a
% Answering 'was not offered'	7.3	3.8	n/a	n/a	0	0	n/a	n/a
Average number taken	3.36	3.97	n/a	n/a	3.22	3.80	n/a	n/a
% Took samples planning to use FC2	83.3	91.6	n/a	n/a	100.0	95.7	n/a	n/a
Reason did not take FC samples (% of those who answered no)	n = 59	n = 125			n = 0	n = 2		
Not sexually active	36.8	47.2	n/a	n/a	0	0	n/a	n/a
Afraid partners' reaction	19.0	12.0	n/a	n/a	0	0	n/a	n/a
Worry what others think	6.9	0.8	n/a	n/a	0	0	n/a	n/a
Don't like looks	6.9	16.0	n/a	n/a	0	100.0	n/a	n/a
Other	41.4	33.6	n/a	n/a	0	0	n/a	n/a
HIV risk reduction strategies used last month	n = 131	n = 302	n = 28	n = 85	n = 18	n = 50	n = 15	n = 41
% Was not sexually active	n/a	n/a	7.1	14.3	n/a	n/a	0	0
% Stayed with only one partner	n/a	n/a	28.6	23.8	n/a	n/a	60.0	73.2
% Used condoms every time	n/a	n/a	42.9	40.5	n/a	n/a	6.7	0
% Used condoms sometimes	n/a	n/a	42.9	31.0	n/a	n/a	60.0	70.7
% Reduced my number of partners	n/a	n/a	7.1	1.2	n/a	n/a	0	0
% None	n/a	n/a	0	2.4	n/a	n/a	0	0
% No response	n/a	n/a	0	0	n/a	n/a	0	0
% Other	n/a	n/a	10.7	2.4	n/a	n/a	0	0
Prior awareness of FC2	n = 131	n = 302	n = 28	n = 85	n = 18	n = 50	n = 15	n = 41
n (%) Yes heard about	110 (84.0)	225 (74.5)	n/a	n/a	12 (66.7)	37 (74.0)	n/a	n/a
n (%) of heard about who have seen FC	45 (41.3)	102 (45.5)	n/a	n/a	7 (58.3)	21 (56.8)	n/a	n/a
n (%) of seen who have used before	5 (10.9)	18 (17.6)	n/a	n/a	0	5 (23.8)	n/a	n/a

[#]Round 1 participants: unmatched data; [##]Round 2 participants: matched data; n/a = not asked

Knowledge, attitudes, and use of FC at Round 2

Table 5 examines knowledge, attitudes, and use of FC at Round 2. Reasons for not using FC included not being sexually active, partner objections, not liking the looks of it, or being unfamiliar with the product. However, those who did use FC reported

Table 5 FC Use and Experiences (matched sample, merged sites, Round 2, by sex)

