# Kyaterekera Project: A Combination Intervention Addressing Sexual Risk-Taking Behaviors Among Vulnerable Women in Uganda

## Baseline Report 2019-2020







## **Kyaterekera Project: A Combination Intervention Addressing Sexual Risk-Taking Behaviors Among Vulnerable Women in Uganda**

## Baseline Study Report (2019-2020)

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#### **ACKNOWLEDGEMENTS**

The research reported in this publication was supported by the National Institute of Mental Health (NIMH), under award number R01MH116768 (MPIs: Fred Ssewamala, PhD & Susan Witte, PhD).

The authors are grateful to the research staff and volunteers at the International Center for Child Health and Development (ICHAD) in Uganda and at the Brown School at Washington University in St. Louis, Columbia University in New York, New York University and University of Carolina at Chapel Hill. More specifically, we are grateful to the Study Field Team in Uganda led by Joshua Kiyingi and Josephine Nabayinda (both Co-authors on this report) for managing the study implementation. We would also like to thank our in-country implementing and collaborating partners: Reach the Youth Uganda (RTY), Rakai Health Sciences Program (RHSP), TASO Masaka, the Uganda Ministry of Health, the District Health Officers—across the seven geopolitical districts where the study is taking place, the Site Coordinators, the Community Collaborative Board (CCB), and the Data and Safety Monitoring Board (DSMB). Each of these partners and individuals have supported the Kyaterekera Project at various stages of its conceptualization, design and implementation.

We would also like to thank the financial institutions in Uganda, specifically, Equity Bank and Stanbic Bank that agreed to work with the participants in opening up savings accounts and conducting financial literacy sessions.

Special thanks go to each of the 542 women who agreed to participate in the Kyaterekera Project.

#### Disclaimers:

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Cover Photo: Kyaterekera Project Members of the Community Collaborative Board

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#### 1. EXECUTIVE SUMMARY

This report presents the baseline (pre-intervention) survey data from the Kyaterekera Project. The Kyaterekera Project is a five year (2018 – 2023) longitudinal randomized control trial that examines ways of addressing sexual risk-taking behaviors among women engaged in sex work (WESW) in Uganda. Specifically, the study tests the additive contributions of savings-led microfinance beyond traditional HIV Risk Reduction (HIVRR) alone in decreasing biologically confirmed STIs, including HIV, improving high-risk behavioral outcomes, while concurrently reducing income from sex work. A total of 542 WESW who met the inclusion were enrolled into the study and they all completed screening and baseline interviews. Data was collected via a multidimensional survey instrument, which combines existing evidence-based measurement tools, as well as adapted scales and questions developed specifically for WESW.

The following are highlights of the key findings from the baseline survey data:

- **Demographics:** We captured several respondents' demographic characteristics. The average age was 31 years (18-55 years). Half of respondents (50%, n=272) were divorced and 8.49% (n=46) were married. Over one third of respondents (38.3%, n=208) dropped out of school before completing primary 7, mainly due to inability to pay for school-related fees. On average, respondents had lived in their current household between 10 months to 4 years. The average number of people in the household was 3.6 (range = 1-18), with about 2 children below 18 years (range = 1-10). About 5.17% (n=28) of respondents reported to have experienced homelessness in the past 30 days.
- Community Background: Most respondents lived within walking distance of their place of employment (82.8%, n=449) and a medical facility (77.3%, n=419). About 21.2% (n=115) reported having a bank within walking distance from their current residence. In addition, 43.4% (n=235) of respondents reported that it was "not easy at all" to find employment within 2kms of their current residence and 26.4% (n=143) reported that it was "very easy" to find employment. Respondents reported moderate levels of community satisfaction as measured the Multidimensional Student's Life Satisfaction Scale (mean 26.7, SD=5.6, range =12-40).
- Family Relations: Family cohesion was measured using 7 items that assess the degree of commitment, help, and support that family members provide to one another, on a 5-point Likert scale, with 1=never and 5=always. The average score was 24.5 (SD=7.0, range = 7-35), indicating moderate levels of family cohesion. High scores were reported on items related to love from family members, family closeness, including doing things together as a family and spending free time with each other.
- Social Support: In addition to family relations, respondent's perceived social support was measured using 12 items from the Multidimensional Scale of Perceived Social Support. Responses were rated on a 7-point scale with 1=very strongly disagree and 7=very strongly agree. The average score was 57.5 (SD=17.7, range = 12-84), indicating moderate levels of

perceived social support. Items rated highly were those related to "having a special person with whom they could share their joys and sorrows", "having a special person who was a real source of comfort to them" and "ability to talk about problems with their family."

- The 16-item scale measures equity and power within intimate relationships on issues related to attitudes towards gender roles and expectations, decision-making around sex, reproduction, household decision making, violence and communication. At baseline, respondents exhibited negative gender norms related to relationships, such as "men needing more sex than women do", "it should be a woman's responsibility to avoid getting pregnant", and "a man should have the final word about decisions in the home". On the other hand, respondents also agreed that on more gender equitable issues such as a couple deciding together to have children and type of contraceptive to use and sharing household chores.
- Family Socioeconomic Status: Respondents' relative level of poverty, including financial distress, household assets, employment and household finances were assessed. Over half of respondents reported not having enough money to buy food (51.5%, n=278) and clothing (57%, n=309) *many times*. In addition, 39.1% (n=212) could not afford rent and 42.7% (n=231) could not afford to pay for medical expenses, *many times*, in the last 3 months. In terms of household assets, 61% (n=331) of respondents' families owned their own homes, 29.5% (n=160) owned a piece of land, and (41.8% (n=227) owned a small retail business. At baseline, 23% (n=128) of respondents were currently engaged in paid work, and 72% (n=391) reported being the main source of income in their households. The average total monthly income for respondents' entire household was ~329,405/= Uganda shillings (~\$90 USD). On average, respondents reported 203,088/= Uganda shillings (~\$56 USD) of their monthly income coming from sex work.
- Savings Attitudes and Financial Self-Efficacy: Respondents were asked several questions regarding their saving behaviors, attitudes and financial self-efficacy. At baseline, 48% (n=260) of respondents reported that they had money saved. Respondents placed significant importance on saving for specific goals, including personal development, family use or family business (mean = 22.55, SD = 2.3, range = 5-25), and rated highly their confidence in the ability to save for these goals (mean = 20.9, SD = 4.5, range = 5-25). In addition, respondents were assessed on their abilities to achieve their specific financial goals, on a 5-point Likert scale, with 1=not confident at all and 5=extremely confident. The overall mean score was 15.5 (SD=4.0, range = 4-20) indicating higher levels of financial self-efficacy. Respondents rated highly their abilities to achieve all their goals of becoming financially secure, building savings, paying off debts and obtaining adequate employment.
- Sex Work Survival: Respondents were asked several questions related to sex work, including duration of engaging in sex work, number of customers in the past 30 days, how often they use a condom, and the possibility of securing other employment other than sex

work. The mean age at which respondents engaged in sex work for the first time was 24 years (range= 8-51 years). The duration of engaging in sex work ranged between 1 month to 35 years. About 16.2% (n=88) reported having a boss or manager and 61.9% (n=336) reported working alongside other men and WESW. On average, respondents engaged in sex work for about 5.8 days a week, and primarily exchanged sex for money, food, transport and clothes among others. Regarding condom use, 21.9% (n=119) of respondents reported using condoms "always", and 3% (n=17) reported that they "never use condoms." Over half of respondents (58.3%, n=316) reported being offered more money, goods, or extra services not to use a condom. Of the total sample, 14.2% (n=77) stated that their main partner knew that they are engaged in sex work, and 77% (n=418) indicated that they could secure other employment other than sex work and earn as much money.

- Sex Worker Stigma: Stigma was assessed using items from the Sex Worker Stigma Index. Respondents were assessed on their thoughts about other people's reactions once they found out that they were engaged in sex work. Responses were rated on a 4-point scale, with 1= strongly disagree and 4 = strongly agree. The overall mean score was 29.8 (SD= 7.7, range = 10-40), indicating moderate levels of sex worker stigma. Respondents were more concerned that people would think they are immoral, and would be treated differently by family members, or would be hit by a husband/partner if they found out.
- Arrest History. Respondents were asked if they had ever been arrested, the reasons for their arrest, ever been charged in court, and whether they had been arrested in the past 30 days. At baseline, 24.9% (n=135) of respondents reported that they had ever been arrested. The mean age at which they were arrested was 26.6 (SD=6.6, range 14 47). The most common reason for getting arrested was sex work (40%, n=54). Only 4% (n=24) reported that they were charged in court with a criminal offense following their arrest. About 2.9% (n=16) of respondents had been arrested in the past 30 days.
- **Gender-Based Violence:** We assessed respondents' domestic violence attitudes, experiences of intimate partner violence and economic abuse. Over half of respondents thought it was OK for a husband to hit his wife for various reasons, including going out without telling him (64.8%, n=350), failure to care for her children properly (63.6%, n=354), or if wife refuses to have sex with him (59%, n=320). Regarding intimate partner violence, 67.3% (n=365) of respondents had been called insulting names and had their property destroyed, 60.7% (n=329) had been forced to have sex without a condom, and 53.8% (n=292) had been forced to have sex against their will. Related to economic abuse, respondents rated highly items related to being asked for money by both an intimate partner or a family member, and intimate partner keeping financial information from them.
- Condom use Self Efficacy: Respondents were assessed on their confidence in using condoms with a sexual partner. The 8-items were rated on 3-point scale, with, 1=very confident and 3=not at all confident. The overall mean score was 19.0 (SD=4.7, range 8-24)

indicating moderate levels of condom use self-efficacy. In addition, respondents were asked questions related to condom use communication with an intimate partner about condom use. Responses were rated on a 5-point scale, with 1 = Definitely no and 5 = Definitely yes. The average mean score was 24.8 (SD= 7.5, range = 7-35), indicating moderate levels of condom use communication self-efficacy with an intimate partner.

- Alcohol and Drug Use: About 75.2% (n=408) of respondents had ever used alcohol, and 63.1% (n=342) reported using alcohol in the past 30 days. On a daily basis, 8.3% (n=45) reported inability to stop drinking once they started. On a weekly basis, 5.9% (n=32) of respondents failed to do what was normally expected from them because they were drinking, and 19% (3.5%, n=19) were unable to remember what happened the night before. About 19.1% (n=104) reported ever using stimulants, with 13.6% (n=74) using in the past 30 days. Only 2 respondents had ever injected drugs.
- Childhood Sexual Abuse: We assessed respondents' childhood sexual experiences with an adult. More than half of respondents (66.2%, n= 359) reported being touched or fondled in a sexual way by an adult, 63.4% (n=344) reported someone touching their body in a sexual way, 43.7% (n=237) reported someone attempted to have sexual intercourse with them, and 39.3% (n=213) reported that an adult actually had sexual intercourse with them.
- HIV/AIDS and Stigma: Respondents demonstrated knowledge of the most unsafe and highrisk behaviors for HIV transmission, including having unprotected sex (95.9%, n=520), and sharing a needle with an HIV positive person (93.0%, n=515). However, respondents also rated some behaviors which are considered safe, as unsafe. For example, 56.2% (n=305) reported that kissing an HIV positive person is risky, and 28.6% (n=155) reported that touching a toilet seat that an HIV positive person has touched is unsafe. In addition, respondents agreed to statements related to discussing HIV testing (67.9% n=368), using condoms (84.3% n=457), and talking to a sexual partner about the personal risk of HIV (75.85 n=411). Finally, items measuring HIV-related stigma were adapted from the HIV Stigma Scale. Respondents were asked to indicate how true each statement was on a 4-point scale, with 1=Strongly Disagree and 4=Strongly Agree. The average mean score was 13.1 (SD= 2.71, range = 6-24) indicating moderate levels of HIV-related stigma.
- HIV Testing and Medication Adherence: At baseline, 98.7% (n=535) of respondents reported that they had been tested for HIV. Of these, 35.4% (n=192) had received a positive test result, and 34.3% (n=186) were already enrolled on ART. Among those enrolled on ART, 58.4% (n=111) had not missed any of their medication in the past 30 days, 52.3% (n=100) reported that they had done an "excellent job" of taking their medication, and 63.3% (n=121) reported that they "always" took their HIV medicine as prescribed
- **Pre-exposure prophylaxis (PrEP):** Prior to study enrollment, 59% (n=320) of respondents had heard about PrEP, and of these, 19.7% (n=63) had received a PrEP prescription. When

asked whether PrEP should be promoted among WESW, 76.9% (n=246) of respondents stated that it *absolutely should be* promoted, and 60.1% (n=326) indicated that they would be willing to suggest their friend accept it. In addition, respondents reported positive attitudes toward PrEP use (mean = 16.4 (SD =4.9, range = 4-20). For respondents who were unwillingness to use PrEP, reasons included worries about side effects, objections from customers, and discrimination by others. Overall concerns about PrEP included side effects, convenience of acquiring and taking drugs, as well as its effectiveness.

- Personal Health and Biomarker Data: Respondents were generally satisfied with their life. About 52.7% (n=286) were "extremely satisfied" with their life, and 23.4% (n= 127) rated their physical health as "excellent." In addition, all respondents provided blood, urine and vaginal swab specimens to test for common bacterial and viral STIs, including HIV. At baseline, 7.38% (n=40) of respondents tested positive for Trichomonas, 2.58% (n=14) tested positive for chlamydia, 1.29% (n=7) tested positive for Gonorrhea and 40.5% (n=220) tested HIV positive. All respondents with a positive STI diagnosis received treatment. Those who tested HIV positive were initiated on ART, if they were not already enrolled.
- Mental Health Functioning: Respondents reported moderate levels of depressive symptoms (mean = 10.9, SD=4.9, range = 6-30), as measured by the Brief Symptoms Inventory (depression subscale), and moderate levels of post-traumatic stress (mean =13.7, SD= 5.8, range 6-30) as measured by the abbreviated Post-Traumatic Stress Disorder Checklist.
- Access to Medical Care: Respondents' ability to access medical care in the past 12 months was assessed using 6-items, rated on a 5-point scale with 1 = Strongly Agree and 5= Strongly Disagree. The overall mean score was 16.7 (SD= 4.5, range = 6-29), indicating moderate levels of access to medical care. Barriers to getting the needed or recommended medical care included inability to pay (69.9%, n=379), not sure where to go (46.8%, n=254), not having transportation (62.5%, n=339), and clinic hours not being convenient (48.8%, n=265).

Overall, the baseline survey data illustrates how respondents currently view themselves, their families and communities, as well as their social, economic and health wellbeing. These baseline data act as benchmarks from which change will be measured, at 6, 12, 18, and 24-months-post intervention, between the usual care and treatment conditions.

#### 2. KYATEREKERA PROJECT: INTRODUCTION AND RATIONALE

A systematic review of the HIV burden among women engaged in sex work (WESW) in 50 low-and middle-income countries found that they had increased odds of HIV infection relative to the general female population [1]. In Uganda, a study among WESW in Kampala, found HIV prevalence to be as high as 37%, with significant presence of other STIs including Gonorrhea (13%); Chlamydia (9%); Trichomonas (17%); and bacterial vaginosis (56%) [2]. In more rural regions and HIV "hot spots" including those targeted by the Kyaterekera study, the prevalence of HIV among WESW is as high as 61% [3]. While WESW in Uganda have long been the subject of surveillance studies, few have been targeted for innovative and sustainable prevention intervention approaches despite calls from scientists in the region [4].

Social structural factors play a crucial part in shaping risks of STI/HIV infection among WESW and their clients in Uganda including their work environment, violence, stigma, cultural issues, [5-9] and criminalization of sex work [10]. Poverty is the most commonly cited reason for involvement in commercial sex work in Sub Saharan Africa (SSA) [11-14]. In Uganda, with disproportionately higher rates of poverty and unemployment among women [15], transactional sex is a survival strategy [16,17]. As such, a growing body of evidence suggests that HIV prevention interventions must address risk factors beyond the individual level to be effective [18,19]. Gender inequalities in particular have affected women's social, economic and political opportunities, keeping them significantly more disadvantaged than their male counterparts [9,10, 20, 21]. Women engage in high-risk sex for economic survival, and perceive their acts as a strategy to improve their socioeconomic well-being [22]. As in other locations, WESW in Uganda are offered at least twice as much money for unprotected sex [23, 24]. The economic advantage of higher risk sex in the face of high HIV prevalence and public health imperative suggests a need for structural interventions offering alternative forms of income for WESW.

Microfinance (MF) programs constitute one of the fastest growing anti-poverty strategies in developing countries [25]. MF interventions lead to reductions in sexual risk behaviors among poor women and those engaged in sex work [17, 26-30]. MF interventions in Kenya and South Africa report reductions in the numbers of sex partners and higher consistency in condom use, [31] improved HIV-related communication, increased voluntary counseling and testing and a decrease in unprotected sex [32] However, there are important limitations to a MF approach that focuses specifically on microloans, particularly for poor women who experience intersectional marginalization due to their sex work [33-35]. As such, savings-led approaches that enable participants to accumulate assets faster and pay for life-cycle events without accumulating debt and an over-reliance on borrowing are critical [35].

Uganda has a large and growing number of WESW, yet access to targeted EE opportunities, including skill-based HIV prevention strategies for WESW, is limited. Against this background, the Kyaterekera study examines ways of addressing sexual risk-taking behaviors among WESW in Uganda. Specifically, the study tests the impact of adding economic empowerment components to traditional HIV risk reduction (HIVRR) to reduce new incidence of STIs and of HIV among

WESW. It targets WESW at greatest STI risk -those who operate at the low end of the market, most often street-based, and typically poorer than WESW based in the capital city [15]. It offers study participants access to an evidence-based HIV prevention intervention with a savings and a skills-based Financial Literacy (FL) component. These components are informed by Behavioral Economic (BE) principles (i.e., delay discounting, information salience, economic utility, and loss aversion) that target economic motivations of sexual risk behaviors.

This report is based on baseline data collected between June 2019 to March 2020, from 542 women participating in the Kyaterekera study, a 5-year (2018 – 2023) longitudinal randomized clinical trial funded by the National Institute of Mental Health (NIMH, Grant #R01MH116768 (MPIs: Fred Ssewamala, PhD & Susan Witte, PhD).

#### 3. KYATEREKERA PROJECT: OVERVIEW AND METHODOLOGY

The Kyaterekera study is guided by Social Cognitive [36, 37], Asset theories [38,39] as well as Behavioral Economics (BE) principles. Social Cognitive Theory [36] (SCT) has guided many HIV prevention studies. The central tenets of SCT, including self-efficacy and outcome expectancies, are measured in this study for both paying and intimate partners. Self-efficacy, for example, have been found to affect whether people consider changing their behavior, the degree of effort they invest in changing, and long-term maintenance of behavior change [40]. Self-efficacy with respect to negotiating and using condoms with partners –intimate or paying– has been found to be a strong predictor of condom use [41,42] and is often found in conjunction with empowerment in sexual relationship decision making [43]. The EE components for the proposed study have been adapted to integrate self-efficacy with outcome expectancies related to building financial literacy, vocational knowledge, and business development skills.

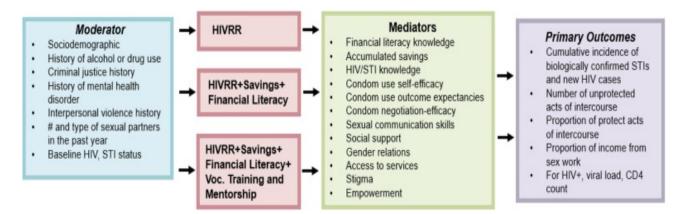
In addition, asset theory recognizes that there may be psychological, behavioral and social asset improvements in mediators for the three study arms, e.g., condom negotiation self-efficacy, social support, access to services. While all the groups may receive psychological, behavioral and social benefits, the HIVRR+S+FL and HIVRR+S+FL+V groups include planned accumulation of monetary and financial assets (e.g., personal savings and personal savings plus financial literacy training and mentorship) which may reinforce their psychological and behavioral mediators in a mutual manner yielding risk reduction increases above and beyond that of the HIVRR condition.