	Round 2	
	M (n = 43)	F (n = 126)
Used FC2	38 (88.4%)	108 (85.7%)
Reasons why not used FC (n = not used)	**n = 5**	**n = 18**
Not sexually active	2 (40.0%)	11 (61.1%)
Afraid partner's reaction	2 (40.0%)	1 (5.6%)
Worry what others may think	0	0
Don't like the looks of FC	1 (20.0%)	0
Other	2 (40.0%)	9 (50.0%)
Partner objects	n/a	n/a
Believe it's too difficult	n/a	n/a
Not available	n/a	n/a
Didn't know about it	n/a	n/a
What made you/partner decide to use FC? (full n)	**n = 43**	**n = 126**
Counselor suggested	17 (39.5%)	50 (39.7%)
Novelty	16 (37.2%)	30 (23.8%)
Wanted protection against STI and HIV	32 (74.4%)	88 (69.8%)
Wanted protection against pregnancy	2 (4.7%)	11 (8.7%)
Wanted control and peace of mind	38 (88.4%)	101 (80.2%)
Only available option	2 (4.6%)	2 (1.6%)
Does not require male partner do anything	0	1 (0.8%)
Other	1 (2.3%)	5 (3.9%)
Number of FCs	**n = 43**	**n = 126**
Average number given last visit	3.5	4.3
Average number FCs used	2.9	3.5
Answering none left	24 (55.8%)	67 (53.2%)
Answering some left	16 (37.2%)	50 (39.7%)
Answering all left	2 (4.7%)	9 (7.1%)
FC used with whom? N = those who used FC	**n = 38**	**n = 108**
Used with regular partner?	34 (89.5%)	101 (93.5%)
Non regular partner?	8 (21.1%)	11 (10.2%)
How easy/difficult was it to use FC with your partner (among those used FC)	**n = 38**	**n = 108**
Very or somewhat easy	25 (88.7%)	65 (60.2%)
Somewhat or very difficult	17 (44.7%)	46 (42.6%)
How easy/difficult to get yr partner to agree use FC (n = those who used FC)	**n = 38**	**n = 108**
Very or somewhat easy	30 (70.0%)	57 (52.8%)
Somewhat or very difficult	12 (31.6%)	50 (46.3%)
Do you plan to use FC in the future?	**n = 43**	**n = 126**
Answering yes	39 (90.7%)	111 (88.1%)
Would you recommend FC to a friend?	**n = 43**	**n = 126**
Answering yes	38 (88.4%)	121 (96.0%)

doing so because of a counsellor's suggestion, a desire to try a new product, and/or wanting control and "peace of mind" (which was interpreted to mean protection against STIs/HIV and pregnancy). Most people took between three and four FCs, and had earlier used FC at least once or a few times (Round 1). Most had used with a regular partner, and reported it was "very or somewhat" easy to use, and to get the partner to agree to use it. Most participants in Round 2 reported "future intention to use" FC, and would recommend the product to a friend.

> *It's a good product for all women because it prevents pregnancies as well as STIs/HIV/AIDS.*
>
> Female group discussant

Another participant added that the FC was good for men too, because: *"If he moves out with other women, then I am not at risk of being infected."*

Some women suggested that married women should not use FC: *"Because when she's married she should be very disciplined, faithful and shouldn't use the female condom."*

In other words, some participants still associated using or carrying FC with unfaithfulness.

Many also stated that the unfamiliarity of FC made product use challenging at least initially.

> *The female condom was introduced just the other day…and they don't have the knowledge; even some are not aware of it so they need a lot of education about it.*

> *Even if you show a lady how to put that female condom into that model its not the same way she will go put it on herself. …she has to practice…on the methods of using this thing. Some will say that the outer ring sometimes slips when putting it on, so it's difficult using it correctly.*

The few participants who had reported using FC had used it with a regular partner, and stated that it was easy to use with them, and illustrated various successful negotiation strategies by which women could persuade their male partners.

> *We first agree as to why we are using it. … If it's family planning or protect ourselves from HIV/AIDS we still have to agree. So I would first wish to make him understand why I am opting for FC, then after that, if we agree upon why we should use it then we can go ahead.*

> *My husband doesn't stay with me, he stays far, so I fear him. When he comes to the house and he doesn't want to use a male condom I tell him that we too have ours here, and if using the male condom is a problem then lets use the female condom. At first he didn't want us to use the FC but now we have used it and we don't have any problem.*
>
> Female group discussant

Some male participants felt that men should initiate FC use:

> *I actually feel that a man should bring up the issue … there's a saying that 'the neck should not go beyond the head' … even if it's a female condom … I think I'm the one who's supposed to lead till the end.*

Further, some men indicated that they did not feel that a FC protected men: *"...when the lady uses a female condom and I don't then I feel like I am not protecting myself while the lady is protected. That's the big deal."*

At least two female participants reported that the noise was bothersome while using the FC. Some female and male users indicated that it was somewhat uncomfortable to carry and to use due to its large size.