The Kyaterekera study will test the impact of adding economic empowerment components to traditional HIV risk reduction (HIVRR) to reduce new incidence of STIs and of HIV among WESW. The study arms are: 1) a control arm comprising HIVRR sessions provided by community health workers; 2) treatment arm 1 that includes HIVRR, combined with receipt of a matched savings account (S) and financial literacy (FL) with integrated behavioral economics principles (HIVRR+S+FL); and 3) treatment arm 2 that includes HIVRR, combined with a matched savings account, plus financial literacy with integrated BE principles, and Vocational Skills Training and Mentorship sessions (V) (HIVRR+S+FL+V). The specific aims of the study are:

- 1. To examine the impact of a financial savings-led microfinance intervention using HIVRR+S+FL and HIVRR+S+FL+V on HIV biological and behavioral outcomes in WESW using an RCT.
- 2. To examine intervention mediation and effect modification.
- 3. To qualitatively and quantitatively examine implementation in each study condition.
- 4. Assess the cost and cost-effectiveness of the HIVRR+S+FL and HIVRR+S+FL+V intervention compared with traditional HIVRR.

The mechanisms of change through which the intervention is hypothesized to impact women's outcomes are presented in figure 3.1 below.

Figure 3.1 Kyaterekera Project Conceptual Model



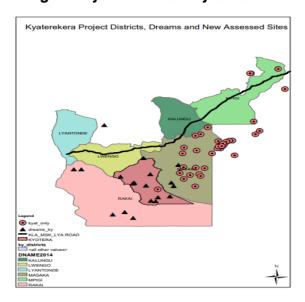
#### Sample and Setting

A total of 542 self-identified WESW (18 years and above), were recruited from 19 comparable HIV hotspots located in Rakai, and the Greater Masaka region. In Uganda, the HIV prevalence among 15 to 49-year-olds is 7.2%, with Rakai (9.3%) and Masaka (12%) reporting a higher prevalence [44]. Overall HIV prevalence is 12 times higher among WESW compared to the rest of the adult population, with HIV prevalence among WESW in Rakai and Masaka regions as high as 61% [45]. Women were eligible to participate if they: 1) were at least 18 years old; 2) report having engaged in vaginal or anal intercourse in the past 90 days in exchange for money, alcohol, or other goods; and 3) report at least one episode of unprotected sexual intercourse in the past 90 days with either a paying, casual, or regular sexual partner. Identified HIV hotspots were randomly assigned using a block randomization approach to one of the three study conditions, such that all women from the same hotspot will be assigned to the same study condition. Figure 3.2 and 3.3 shows the study region in Uganda.

Fig 3.2. Map of Uganda



Fig 3.3. Kyaterekera Study Sites



#### **Recruitment and Selection**

The Kyaterekera study utilized multiple recruitment strategies informed by our pilot studies in Mongolia and Uganda [46-48, 49-56]. Specifically, we relied on 1) recruitment by the ICHAD's staff trained in human subjects' protocols and who had worked with vulnerable populations; and 2) asking eligible women to refer other women from the same hotspot who may also be engaged in sex work. Potential participants were identified and invited for a meeting with the research staff. During the meeting, the women were informed verbally and in writing, the purpose of the study, voluntary participation, extent of their participation, risk and benefits, as well as protection and confidentiality issues. The women signed the informed consent form. Details on recruitment, consent, and enrollment are shown in Figure 3.

Sites identified (N=7 Geopolitical **Districts** Site identification Sites: 84 were identified and assessed. Combined into 44 sites based on location and proximity to each other. Sites randomised Randomisation Sites: n=33 Control Arm (HIVRR): Treatment 1 Arm Treatment 2 Arm Sites: n=11(HIVRR+S+FLT): (HIVRR+S+FLT+V): Sites: n=11 Sites: n=11 Screened, recruited & completed baseline before COVID-19 Treatment 1 Arm Treatment 2 Arm Control Arm (HIVRR): (HIVRR+S+FLT): (HIVRR+S+FLT+V): Sites: n=7Sites: n=6 Sites: n=6Screened: n= 322 Screened: n=337 Screened: n=231 >>> Recruited & completed Recruited & completed Recruited & completed baseline: n=186 baseline: n=213 baseline: n=143

Figure 3.4 Kyaterekera Baseline Consort Flow Diagram

#### **Study Design and Intervention Description**

The Kyaterekera study examines ways of addressing sexual risk-taking behaviors among women engaged in sex work (WESW) in Uganda. Specifically, this three arm-cluster randomized control trial tests the impact of adding economic empowerment components to traditional HIV risk reduction (HIVRR) to reduce new incidence of STIs and of HIV among WESW in Rakai and the greater Masaka regions in Uganda. Randomization was conducted at the site level/HIV hotspot to minimize cross-arm contamination. Study sites were randomly assigned to three treatment conditions (n=16 sites, 330 WESW per condition). The study arms are: 1) Control arm receiving HIVRR; 2) Treatment arm 1 receiving HIVRR+S+FL, and 3) Treatment arm 2 receiving HIVRR+S+FL+V.

#### Control Arm -Bolstered Standard of Care

Participants in the control condition (and in the two treatment arms) will receive 4 sessions of HIVRR (described in Figure 3.5) of an evidence-based HIV/STI risk reduction intervention tested in three previous studies by Witte [46-48]. The sessions will be provided twice per week. During session 3, linkage to PrEP and ART/medication adherence skills will be provided.

#### Figure 3.5. HIVRR Session Content

#### **HIVRR Session 1**

1(a) Engage participants; 1(b) describe purpose of Kyaterekera; 1(c) define harm reduction; 1(d) set ground rules and discuss confidentiality; 1(e) develop increased comfort and ability to talk about sex; 1(f) identify reasons to make safer choices to reduce risk behaviors; 1(g) establish usefulness of social support network and identify positive/negative supports; 1(h) identify community resources; 1(i) describe reasons for and process of goal setting for risk reduction

#### **HIVRR Session 3**

3(a) Learn importance of safer sex negotiations and acquire skills for safer sex negotiations; 3(b) introduce Straight Talk using SAFE method and Alternative Safe Refusal Skills; 3(c) role play communication and potential strategies to negotiate safer sex with intimate and paying partners; 3(d) promote adherence to HIV medication including PrEP, PEP and ART; 3(e) set and monitor appropriate risk reduction goals

#### **HIVRR Session 2**

2(a) Correct myths and facts about how HIV/STIs are spread; 2(b) describe symptoms, transmission risks and testing procedures for different STIs, including HIV; 2(c) identify personal risks for HIV and other STIs; 2(d) build enthusiasm for condom use; 2(e) demonstrate male and female condom use; 2(f) introduce alternatives to unsafe sex; 2(g) set and monitor appropriate risk reduction goals

#### **HIVRR Session 4**

4(a) Build skills to recognize and understand consequences of abusive behavior by any sexual partners or others; 4(b) build skill to make a safety plan for working with paying partners; 4(c) review communication skills; 4(d) review and identify ways to increase support from social network; 4(e) build skills in communication with health care professionals; 4(f) develop future risk reduction plan

#### Treatment Arm 1: HIVRR+S+FL

Participants in this arm will receive HIVRR sessions (Figure 3.6.), financial literacy training (described in Figure 3.7.) and will also save money in their matched savings accounts (described below). The study team will monitor the accounts using the statements received directly from the banks holding the accounts. Participants will receive monthly bank statements indicating their savings and the associated match.

#### Treatment Arm 2: HIVRR+S+FL+V

Participants in this arm will receive the 4 HIVRR sessions (described above). Next, they will receive the Savings (S) session and 7 Financial Literacy (FL) sessions provided twice a week, followed by 8 Vocational Skills Training and Mentorship sessions (V) sessions supporting the transition to vocational, educational training, employment or business development, and receipt of a matched savings account to be used on short-term and/or long-term consumption and skills development per participants own discretion/choice.

Matched Savings (S) Individual Development Account (IDA). IDA is a savings account held at a local bank whereby deposits made by the woman are matched by the intervention to encourage savings and investment in skills and asset development. The accounts introduce women to financial management skills, introduce them to formal financial institutions, and by matching their deposits, incentivize women to save small amounts. Each woman assigned to either treatment group receive an IDA held in her name. Women will be allowed and indeed

encouraged to contribute up to 80% of the total incentives received from their participation in the study. This would include money received from the 4 HIVRR sessions +7 FL sessions +8 V sessions. The savings will be matched during the month they receive the incentives. Depending on the study condition, the maximum amount of a woman's contribution to be matched (the match cap) will be an equivalent USD 15 per session of HIVRR + S+FL; or HIVRR+ S+FL+V. Each month during the intervention period an account statement will be generated for each woman to note her accumulated savings (own savings plus the match). Monthly statements act as "morale boosters". During the intervention, women will have direct access to both their personal savings deposited in the accounts and the match provided by the study. This added unconditional component provides women with a safety net to address short-term consumption needs and financial emergencies if they arise.

**Financial literacy.** Adapted for testing with WESW in Undarga [47, 57], this widely translated evidence-based Financial Education Core Curriculum [58] addresses the importance of savings, banking services, budgeting (including household budget development), and debt management. The BE content is focused on encouraging uptake of safe sexual and income-earning practices, including but not limited to delaying small immediate awards (higher pay for unprotected sex) for larger awards long-term (e.g., benefits to sexual health or alternative forms of employment); replacing/ exceeding income lost from unprotected sex – economic utility; and considering individual economic costs (such as disease burden, lower productivity, stigma) of losing good sexual health through unsafe sex.

Figure 3.6. Financial Literacy Intervention Content

	Content	
Session#		
1	Banking: Explore Common Perceptions about Banks and share personal banking	
	experiences; Evaluate why a bank is better than a "piggybank", "under the pillow" or	
	"mattress account"; Introduction to local financial institutions and opening bank accounts;	
	Safety and safety planning	
2	2 Savings and Financial Goal Setting: Defining savings and why people save; Identifying	
	challenges to savings; Setting savings goals related to family and vocation; personal	
	financial goal settings	
	Budgeting and Financial Planning: Examine Money Management and Balancing a	
3-4	Budget; Set Financial Planning Goals; Describe Importance of Budgeting; Staying within	
	budget and cut spending.	
5	Debt Management: Borrowing Money: Things You Need to Know; Managing Loans ar	
	Debt; Costs of Borrowing; Delinquency: What Is It and How Does It Happen? The	
	Dangers of Over-Indebtedness and Default	
6	Emergency Funds: Planning for Emergencies, Maintaining an Emergency Fund and	
	Adjusting Savings Goals; Planning for the Future.	
7	BE Principles: Delay Discounting; Economic Utility; Information Salience; Loss Aversion	

Vocational Skills Training and Mentorship Sessions (V). This includes three transition sessions to a specific vocation/goal augmented with five additional vocational mentorships (hands-on) sessions from a "role model" peer that our collaborating field partners (RTY) will help to identify. The first 3 sessions focus on identifying options for vocational, educational, employment, or business development training. The WESW will be matched with the role model from the same vocation that they express interest in for the following five sessions. The vocational skills mentorship is intended to be supportive of the women as they transition into a specific formal vocational training, engage with formal training/education, and eventually launch into formal employment or business development.

#### **Human Subjects Protection**

The Kyaterekera study received approval from the Washington University Institutional Review Board (IRB # 201811106), the Uganda Virus Research Institute (GC/127/18/10/690), and the Uganda National Council of Science and Technology (UNCST #SS4828). The study is registered in the Clinical Trials database NCT03583541. Each interviewer received Good Clinical Practice training and obtained the Collaborative Institutional Training Initiative (CITI) Certificate before interacting with study participants.

#### **Data Collection**

The Kyaterekera study has five assessment points: baseline, 6, 12, 18, and 24-months. This report is based on baseline data (pre-intervention). Data was collected using a 90-minute instrument administered by trained Uganda interviewers. The measures used were adapted, tested and refined in our earlier Bridges and Suubi studies in the region [49-56], Nova [46] and Undarga studies [47]. Participants were assessed on a range of topics, including the following: family and community background, family relationships, social support, family socio-economic status, gender relations and peer norms, savings and financial self-efficacy, sex work and sex work stigma, gender-based violence, sexual behaviors, drug use and arrest history, childhood sexual abuse, HIV/AIDS knowledge, stigma and prevention attitudes, PrEP use, personal health, mental health and access to health care.

In the following sections, we provide participants' responses for each of these sections.

#### 4. DEMOGRAPHIC CHARACTERISTICS

Table 4.1 shows the demographic characteristics of the study respondents who completed baseline interviews (N=542). Respondents were between 18-55 years of age (mean age = 31 years). Of the total respondents, 50.1% (n= 272) self-identified as divorced, 17.1% (n=93) were in a relationship and 8.4% (n=46) were married. Most respondents (58.4%, n=317) identified as Catholic. Over one third of respondents (38.3%, n=208) reported dropping out of school before completing primary 7, 23.8% (n=129) dropped out before senior 4, and 7.5% (n=41) did not go to school at all. The main reason for not attending or dropping out of school was because the family could not afford to pay for school-related expenses (35.9% n=195).

Table 4.1. Demographic Characteristics (N=542)	
	Frequency
Variable	n (%)
Marital status	
Married	46 (8.4)
Common law marriage	0 (0.0)
Divorced	272 (50.1)
Separated	41 (7.5)
Widowed	18 (3.3)
In a relationship	93 (17.1)
Single, never married	72 (13.2)
Religion	
Catholic	317 (58.4)
Protestant	113 (20.8)
Muslim	91 (16.7)
Born Again/Saved	14 (2.5)
Other	7 (1.2)
Educational level	
Did not go to school	41 (7.5)
Dropped out before primary 7	208 (38.3)
Completed primary 7 and stopped	95 (17.5)
Dropped out before senior 4	129 (23.8)
Completed senior 4 and stopped	54 (9.9)
Dropped out before senior 6	2 (0.3)
Completed senior 6 and stopped	6 (1.1)
I have a technical/vocational college diploma	7 (1.2)
I have a university degree	0 (0.0)
Primary reason for not attending/dropping out of school	
Family could not afford	195 (35.9)
Got pregnant	53 (9.7)
Got married	3 (0.5)
Failing in school/poor grades	6 (1.1)
Parent(s) passed away	79 (14.5)

Too many domestic responsibilities	3 (0.5)
The family does not approve/see benefit	14 (2.5)
Other	28 (5.1)
Not applicable	158 (29.1)
Don't know	2 (0.3)
No response	1 (0.1)

#### 5. COMMUNITY BACKGROUND

Respondents were asked several questions about their communities, including community resources available to them, how far away these resources were from their homes, and how they felt about their communities. Specific community resources include places of employment (respondent's employment place) and ease of finding employment, health care/medical facility and receiving medical care when needed, nearest bank, and clean water source. The distance was assessed by asking respondents to choose between two options: *near* (about 0-2 km, one could walk), or *far* (over 2 km, one could not easily walk). Figure 5.1 shows how far study respondents lived from designated community resources. Individual response data are presented in Table 1 of the Appendix.

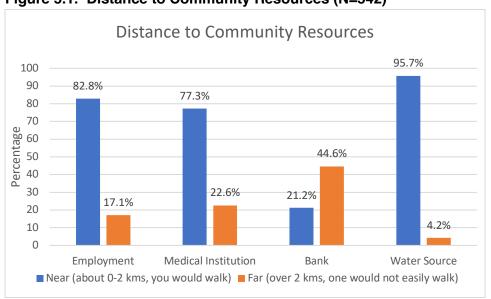


Figure 5.1. Distance to Community Resources (N=542)

On average, respondents had continuously lived in their current residence for a period ranging between 16 weeks and 6.5 years. Most respondents lived within walking distance of their place of employment (82.8%, n=449), medical facility (77.3%, n=419); and 93.5% (n=507) reported to have received medical treatment the last time they thought they needed it. In addition, 95.7% (n=519) of respondents reported having access to a clean water source. Of these, 90.4% (n=490) reported living within walking distance of the water source, and 93.2% (n=505) could walk to this water source. About 65.9% (n=357) of respondents reported knowing the location of a formal

financial or banking institution, 21.2% (n=115) reported having a bank within walking distance from their current residence, and out of these, 17.7% (n=96) could walk to the bank.

Regarding ease of finding employment (not limited to sex work) within 2km of respondents' current residence, 43.4% (n=235) of respondents reported that it was "not easy at all", 30.3% (n=164) reported that it was "somewhat easy", and 26.4% (n=143) reported that it was "very easy" to find employment.

#### **Community Satisfaction**

Respondents' community satisfaction was assessed using 8 items adapted from the Multidimensional Students Life Satisfaction Scale (MSLSS) [59]. The MSLSS was designed to provide a multidimensional profile of respondents' life satisfaction across key domains, including, family, friends, and community/living environment. Respondents were asked to rate how satisfied they were with their community/living environment, on a 5-point Likert scale with the following response options: 1= never, 2=sometimes, 3=about half the time, 4= most of the time, and 5=always. The theoretical range of this scale is 8-40 with higher scores indicating higher levels of community satisfaction (Cronbach's alpha =0.58). Table 5.1 presents the mean scores and standard deviations for each item and the overall mean score of the community satisfaction scale. Individual response data are presented in Table A.2 of the Appendix.

Table 5.1. Community Satisfaction (N=542)

Statement	Mean (SD)
I like where I live (community/ village).	3.7 (1.3)
I wish I lived in a different house (building) *	2.7 (1.4)
I wish I lived in another village/community*	3.4 (1.5)
I like my village/community.	3.6 (1.3)
I like my neighbors.	3.9 (1.2)
This village/community is filled with not nice people *	3.2 (1.3)
My family's house is nice.	3.1 (1.5)
There are a lot of fun things to do where I live.	3.2 (1.5)
Total Mean Score	26.7 (5.6)
Range	12-40

<sup>\*</sup>Items were reverse coded so that higher scores represent higher levels of community satisfaction.

The overall mean score was 26.7 (SD=5.6, actual range =12-40) indicating moderate levels of community satisfaction among respondents at baseline. As presented in the table above, respondents seem to be satisfied with certain aspects of their communities. Specifically, respondents gave favorable ratings for "I like my neighbors" (mean=3.9, SD=1.2), "I like where I live" (mean =3.7, SD=1.3), "I like my village/community" (mean =3.5, SD=1.3).

#### 6. FAMILY BACKGROUND

Questions in this section were adapted from our previous Suubi and Bridges studies in the study region [49-56]. Respondents were asked several questions about their family of origin (biological parents), current households and living conditions, including whether they had experienced homelessness, length of stay with their current family, the total number of people —both adults and children living in the household, number of children of school-going age who attend school and those who do not, and reasons why those children do not attend school. Results are presented in Table 6.1.

Of the total respondents, 56.2% (n=305) had lost their biological father and 42% (n=233) had lost their biological mother. About 5.17% (n=28) of respondents reported to have experienced homelessness in the past 30 days. On average, respondents had lived in their current households or with the current family between 10 months and 4 years. Most respondents (84.5%, n=458) reported that they felt safe in their current home/residence. The average number of people in the household was 3.6 (range = 1-18), with about 2 children below the age of 18 (range = 1-10). The majority of children of school-going age attended school (55.2%, n=299). For those who did not attend school (10.7%, n=58), reasons for non-school attendance included inability to pay for tuition and school-related expenses and being considered too young to attend school.

Statement	Frequency n (%)
Statement	11 ( /0)
Have you been homeless or without a regular place to sleep in the past 30 days	
Yes	28 (5.17)
No	514 (94.8)
If yes, where have you stayed in the last 30 days?	
With a friend	9 (1.66)
With a relative	4 (0.74)
With a sexual partner	5 (0.92)
On the street	1 (0.18)
Any other place	9 (1.66)
Not applicable	514 (94.8)
For how long you have lived at your current home or with your current family (in years/or months)	
0	122 (22.5)
1	76 (14.02)
2	72 (13.28)
3	54 (9.96)
4	39 (7.20)
5	38 (7.01)
6	19 (3.51)

7	20 (3.69)
8	12 (2.21)
9	11 (2.03)
10	28 (5.17)
11	6 (1.11)
12	3 (0.55)
13	4 (0.74)
14	4 (0.74)
15	9 (1.66)
16	
	2 (0.37)
17	3 (0.55)
18	2 (0.37)
19	2 (0.37)
20+ years	16 (2.95)
Borne fortest to a constitution for the con-	
Do you feel safe in your current home/residence	450 (04.5)
Yes	458 (84.5)
No	84 (15.50)
Harry manners and a command to the size or community of the second and the second	
How many people currently live in your household?	00 (45 0)
1	86 (15.8)
2	94 (17.3)
3	115 (21.2)
4	97 (17.9)
5 6 7	70 (12.9)
6	35 (6.46)
	22 (4.06)
8	9 (1.66)
9	6 (1.11)
10	2 (0.37)
11	1 (0.18)
12	1 (0.18)
13	1 (0.18)
15	1 (0.18)
18	1 (0.18)
	( /
How many of the people who live in your household are children?	
0	155 (28.6)
1	96 (17.7)
	118 (21.7)
2 3	92 (16.9)
4	44 (8.1)
5	23 (4.2)
6	9 (1.6)
7	
8	2 (0.3)
	2 (0.3)
10	1 (0.1)