Clients' willingness to pay for female condom

Table 6 examines willingness to pay. On average, participants appeared willing to pay between 20 and 40 KSh apiece, with women willing to pay somewhat less than men. Of the few participants who had sold their samples of FC, they reported selling them for between 20 to 30 Ksh apiece.

Table 6 Willingness to Pay (matched sample, by round and sex)

	Round 1		Round 2	
	M (n = 41)	F (n = 128)	M (n = 43)	F (n = 126)
Do you know a place other than here where you can get FC?				
n (%) answering yes	16	43	26	60
Of those answering yes above, number stating various sources	n = 16	n = 43	n = 26	n = 60
Hospital/Health centre/Clinic	7	24	12	30
Mobile clinic	1	3	0	1
Pharmacy	9	21	22	51
Kiosk	1	1	1	1
Friend	0	0	0	0
At work	1	1	3	1
Other (includes NGOs, chemist, supermarkets, VCT centres)	2	5	8	5
Would you be willing to buy FC (full sample)	n = 41	n = 128	n = 43	n = 126
n (%) answering yes	34 (82.9%)	109 (85.2%)	40 (93.0%)	112 (88.9%)
How much would you be willing to pay? (range: 3–300 Kenyan Shillings)	n = 41	n = 128	n = 43	n = 126
Average Kenyan Shilling	37.5	30.0	28.0	21.0
Did you give any FC away?	n = 41	n = 128	n = 43	n = 126
n (%) answering yes, gave away for free	n/a	n/a	7 (16.3%)	20 (15.9%)
n (%) answering yes, gave away for a fee	n/a	n/a	2 (4.7%)	3 (2.4%)
Average fee given for (range: 4 to 40) Kenyan Shillings	n/a	n/a	20.0	25.5
Do you think FC should be widely available in Kenya?	n = 41	n = 128	n = 43	n = 126
n (%) answering yes	40 (97.6%)	120 (93.7%)	42 (97.7%)	123 (97.6%)

Participants in focus group discussions also indicated that they would be willing to pay about 20 to 30 Ksh apiece, though they reported that kiosks were selling the product for over 100 Ksh each. The product itself appeared very popular when dispensed free in the workplace.

> *When re-stocked they don't take long before they are over, immediately some people carry as many as 10 to 20.*
>
> Worker who received free condoms in the workplace

Insights from workplace peer educators

Table 7 gives provider information from trained workplace peer educators. At Unilever there are a total of 27 peer educators (6 female and 21 male). Of them, 18 received training on FC, and 17 (14 male and 3 female) were interviewed. At Del Monte, out of a total of 40 peer educators, 16 received FC training, and 14 (2 male and 12 female), were interviewed. Most reported giving away FC samples for free to their employees. Many knew of other places to get FC, including hospitals/health centres, pharmacies, and 'other' (NGO offices, VCT centres). The majority of peer educators reported including discussion of FC in their peer education sessions, and had on average conducted 16 to 17 sessions in their workplace site since being trained in February 2008. Most agreed that FC was "very much" or "somewhat" integrated into their workplace programs, and "agreed or strongly agreed" that they could speak knowledgeably about it. They assessed that interest in FC at the workplace is increasing. Peer educators were unanimous in their position that they would recommend FC to friends, and reported that friends and others outside the workplace had asked them for information. Most had held information sessions on FC outside their workplace, including one-on-one talks, community groups, and other venues and events. Thus, the trained peer educators appear to have great potential for outreach and information dissemination on FC and related programming.

Focus group discussions (FGDs) in the workplaces indicated that though peer educators had played a large role introducing FC to potential users, product awareness was still low, and the printed promotional materials were of limited success. They were *"not striking enough"* opined one participant. Many participants reported that they had not recalled seeing the publicity flyers, and only a few could vaguely remember a message about *"protecting your family"*, though several could easily recall male condom slogans. Participants had various suggestions for improving public awareness of FC, including through church groups and through mass cell phone text messages. Participants suggested that males should also be targeted for awareness, as their co-operation was still important in using the FC. Participants also suggested that small shops, kiosks, health centres, midwives, would be appropriate outlets for FC for working class communities, compared to chemists/pharmacists which would appeal to somewhat better-off populations.