How many of the children in the household, age five and older,	
attend school?	
0	88 (16.2)
1	99 (18.2)
2	108 (19.9)
3	56 (10.3)
4	20 (3.6)
5	9 (1.6)
6	
	4 (0.7)
7	2 (0.3)
8	1 (0.1)
Not applicable	155 (28.6)
How many of the children in the household, age five and older, do not attend school?	
0	329 (60.7)
1	39 (7.2)
2	15 (2.7)
3	
	3 (0.5)
4	1 (0.1)
Not applicable	155 (28.6)
For the children who do not attend school, how many are: Males	
0	25 (4.61)
1	25 (4.61)
2	7 (1.29)
3	1 (0.18)
Not Applicable	484 (89.3)
11017 ppilodolo	101 (00.0)
For the children who do not attend school, how many are: Females	
0	21 (3.87)
1	33 (6.09)
2	4 (0.74)
Not Applicable	484 (89.3)
For the children who do not attend school, why don't they attend school	
Failed to pass the exam	2 (0.37)
Not interested in continuation of education	4 (0.74)
	• •
Can't afford to pay for tuition	29 (5.35)
School is too far	4 (0.74)
Lack of school uniform/shoes	4 (0.74)
Did not like school	3 (0.55)
Did not like teachers	1 (0.18)
Did not like children there	2 (0.37)
Have to work	3 (0.55)
Have to take care of their siblings/parent	1 (0.18)
Don't Know	58 (10.7)

Still too young to attend school	25 (4.61)
Have health issues	5 (0.92)
Other	2 (0.37)

#### **Family Relations/Cohesion**

Items measuring family relations were adapted from the Family Environment Scale (FES) [60] and the Family Assessment Measure (FAM) [61], and were tested in our previous Bridges and Suubi studies [49-56]. Family cohesion was measured using 7 items that assess the degree of commitment, help, and support that family members provide to one another. Respondents were asked to rate how often each item occurred in their family, on a 5-point Likert scale, with 1=never, 2=sometimes, 3=about half of the time, 4=most of the time, and 5=always. The theoretical range for this scale is 7-35, with high scores indicating higher levels of family cohesion. Table 6.2 presents the mean scores and standard deviations for each item, and the overall mean score of the family cohesion scale. Individual responses are presented in Table A.3 of the Appendix.

Table 6.2 Family Cohesion (N=542)

Statement	Mean (SD)
Do your family members ask each other for help before asking non-family	
members for help?	3.4 (1.5)
Do your family members like to spend free time with each other?	3.5 (1.3)
Do your family members feel close to each other?	3.5 (1.4)
Are you available when others in the family want to talk to you?	3.3 (1.4)
Do you listen to what other family members have to say, even when you	
disagree?	3.5 (1.3)
Do you do things together as a family?	3.4 (1.4)
Do you think that your family members love you?	3.8 (1.3)
Total Mean Score	24.5 (7.0)
Range	7-35

At baseline, the average score was 24.5 (SD=7.0, actual range = 7-35), indicating moderate levels of family cohesion. The scale had a high-reliability coefficient (Cronbach alpha = 0.85). High scores were reported on items related to love from family members (mean=3.7, SD =1.3), family closeness, such as doing things together as a family (mean=3.5, SD =1.4), and spending free time with each other (mean=3.5, SD =1.3).

#### 7. SOCIAL SUPPORT

#### **Non-kin Support Networks**

Non-kin support networks — defined as relationship ties not based on blood or marriage were measured using 5 items, previously tested in the Bridges and Suubi studies [62]. Respondents were asked to name up to 5 people besides their biological parents, caregivers, relatives and or Kyaterekera project staff, who provided them or their families with any kind of support. These may include neighbors, friends, schools, faith-based organizations, groups, or organizations in their communities. After identifying these individuals or groups, participants were then asked to provide additional information on each, including relationship to the respondent, how long they have been receiving support from this source, the number of times they are in contact per month, and the kind of support received.

At baseline, 34.7%, (n=188) of respondents reported receiving support from a non-kin individual or group in their community. These included friends, community-based organizations, bosses, neighbors and landlords. Support received included financial support, food, and emotional support among others. Over half of the respondents (65.3%, n=354) did not report any non-kin source of support. In addition to non-kin support networks, 43.2% (n=234) of respondents reported being involved in community programs/groups in their villages/communities at baseline. These were mainly village microfinance/savings groups.

#### **Multidimensional Scale of Perceived Social Support (MSPSS)**

Items in the MSPSS were tested and adapted from Project Nova [46]. The 12-item scale assesses the subjective assessment of social support adequacy and perceptions of social support in three dimensions, including family, friends, and significant other [63]. Respondents were asked to indicate how they felt about each statement using a 7-point scale with 1=*very strongly disagree*, 2=*strongly disagree*, 3=*mildly disagree*, 4=*neutral*, 5= *mildly agree*, 6=*strongly agree*, and 7=*very strongly agree*. The theoretical range for this scale is 12-84, with higher scores indicating higher levels of perceived social support.

At baseline, the total mean score was 57.5 (SD=17.7, range = 12-84), indicating moderate levels of perceived social support. Particularly, respondents reported high scores on items related to "having a special person with whom they could share their joys and sorrows" (mean= 5.1, SD= 2.0), "having a special person who was a real source of comfort to them" (mean= 5.2, SD=2.0), and "ability to talk about problems with their family" (mean = 5.1, SD = 2.0). Results are presented in Table 7.1 below and individual responses are presented in Table 4.4. of the Appendix.

Table 7.1. Multidimensional Scale of Perceived Social Support (n= 542)

Statement	Mean (SD)
There is a special person who is around when I am in need.	4.9 (2.0)
There is a special person with whom I can share my joys and sorrows.	5.1 (2.0)
My family really tries to help me.	4.6 (2.1)
I get the emotional help and support I need from my family	4.5 (2.1)
I have a special person who is a real source of comfort to me.	5.2 (2.0)
My friends really try to help me.	4.5 (2.2)
I can count on my friends when things go wrong.	4.3 (2.2)
I can talk about my problems with my family.	5.1 (2.0)
I have friends with whom I can share my joys and sorrows.	4.7 (2.1)
There is a special person in my life who cares about my feelings.	4.8 (2.1)
My family is willing to help me make decisions.	4.7 (2.1)
I can talk about my problems with my friends.	4.6 (2.1)
Total Mean Score	57.5 (17.7)
Range	12-84

#### 8. GENDER RELATIONS SCALE

Gender norms were measured using items adapted from the Gender Relations Scale [64] and tested in Project Nova [46]. The 16-item scale measures equity and power within intimate relationships on issues related to attitudes towards gender roles and expectations, decision-making around sex reproduction, household decision making, violence and communication. For each statement, respondents were asked to indicate whether they "Agreed = 1", "Disagreed = 2", or were "Not sure = 3." Responses are presented in Table 8.1 below.

At baseline, respondents exhibited negative gender relations, such as, "Men need sex more than women do" (85.7%, n=465), "It is a woman's responsibility to avoid getting pregnant" (85.9%, n=466), "A man should have the final word about decisions in his home" (65.3%, n=354), "A man needs other women even if things with his wife are fine" (57.7%, n=313), "A man can hit his wife if she will not have sex with him" (54.2 %, n=294), "Changing diapers, giving the kids a bath, and feeding the kids is a mother's responsibility" (81.7%, n=443), "A woman should tolerate violence to keep the family together" (49.6 %, n=269), and "A real man produces a male child" (73.4%, n=398). However, the majority of respondents also agreed that, "A couple should decide together if they want to have children" (92.9%, n=504), "Men and women should share household chores" (67.7 %, n=367), "A woman can suggest using condoms just like a man can" (91.8%, n=498), "A man should know what his partner likes during sex" (91.8%, n=498), and "A man and a woman should decide together what type of contraceptive to use" (87.8 %, n=476).

Table 8.1 Gender Relations Scale (N=542)

	Agree	Disagree	Not sure
Statement	n (%)	n (%)	n (%)
Men need sex more than women do.	465 (85.7)	28 (5.17)	49 (9.04)
You don't talk about sex, you just do it.	324 (57.7)	179 (33.0)	39 (7.20
It is a woman's responsibility to avoid getting			
pregnant.	466 (85.9)	54 (9.96)	22 (4.06)
A man should have the final word about decisions			
in his home.	354 (65.3)	150 (27.6)	38 (7.01)
Men are always ready to have sex.	409 (75.4)	88 (16.2)	45 (8.30)
A woman should tolerate violence to keep the			
family together.	269 (49.6)	247 (45.5)	26 (4.80)
A man needs other women even if things with his			
wife are fine.	313 (57.7)	191 (35.2)	38 (7.01)
A man can hit his wife if she will not have sex with			
him	294 (54.2)	222 (40.9)	26 (4.80)
A couple should decide together if they want to			
have children	504 (92.9)	33 (6.09)	5 (0.92)
Changing diapers, giving the kids a bath, and			
feeding the kids is a mother's responsibility	443 (81.7)	78 (14.3)	21 (3.87)
A woman can suggest using condoms just like a			
man can.	498 (91.8)	28 (5.17)	16 (2.95)
A man should know what his partner likes during			
sex	498 (91.8)	28 (5.17)	16 (2.95)
A man and a woman should decide together what			
type of contraceptive to use.	476 (87.8)	49 (9.04)	17 (3.14)
A real man produces a male child.	398 (73.4)	81 (14.9)	63 (11.6)
Men and women should share household chores.	367 (67.7)	141 (26.0)	34 (6.27)
A woman should not initiate sex.	250 (46.1)	246 (45.3)	46 (8.49)

#### 9. SOCIO-ECONOMIC STATUS OF THE FAMILY

#### **Poverty**

Questions in this section were adapted from the DHS Model A Questionnaire<sup>1</sup> and the Uganda Household Survey conducted by the Uganda Bureau of Statistics,<sup>2</sup> and tested in our previous Suubi and Bridges studies in the study region [49-56]. Additional questions were tested in Project Nova [46] and Undarga study [47]. Respondents were asked several questions to assess their relative level of poverty, including financial distress, household assets, living arrangements, employment and household finances. Specifically, respondents were asked to describe how often they did not

<sup>&</sup>lt;sup>1</sup> Demographic and Health Surveys. Available at: <a href="https://dhsprogram.com/Methodology/Survey-Types/DHS-Questionnaires.cfm">https://dhsprogram.com/Methodology/Survey-Types/DHS-Questionnaires.cfm</a>

<sup>&</sup>lt;sup>2</sup> Uganda Bureau of Statistics. Household Surveys. Available at: <a href="https://www.ubos.org/?pagename=explore-publications&p">https://www.ubos.org/?pagename=explore-publications&p</a> id=23

have enough money to cover basic needs in the last 3 months. As presented in Table 9.1 below, more than half of respondents reported not having enough money to buy food (51.5%, n=278), clothing (57% (n=309) *many times*. In addition, 39.1% (n=212) could not afford housing fees and 42.7% (n=231) could not afford to pay for medical expenses, *many times*, in the last 3 months.