Most peer educators reported being willing to pay for FC, on average 23 to 45 Kenyan Shillings (men willing to pay somewhat more than women), and most believe that

others would be willing to pay for the product as well. Most report "willingness to use" in the future and were unanimous in their conviction that the product should be made widely available in Kenya.

Table 7 Workplace Peer Educators

	M (n = 16)	F (n = 15)
Did you give any of the FC away to anyone else?		
n (%) gave them for free	15 (93.8%)	14 (93.3%)
n (%) gave them for a fee	0	0
n (%) did not give any away	1 (6.3%)	1 (6.7%)
Do you know any other place to get the FC?	**n = 9**	**n = 11**
Hospital/health centre/mobile clinic	7 (77.8%)	12(93.3%)
Pharmacy	5 (55.6%)	3 (27.3%)
Kiosk	0	1 (9.1%)
Friend/work/other	1 (31.2%)	3 (27.3%)
How often do you mention FC in peer education sessions?		
Always	11 (68.8%)	10 (66.7%)
Sometimes	4 (25%)	5 (33.3%)
Never	1 (6.3%)	0
Is FC integrated into what you teach as a peer educator?		
Very much	5 (31.3%)	9 (60%)
Somewhat	10 (62.5%)	5 (33.3%)
Not at all / no response	1 (6.3%)	1 (6.7%)
"I feel confident that I can speak knowledgeably about FC."		
Strongly agree/agree	15 (93.8%)	15 (100%)
In your assessment, since the time FC was introduced in your site, is there interest in FC?		
Increasing	15 (93.8%)	15 (100%)
FC information to friends or others		
Would you recommend FC to a friend? n (%) Yes	16 (100%)	15 (100%)
Has friend/anyone outside work asked you re FC? n (%) Yes	13 (81.3%)	15 (100%)
Have you spoken to people in your community (outside workplace) re FC?	**n = 11**	**n = 14**
Of yes, where?:		
One-on-one	8 (72.7%)	13 (92.9%)
Community group	4 (36.4%)	10 (71.4%)
Other (church/school/family)	1 (9.1%)	5 (35.7%)
Willingness to pay for FC		
Are you willing to pay for FC? n (%) yes	16 (100%)	14 (96.8%)
How much are you willing to pay? (average; range 3–301 Kenyan Shillings)	45.9	23.2
Do you plan to use FC in the future?		
n (%) answering yes	14 (87.5%)	15 (100%)
Do you think FC should be made widely available in Kenya?		
n (%) answering yes	16 (100%)	15 (100%)

Knowledge and attitudes toward FC among study participants

Table 8 shows knowledge and attitudes toward FC among participants at VCT and FHOK sites, and from peer educators. Among participants who came for both rounds, some stereotyped attitudes, such as agreeing that carrying FC made it look like one is planning to have sex, mostly decreased between the rounds (65 percent to 23 percent among males and 45 percent to 23 percent among females) or using FC reduces sexual pleasure (39 percent to 18 percent among males and 26 percent to 25 percent among females). However, most aspects of knowledge of FCs did not change substantially, or in the direction expected, between rounds. For example, for "FC cannot be used at the same time as MC", the percent of those agreeing went from 65 percent to 81 percent among men, but 75 percent to 72 percent among females. Even among peer educators who had undergone intensive FC related training, some gaps in knowledge still remained.