**Table 9.1. Financial Distress (n=542)** 

In the last 3 months, please describe how				Many times
often you did NOT have enough money	Never	Once	2-3 times	(4 or more)
for each of the following living expenses?	n (%)	n (%)	n (%)	n (%)
Money to buy food	104 (19.2)	30 (5.57)	127 (23.5)	278 (51.5)
Money to buy clothing	29 (16.4)	54 (9.96)	90 (16.6)	309 (57.0)
Money for transportation	146 (27.1)	64 (11.9)	106 (19.7)	222 (41.2)
Money for housing fees	161 (29.7)	83 (15.3)	85 (15.7)	212 (39.1)
Money for health or medical expenses	127 (23.4)	69 (12.7)	114 (21.0)	231 (42.7)

#### **Household Assets**

Respondents were also asked about household assets. Responses are presented in Table 9.2. More than half of the respondents' households owned their own homes (61%, n=331), 29.5% (n=160) owned land, and 41.8% (n=227) owned a small business/retail store/shop/kiosk –to supplement their income. The majority of households (90.2%, n=489) had access to a cellphone, 56% (n=304) owned a radio, and 43.9 (n=238) owned a television. Given that most respondents live and work in small towns, fewer respondents reported engaging in agricultural-related activities, including having bananas, coffee, beans and maize gardens, as well as farm animals.

Table 9.2 Household Assets (N=542)

	Yes	No
Variable	n (%)	n (%)
House	331 (61.0)	211 (38.9)
Rental property	67 (12.3)	475 (87.6)
Land	160 (29.5)	382 (70.4)
Bicycle	81 (14.9)	461 (85.0)
Motorcycle /boda boda	65 (11.9)	477 (88.0)
Car	30 (5.54)	512 (94.4)
Television	238 (43.9)	304 (56.0)
Refrigerator	49 (9.04)	493 (90.9)
Cell phone	489 (90.2)	53 (9.78)
Radio	304 (56.0)	238 (43.9)
Banana garden	132 (24.3)	410 (75.6)
Coffee garden	85 (15.6)	457 (84.3)
Beans garden	119 (21.9)	423 (78.0)
Maize garden	123 (22.6)	419 (77.3)
Other gardens (cassava, sweet potato, greens)	142 (26.2)	400 (73.8)
Cow (s)	56 (10.33)	486 (89.6)

Goat (s)	94 (17.3)	448 (82.6)
Pig (s)	104 (19.1)	438 (80.8)
Poultry (for sale)	65 (11.9)	477 (88.0)
Any other animals	30 (5.54)	512 (94.4)
A small business/retail store/shop/kiosk	227 (41.8)	315 (58.1)

Respondents were also asked about cellphone ownership and usage. While 90.2% (n=489) of respondents' households had access to a cellphone (Table 9.2), majority of respondents (92.8%, n=503) actually owned a cellphone. Of these, 83.9% (n=455) reported sending and receiving text messages, 20.6% (n=112) reported using their cellphones to request or receive health-related services, 45.5% (n=247) received requests for employment/work, and 75.2% (n= 408) used their cellphone to request money/cash. Only 19.3% (n=105) shared their phones with their friends, relatives, spouse or sexual partner. On average, participants spent ~8,056/= Uganda shillings on cell phone-related expenses (e.g., charging, airtime, sim cards, internet/data, and replacement of lost or stolen phone.

In addition to household assets, respondents' living conditions were assessed. Results are presented in Table 9.3. More than half of respondents (64%, n=347) lived in households with electricity, 68.4% (n=371) lived in a muzigo (rented house), and 82.2% (n=446) reported that their houses had cemented floors. Excluding the sitting room, the average number of rooms per household was 1.93 (range = 0-9), with an average of 3.5 persons per room. The majority of respondents (89.8%, n=487) had a toilet facility, with 84.8% (n=460) reporting a pit latrine.

Table 9.3. Household Facilities (N=542)

	Frequency
Statement	n (%)
Does the house you live in have electricity?	
Yes	347 (64.0)
No	195 (35.9)
Do you own a cell phone	
Yes	503 (92.8)
No	39 (7.2)
Does your cell phone send and receive text messages?	
Yes	455 (83.9)
No	48 (8.8)
Not applicable	39 (7.2)
Have you used text messaging to receive or request any of the	

following?

Health-related services?	
Yes	112 (20.6)
No	391 (72.1)
Not applicable	39 (7.2)
Employment/work	
Yes	247 (45.5)
No	256 (47.2)
Not applicable	39 (7.2)
Money/cash	
Yes	408 (75.2)
No	95 (17.5)
Not applicable	39 (7.2)
Do you currently share your phone with anyone else?	
Yes	105 (19.3)
No	398 (73.4)
If Yes who	
Friend	66 (12.1)
Spouse	16 (2.9)
Sex partner	18 (3.3)
Relative	35 (6.4)
Other	4 (0.7)
What is the floor in your house where you live?	
Muzigo	371 (68.4)
Hut	2 (0.3)
Mud house	6 (1.1)
Brick house with iron sheets but not cemented floors	31 (5.7)
Brick house with iron sheets and cemented floors	132 (24.3)
What is the floor in your house where you live?	
Dirt sand	54 (9.9)
Dung floor	10 (1.8)
Tiled floor	10 (1.8)
Cement floor	446 (82.2)
Other (please specify	22 (4.0)
Do you have a toilet facility?	
Yes	487 (89.8)
No	55 (10.1)
What kind of toilet facility do your family members use?	

Flush or pour flush toilet	39 (7.2)
Pit latrine	460 (84.8)
No facility or bush or field	14 (2.5)
Other	29 (5.3)

#### **Employment**

Employment was assessed by asking respondents to indicate whether they were currently engaged in paid work, the type of jobs, how often they worked, and type of earnings or compensation received.

At baseline, 23% (n=128) of respondents were currently engaged in paid work. Of these, 5.5% (n=30) stated that this was adequate employment. The two primary reasons for employment inadequacy were inadequate pay/compensation and family responsibilities i.e., having so many family members to take care of. About 26% (n=142) of respondents had engaged in paid work in the past 12 months. Of these, 1.7% (n=9) had a second job, and 0.4% (n=2) had a third job. About 22.9% (n=124) of respondents who reported paid work in the previous 12 months worked almost every day. Respondents primarily worked as bar attendants/waitresses, house maids, hotel/lodge maids, mobile money agents, cleaners, and worked in hair salons. Almost all respondents (n=141) received monetary compensation. They used the money to pay for basic needs, household items, taking care of their families, paying school fees for their children and other relatives, as well investing in microenterprise businesses.

#### **Household Finances**

Respondents were asked questions about their household income, including, sources of income in the past 1 month, the amount of income from sex work per month, as well as how they manage their money. Responses are presented in Table 9.4.

At baseline, the average total monthly income for the respondents' entire household (including income from all household members and all sources) was ~329,405/= Uganda shillings (an equivalent of ~\$90 USD). Of this money, respondents reported an average of 223,732/= Uganda shillings (an equivalent of ~\$60) as their own earned income (i.e., not from other household members). About 72% (=391) reported being the main source of income in their households, followed by husbands, boyfriend, or another primary partner at 14% (n=76).

On average, respondents reported 203,088/= Uganda shillings (an equivalent of ~\$56 USD) of their monthly income coming from sex work. In addition, respondents owed an average of 193,227 Uganda shillings (an equivalent of ~\$53) to co-workers, family members, neighbors formal lending institutions, and others. Also, 45% (n=244) of respondents reported that they borrow money for day-to-day living expenses such as food, housing, and transportation. Most respondents (72.1%, n=391) reported that they made the most money in their household. Besides respondents, husband, boyfriend or other primary partners (63.2% n=343) are the secondary household income earners

Table 9.4. Household Finances (n=542)

	Frequency
Statement	n (%)
Besides yourself, who else in your household currently earns money? (Circle all that apply)	
Husband, boyfriend, or other primary partner	343 (63.2)
Another adult relative in the household (please specify)	78 (14.3)
One of respondent's children	50 (9.2)
Other (please specify)	34 (6.2)
Who currently makes the most money in your household	
Respondent herself	391 (72.1)
Husband, boyfriend, or other primary partner	76 (14.0)
Another adult relative in the household	37 (6.8)
One of respondent's children	25 (4.6)
Other	13 (2.4)
What are the top three ways in which you have earned money in the past 1 month?	
Sent money by parents or other relatives	64 (11.8)
Employment in a restaurant (server, hostess, cook, etc.)	53 (9.7)
Farming or agriculture (self-employed or working for others)	73 (13.4)
Sex work	535 (98.7)
Working in sales at a store or business that is owned by someone else	8 (1.4)
Selling goods or services (NOT including sex) on your own	80 (14.7)
Selling drugs	2 (0.37)
Employment at someone's house (server, cook, babysitting, etc.)	14 (2.5)
Employment in hotel industry	11 (2.0)
Employment in tourism industry	1 (0.1)
Employment in a factory	2 (0.37)
Community outreach worker or other kind of community work, NGO	2 (0.37)
Construction	121 (22.3)
Do you currently owe anyone money (Yes)	388 (71.5)
Whom do you owe money to?	
Co-workers	31 (5.72)
Family members	19 (3.51)
Neighbors	39 (7.20)
Paying partner/client	2 (0.37)

Formal lending institution (such as bank)	73 (6.83)
Money lender or pawnshop	11 (2.03)
Retail shop	23 (4.24)
Boss/manager	15 (2.77)
Friends	52 (9.59)
Other [please specify]:	159 (29.3)
Not applicable	154 (28.4)

### **10. SAVING BEHAVIORS**

Respondents were asked several questions regarding their saving behaviors, attitudes, and savings goals. At baseline, 48% (n=260) of respondents reported that they had money saved. The average savings amount was 292,611/= Uganda shillings (an equivalent of ~\$80 USD). Respondents kept their savings in a range of places (Table 10.1). Specifically, 47.3% (n=123) saved in a savings and credit cooperative (SACCO), 8% (n=21) saved in a bank, and 38.8% (n=101) reported saving at home. For respondents who reported saving in the bank or SACCO (n=144), they were asked to report the source(s) of their money. The majority (94.9%, n=132) reported saving it from their work, 8.6% (n=12) reported that their romantic partner/parent/guardian gave them the money, 7.9% (n=11) saved it from their allowance, and 5.7% (n=8) saved if from other resources.

Table 10.1 Saving Locations (N=260)

	Yes	No
Statement	n (%)	n (%)
Do you have money saved in any of the following places?		_
Bank	21 (8.0)	239 (91.9)
Savings and Credit Cooperative (SACCO)	123 (47.3)	137 (52.6)
At home	101 (38.8)	159 (61.1)
With your current romantic partner/friend(s)/parent(s)/caregiver(s)	24 (9.2)	236 (90.7)
Any other place	47 (18.0)	213 (81.9)
If you have ever deposited money in a bank or SACCO, how did you get the money to save? (N= 139)  My romantic partner/parent/guardian gave me the money to put into the bank account.  I saved it from my work.  I saved it from my allowance.  Other	12 (8.6) 132 (94.9) 11 (7.9) 8 (5.7)	127 (91.3) 7 (5.0) 128 (92.0) 131 (94.2)

## Importance of Saving Toward a Specific Goal

Respondents were asked to rate the importance of saving money toward a specific goal (e.g., personal development, family use, family business, etc.). Responses were rated on a 5-point Likert scale with: 1=not important at all, 2=not very important, 3=somewhat important, 4=very important, and 5=extremely important. Table 10.2 presents the mean scores and standard deviations for each item and the overall summated mean score at baseline. Overall, respondents placed very significant importance on saving across all goals (mean = 22.55, SD = 2.3, range = 5-25). Individual responses are presented in Table A.5 of the Appendix.

Table 10.2 Importance of Saving for a Specific Goal (N=542)

Statement	Mean (SD)
Saving money for a family business	4.58 (0.5)
Saving money for one's personal development, including	
vocational-technical or job training	4.51 (0.6)
Saving money for family use	4.52 (0.5)
Saving money to buy an animal (such as a cow, goat, or pig)	4.43 (0.6)
Saving money to move into one's own home	4.50 (0.6)
Total Mean Score	22.55 (2.3)
Range	5-25

# Level of Confidence to Save for a Specific Goal

In addition, respondents were asked to rate their level of confidence to save toward a specific goal. Responses were rated on a 5-point Likert scale, with 1=not confident at all, 2=not very confident, 3=somewhat confident, 4=very confident, and 5=extremely confident. Table 10.3 presents the mean scores and standard deviations for each item and the overall mean score. Similar to the importance of savings above, respondents highly rated their confidence in the ability to save across all goals (mean = 20.9, SD = 4.5, range = 5-25). Individual responses are presented in Table A.6 of the Appendix.

Table 10.3. Confidence in Saving for a Specific Goal (N=542)

Statement	Mean (SD)
Save money for a family business	4.22 (1.1)
Saving money for one's personal development, including vocational-	, ,
technical or job training	4.11 (1.1)
Save money for family use	4.28 (1.0)
Save money to buy an animal such as a goat, pig, or cow	4.12 (1.1)
Save money to move into one's own home	4.21 (1.1)
Total Mean Score	20.9 (4.5)
Range	5-25

## **Financial Self-Efficacy**

Items in this section were adapted from the Domestic Violence-related Financial Issues (DV-FI) scale [65]. Respondents were assessed on their abilities to achieve their specific financial goals, on a 5-point Likert scale, with 1=not confident at all, 2=not very confident, 3=somewhat confident, 4=very confident, and 5=extremely confident. As presented in Table 10.4 below, the overall mean score was 15.5 (SD=4.0, range = 4-20) indicating higher levels of financial self-efficacy. Respondents rated highly their abilities to achieve all their goals of becoming financially secure, building savings, paying off debts and obtaining adequate employment. Individual responses are presented in Table A.7 of the Appendix.

Table 10.4. Financial Self-Efficacy

Statement	Mean (SD)
How confident are you that you can meet your goals for becoming	
financially secure?	3.83 (1.2)
How confident are you that you can meet your goals for obtaining	
adequate employment	3.77 (1.2)
How confident are you that you can meet your goals for building savings?	3.93 (1.2)
How confident are you that you can meet your goals for paying off your	
debts?	3.96 (1.2)
Total Mean Score	15.5 (4.0)
Range	4-20

### 11. BEHAVIORAL ECONOMICS PRINCIPLES

Principles of Behavioral Economics (BE), including delay discounting, information salience, economic utility, and loss aversion [66-71], that target economic motivations of sexual risk behaviors, were assessed. Respondents were asked hypothetical questions related to what they would do in specific situations (Table 11.1). Specifically, when asked what they would do if they won a lottery, 45% (n=244) reported that they would prefer to get the 150,000/= Uganda Shillings for sure, and 54% (n=293) preferred to have a 50% chance to win 300,000/= Uganda Shillings. Similarly, when asked what they would do if they won another lottery in a different place, 68.6% (n=372) reported that they would prefer to get 150,000/= Uganda Shillings tomorrow, and 30% (n=163) preferred to get 300,000/= Uganda Shillings in one year. Finally, when asked what they were most likely to do if they had 150,000/= Uganda shillings, slightly more than half of the respondents (53.6%, n=291) stated that they would start a small business, and 25% (n=136) reported that they would save half and spend half of the money.

In addition, respondents were asked several questions related to their knowledge about people living with HIV, as well as their likelihood to engage in unprotected sexual activities. Most respondents had a close friend or relative living with HIV (72.5%, n=393) and 7.1% (n=418) had a close friend or relative who died from HIV. In addition, 59.4% (n=322) of respondents "always"

thought about preventing HIV for themselves or any of their sexual partners, 63.1% (n=342) reported that they are "*likely*" to have at least one unprotected sexual encounter in the next two weeks, and 73.9% (n=401) reported that their peers (other WESW) would be "*likely*" to have at least one unprotected sexual encounter in the next two weeks.

Given hypothetical scenarios related to engaging in unprotected sexual activity with a paying customer, 72% (n=394) of respondents reported that they would wait for three hours for the customer to come back with a condom, and 13.6% n=74 stated they would likely have sex now with this person without a condom. When the time period was extended to 3 weeks, 46% (n=250) stated that they would wait for 3 weeks for the customer to come back with a condom, and 30% n=165 stated that they would likely have sex now with this person without a condom.

Table 11.1. Behavioral Economics Measures (N=542)

Statement	Frequency n (%)
Imagine you won a lottery. Would you prefer to get?	044 (45)
150,000 UGX for sure	244 (45)
Have a 50% chance to win 300,000 UGX	293 (54)
Don't Know	5(0.9)
Imagine you won another lottery at a different place. Would you prefer to	
get? 150,000 UGX tomorrow	372 (68.6)
300,000 UGX in one year	163 (30.1)
Don't Know	7(1.29)
Don't Miow	7(1.20)
Imagine you had 150,000 UGX. Are you most likely to?	
Spend all of it	29 (5.3)
Spend most of it	25 (4.6)
Spend half, save half	136 (25.0)
Save most of it	47 (8.6)
Save all of it	14 (2.5)
Start a small business that would eventually bring in money	291 (53.6)
Do you have a close friend or relative who is living with HIV?	
Yes	393 (72.5)
No	132 (24.3)
Don't Know	17 (3.1)
De vers have a slage friend an unlative role of the HIVO	
Do you have a close friend or relative who died from HIV?	440 (77.4)
Yes	418 (77.1)
No Dan't Kanan	119 (21.9)
Don't Know	5 (0.9)

How often do you think about preventing HIV for yourself or for any of your sexual partners (intimate or customers)?	
Never	42 (7.7)
Sometimes	170 (31.3)
Always	322 (59.4)
Don't Know	8 (1.4)
What is the likelihood that you will have at least one unprotected sexual encounter in the next two weeks?	
Not likely	172 (31.7)
Likely	342 (63.1)
Don't Know	28 (5.1)
What is the likelihood that one of your peers will have at least one unprotected sexual encounter in the next two weeks?	
Not likely	98 (18.0)
Likely	401 (73.9)
Don't Know	43 (7.9)
Engaging in unprotected sex with a paying customer: The customer says could meet up with you again 3 hours from now, and that he could bring condoms with him. What would you do?	
I would likely have sex now with this person without a condom	74 (13.6)
I would likely wait 3 hours to have sex with this person with a condom	394 (72.6)
I would likely not have sex at all (not now and not later).	73 (13.4)
Don't Know	1 (0.1
Engaging in unprotected sex with a paying customer: The customer says that he could meet up with you again 3 weeks from now, and that he could bring condoms with him. What would you do?	
I would likely have sex now with this person without a condom	165 (30.4)
I would likely wait 3 weeks to have sex with this person with a condom	250 (46.1)
I would likely not have sex at all (not now and not later).	127 (23.4)

# 12. SEX WORK

### **Sex Work Survival**

Questions related to women's survival in sex work were adapted from Undarga and Nova studies [46,48]. Respondents were asked several questions related to the duration of engaging in sex work, the number of customers in the past 30 days, how the customers contact them, how often they use a condom, and the possibility of securing other employment other than sex work.

At baseline, the mean age at which respondents engaged in sex work for the first time was 24 years (range= 8-51 years). The duration of engaging in sex work ranged between 1 month to 35 years.

About 16.2% (n=88) reported having a boss or manager for their sex work (Table 12.1). Among those who reported having a manager, they had worked for them for a period ranging between 1 week and 11 years. More than half of respondents (61.9%, n=336) reported working alongside other men and WESW (range=1-150 people). In addition, 73.2% (n=397) reported that they had to travel from their village/town or current residence to meet their customers. Of these, over one third (37.4%, n=203) reported traveling between 0-2 km (*near*), and 35.7% (n=194) reported travelling over 2 km (*far*). On average, respondents engaged in sex work for about 5.8 days a week, with most customers reported on Saturday (72.1% n=391), Sunday (69.3% n=376), and Friday (48.5% n=263).