Table 8 Knowledge and Attitudes toward FC: LVCT and FHOK Clients, and Worksite Peer Educators

	Matched sample, merged sites, merged rounds				Peer educators	
	R1 M	R1 F	R2 M	R2 F	M	F
	n = 41	n = 128	n = 43	n = 126	n = 16	n = 15
Attitudes toward FC (those agreeing with the following statements, n (%))						
You can get FCs when you need them	13 (31.7%)	54 (42.2%)	23 (53.5%)	61 (48.4%)	6 (37.5%)	10 (66.7%)
Carrying a FC makes it look as if one is planning to have sex	27 (65.9%)	58 (45.3%)	10 (23.3%)	30 (23.8%)	7 (43.8%)	5 (33.3%)
Using a FC reduces sexual pleasure	16 (39.0%)	34 (26.6%)	8 (18.6%)	32 (25.4%)	3 (18.8%)	0
As a relationship becomes more serious, a FC is no longer necessary	15 (36.6%)	39 (30.5%)	8 (18.6%)	18 (14.3%)	5 (31.3%)	2 (13.3%)
I would not try a FC until I heard from a friend that it	16 (39.2%)	41 (32.0%)	8 (18.6%)	26 (20.6%)	2 (12.5%)	2 (13.3%)
I would not try a FC until I received information about it from a health provider	33 (80.5%)	105 (82.0%)	32 (72.4%)	29 (23.0%)	9 (56.3%)	6 (40.0%)
I would try any kind of new protection once, but would have to like it to use it	27 (65.9%)	101 (78.9%)	35 (81.4%)	98 (77.7%)	13 (81.3%)	15 (100.0%)
Using a FC is a sign of not trusting your partner	7 (17.1%)	48 (37.5%)	5 (11.6%)	33 (26.2%)	2 (12.5%)	1 (6.7%)
Knowledge of FC (those agreeing with the following statements, n (%))						
FC is made from the same material as the male condom	25 (61.0%)	55 (43.0%)	24 (55.8%)	75 (59.5%)	8 (50.0%)	3 (20.0%)
FC cannot be used at the same time with the male condom	27 (65.9%)	96 (75.0%)	35 (81.4%)	91 (72.2%)	12 (75.0%)	9 (60.0%)
FC must be inserted immediately before sex	29 (70.7%)	84 (65.5%)	30 (69.8%)	87 (69.0%)	5 (31.3%)	5 (33.3%)
FC must be removed immediately after the man ejaculates	21 (51.2%)	96 (75.0%)	28 (65.1%)	97 (77.0%)	10 (62.5%)	10 (66.7%)
FC can be lubricated with water-based lubricant or K-Y Jelly	24 (58.5%)	60 (46.9%)	25 (58.1%)	83 (65.9%)	7 (43.8%)	11 (73.3%)
A man's penis does not need to be erect to use the FC	5 (12.2%)	42 (32.8%)	7 (16.3%)	32 (24.4%)	3 (18.8%)	4 (26.7%)
There are two rings in FC	3 (7.3%)	115 (89.8%)	41 (95.3%)	125 (99.2%)	16 (100.0%)	13 (86.7%)
One FC can be used more than once for sexual intercourse	13 (31.7%)	35 (27.3%)	10 (23.3%)	32 (25.4%)	6 (37.5%)	5 (33.3%)
FC is longer than the male condom	30 (73.2%)	95 (74.2%)	31 (72.1%)	108 (85.7%)	11 (68.8%)	7 (46.7%)

Female condom uptake at VCT centres

Table 9 shows client data and FC uptake from the four LVCT centres in the three months (April through June 2008) covered by the data collection period of the study. Males and females are comparable in number. Not all clients who come to the services leave with FC. As might be expected, the number of females taking FC is greater than males or couples. The *number of people* taking FCs, and the *average number of FCs taken increased* over a three-month time period, though a clear trend cannot be discerned.

Table 9 Client Data and FC Uptake from LVCT Centres April – June 2008

Clients seen	M	F	Couples	Number of males who took FCs	Average number of FCs taken by males	Number of females who took FCs	Average number of FCs taken by females	Number of couples who took FCs	Average number of FCs taken by couples
April									
Hurlingham	178	298	86	5	3	53	2	6	3
Sokoni	209	196	83	6	2	19	3	5	2
SUPKEM	134	126	35	7	6	9	7	1	5
Githurai	264	265	115	6	6	18	5	3	6
May									
Hurlingham	487	434	73	2	5	20	3	7	4
Sokoni	309	266	84	10	4	41	4	8	5
SUPKEM	231	215	31	11	5	13	5	2	8
Githurai	232	258	118	10	8	56	7	15	4
June									
Hurlingham	369	278	173	10	3	56	5	20	4
Sokoni	261	250	74	16	4	36	5	9	5
SUPKEM	191	127	39	38	3	56	4	6	5
Githurai	487	351	97	22	5	59	6	18	7

CONCLUSIONS

Across three unique and significantly different service environments, FC appears to be an acceptable product as indicated by near-uniform willingness to recommend the it to others, and almost unanimous agreement that FCs should be made widely available in Kenya. Almost all participants who took the samples said they intended to try them, and a high percentage (87 percent) did indeed do so. Almost all were willing to pay for FC, though at rates (Ksh 20 to 40 on average) substantially lower than current market prices. On the other hand, some did not and were not willing to try the product, for a variety of reasons ranging from not needing such a method, to fear of partner's reaction, or being put off by its appearance.

However, across sites there were substantial gaps in knowledge about FC. Most clients had not heard of the product, and among those who had heard of it few had seen one and even fewer had ever used one. At baseline there were several gaps in knowledge and mixed attitudes toward the product, which improved over time but not uniformly.

Information and supply factors are critical to effective FC promotion. The comprehensive training of peer educators and counsellors, along with incorporation of FC into service protocols, encouraged providers to recommend the product to clients. This, along with the readily available (and free) supply, boosted clients' willingness to try the product.

Most users responded to providers' suggestion that they try the product and to the notion of trying something new. Clients appreciated the dual purpose of FC, that is, protection against STIs/HIV *and* pregnancy, thereby helping them gain "peace of mind". Further, the study suggests that sufficient free or low-cost supply of the product (implying clear supply chains) across a variety of settings will enhance FC access.

RECOMMENDATIONS

The female condom landscape is marked by many acceptability studies, numerous projects, and some attempts at commercialization, but current efforts appear fragmented. This study indicates that there is interest in the FC among diverse populations of women and men, particular those who perceive themselves to be at risk of STIs, including HIV. Commitment to procurement, supply, logistics, training and comprehensive programming is needed from decision-makers at all levels.

- To improve utilization, there is need for a consistent supply of affordable female condoms as well as BCC materials to inform and educate both potential users and providers. To facilitate demonstration, female pelvic models should be made available to service delivery sites.

- Provider bias against FC, which arises partly from lack of awareness, should be addressed. Providers need to be adequately trained and orientated on the FC so that they are able to confidently demonstrate it to clients, provide accurate information and counselling, and support its use.

- Female condoms would benefit from strategic promotion and marketing using a range of approaches, including social marketing, behavior change techniques, and demand generation.

- Adoption and use of the FC involves a "learning curve" and often requires multiple efforts to comfortably use the product. Both product specific

information is needed, as well as addressing issues such as "body-esteem", sexuality, and communication and negotiation skills.

- Though the FC is a female-initiated product, and is primarily targeted at women, successful uptake and use necessitates engaging men as partners.

- There should be realistic expectations about product adoption. The female condom could be positioned within the context of comprehensive condom programming (CCP) as an additional option for those needing protection from pregnancy and/or STIs. It should be considered as an additional option, thereby increasing the likelihood that some protective method will be adopted.

- Convening stakeholders across the sexual and reproductive health (SRH) and HIV/AIDS communities to develop a national strategic plan would be beneficial. A unified policy and strategy would ensure sustainable and reliable supply, promote training and outreach, and enhance greater awareness—and ultimately use—of FC in Kenya.

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