Table 1	12 1	Sex	Work	Survival	(N-542)
Iable	12.1.	JEX	VVUIR	Survivar	いいーンサムル

Statement Statement	Frequency n (%)
Do you have a "boss" or a "manager" for your sex work? Yes No	88 (16.2) 454 (83.7)
Do you work alongside other men and women engaged in sex work? Yes No	336 (61.9) 206 (38.0)
Do you have to travel from your village/town or current residence to meet your customers? Yes No	397 (73.2) 145 (26.7)
If YES, how far do you have to travel to meet your customers?  Near (about 0-2 kms, you would walk)  Far (over 2 kms, one would not easily walk)	203 (37.4) 194 (35.7)
How many days of the week do you engage in sex work?  1 2 3 4 5 6 7	10 (1.8) 36 (6.4) 93 (17.1) 83 (15.3) 72 (13.2) 32 (5.90) 216 (39.8)
What days of the week do you have the most customers? (Yes) All days are equal Monday Tuesday Wednesday	44 (8.1) 79 (14.5) 118 (21.7) 103 (19.0)

Thursday	121 (22.3)
Friday	263 (48.5)
Saturday	391 (72.1)
Sunday	376 (69.3)
Juliuay	,

#### **Reimbursement for Sex**

Respondents were also asked to report whether they had exchanged sex with a paying customer for items like money, drugs, alcohol, and the number of times they exchanged sex in the past month. Responses are presented in Table 12.2. Exchanging sex for money (99.8%, n=541), food (37%, n=201), transport 168 (31%, n=168) and clothes (n=30.2%, n=164) were the most highly rated.

Table 12.2. Reimbursement for Sex (N=542)

Have you ever exchanged sex with a paying customer for	Yes	Number of times
the following? (check all that apply)	n (%)	(Mean, SD)
Money Cash	541 (99.8)	38.4 (55.1)
Drugs	22 (4.0)	0.1 (1.2)
Alcohol	140 (25.8)	1.4 (4.2)
Cigarettes	14 (2.5)	0.1 (1.4)
Transportation	168 (31.0)	1.0 (2.9)
Food	201 (37.0)	1.9 (4.6)
Clothes	164 (30.2)	0.8 (2.5)
Jewelry	114 (21.0)	0.4 (2.9)
Electronics	90 (16.6)	0.3 (1.8)
To avoid arrest	87 (16.0)	0.3 (1.7)
To avoid being evicted from housing	116 (21.4)	0.8 (3.0)
For a place to sleep	113 (20.8)	0.7 (2.9)
For help with legal problems	55 (10.1)	0.2(1.3)
Other	10 (1.8)	0.1(0.9)

On average, respondents reported to have exchanged sex with about 33 customers in the last month (mean = 33.4, SD= 47.4, range = 1-280). Most respondents (77.1%, n=418) were contacted via phone or internet, 37.8% (n=205) were found on the streets, 27.6% (n=150) were arranged through friend or acquittance, 16% (n=87) were found in a hotel or sauna, 7.9% (n=43) were arranged through a "manager" or "boss", and 22.6% (n=123) were arranged through other means, including at work, home, lodge/bar/nightclub.

Regarding condom use, 38% (n=206) of respondents reported using condoms with their customers "more than half of the time", 21.9 % (n=119) reported using condoms "always", and 3% (n=17) reported that they "never use condoms" (Table 12.3). Over half of the respondents (58.3%, n=316) reported being offered more money, goods, or extra services not to use a condom. About 38% (n=206) reported being offered more money "more than half of the time", and 21.9% (n=119) reported being offered money "always" not to use a condom.

In addition, 48% (n=264) of respondents reported that their main partner did not know that they were engaged in sex work. Most respondents (95%, n= 515) stated that their earnings from sex work are entirely for them to spend or to save. Of the total sample, 14.2% (n=77) stated that their main partner knew that they are engaged in sex work, and 2% (n=11) of these stated that their main partner is very supportive of their involvement in sex work. About 77% (n=418) indicated that they could secure other employment other than sex work and earn as much money.

Table 12.3. Condom Use (N=542)

Ctotomont	Frequency
Statement How often do you use a condom with these customers?	n(%)
Never	17 (3.1)
Less than half the time	82 (15.1)
Half the time	118 (21.7)
More than half the time	206 (38.0)
Always	119 (21.9)
Have your paying customers ever offered you more money, goods, or extra services not to use a condom?	
Yes	316 (58.3)
No	226 (41.7)
How often do your paying customers offer to pay you more money, goods or extra services not to use a condom?	
Never	2 (0.3)
Less than half the time	121 (22.3)
Half the time	97 (17.9)
More than half the time	87 (16.0)
Always	9 (1.6)
Not applicable	226 (41.7)
Are your earnings from sex work (cash and goods) entirely yours to spend or to save?	
Yes	515 (95.0)
No	27 (4.9)
How much money can you keep?	
None of it	1 (0.1)
Less than half	6 (1.1)
Half	13 (2.4)
More than half All of it	6 (1.1) 1 (0.1)
Not applicable	515 (95.0)
140t applicable	010 (00.0)
If NO, who must you share it with? Select all that apply:	
"Manager" or "Boss"	16 (2.9)
Those in sex work networks	2 (0.3)
Boyfriend, husband or other intimate partner	4 (0.7)

Friend	2 (0.3)
Other	3 (0.5)
Not Applicable	515 (95.0)
Does your main partner know that you exchange sex for money, drugs or other goods or services?	
Yes	77 (14.2)
No	264 (48.7)
I do not have a main partner	197 (36.3)
Don't know	4 (0.7)
If YES, how supportive is your main partner of your involvement in sex work?	
Very supportive	11 (2.0)
Supportive	8 (1.4)
Somewhat supportive	24 (4.4)
Unsupportive	17 (3.1)
Very unsupportive	17 (3.1)
Not applicable	465 (85.7)
Do you think you can secure another employment other than sex work and earn as much money?	
Yes	418 (77.1)
No	96 (17.7)
Don't Know	28 (5.1)

### 13. SEX WORKER STIGMA

Items assessing sex work stigma were adapted from the Sex Worker Stigma Index [72]. Respondents were assessed on their thoughts about other people's reactions once they found out that they were engaged in sex work. Responses were rated on a 4-point scale, with 1= strongly disagree, 2= disagree, 3= agree, and 4 = strongly agree. As presented in Table 13.1 below, the overall mean score was 29.8 (SD= 7.7, actual range = 10-40), indicating moderate levels of sex worker stigma (Cronbach's alpha = 0.92). Respondents were more concerned that people would think they are immoral if they disclosed being a sex worker (mean=3.2, SD= 0.9), being treated differently by family members (mean= 3.1, SD= 0.9), and being hit by a husband if they found out (mean= 3.1, SD= 0.9). Individual responses are presented in Table A.8 of the Appendix.

Table 13.1. Sex Worker Stigma Index (N= 542)

Statement	Mean (SD)
I feel that if I disclosed being a sex worker to some people, they would not talk	_
to me anymore	2.9 (1.0)
I feel that if I disclosed being a sex worker to some people they would not talk	
to my family	2.9 (1.0)

I feel that if I disclosed being a sex worker to some people would think I was	
immoral	3.2 (0.9)
I feel that if I disclosed being a sex worker to some people, I would be	
threatened with violence	2.9 (0.9)
I feel that if I disclosed being a sex worker to some people, they would treat	
me differently	3.1 (0.9)
I feel that if I disclosed being a sex worker to my husband, he would hit me	2.7 (1.1)
I feel that if I disclosed being a sex worker to my husband, he would not talk to	
me anymore	2.7 (1.1)
I feel that if I disclosed being a sex worker to my family, I would not be able to	
see my children	2.8 (1.0)
I feel that if I disclosed being a sex worker to my family, they would desert me	3.0 (0.9)
I feel that if I disclosed being a sex worker to my family, they would treat me	
differently	3.1 (0.9)
Total Mean Score	29.8 (7.7)
Range	10-40

#### **14. ARREST HISTORY**

Questions in this section were adapted from Undarga and Nova studies [46,48]. Respondents were asked if they had ever been arrested, the reasons for their arrest, ever spent time in jail or prison after being charged in court, and if they had been arrested in the past 30 days. Responses are presented in Table 14.1. At baseline, 24.9% (n=135) of respondents reported that they had ever been arrested. The mean age at which they were arrested was 26.6 (SD=6.6, range 14 – 47). The most common reason for getting arrested was sex work (40%, n=54). Only 4% (n=24) of respondents reported that they were charged in court with a criminal offense following their arrest. About 2.9% (n=16) of respondents had been arrested in the past 30 days.

**Table 14.1 Arrest History** 

	Yes	No
Statement	n (%)	n (%)
Have you ever been arrested? (Yes)	135 (24.9)	407 (75.0)
What was the reason for your arrest (all that apply)		
drug possession	2 (1.4)	133 (98.5)
selling drugs	3 (2.2)	132 (97.7)
transport of drugs	2 (1.4)	133 (98.5)
burglary/theft	17 (12.5)	118 (87.4)
assault/violent crime	14 (10.3)	121 (89.3)
administrative violation	19 (14.0)	116 (85.9)
exchanging sex for money/sex work	54 (40.0)	81 (60.0)
other	47 (34.8)	88 (65.1)

Have you ever spent time in jail after being charged in		
court (Yes)	16 (2.9)	119 (21.9)
Have you been arrested in the past 30 days? (Yes)	16 (2.9)	526 (97.0)
Were you charged in court with a criminal offence		
following your arrest? (Yes)	24 (4.4)	111 (20.4)

### 15. GENDER-BASED VIOLENCE

#### **Domestic Violence Attitudes**

Questions in this section were adapted from the COMPASS Program questionnaire [73]. Items assessed whether a husband would be justified to hit or beat his wife if he was annoyed or angered by what the wife does. Responses are presented in Table 15.1 below. Over half of the respondents thought it was OK for a husband to beat or hit his wife for various reasons, including going out without telling him (64.8%, n=350), failure to care for her children properly (63.6%, n=354), or if wife refuses to have sex with him (59%, n=320).

Table 15.1. Domestic Violence Attitudes (N=542)

	•		Don't	No
	Yes	No	Know	Response
Statement	n (%)	n (%)	n (%)	n (%)
Is it OK for a husband to beat or hit his				
wife if she goes out without telling him	350 (64.8)	178 (32.8)	14 (2.5)	0(0.0)
Is it OK for a husband to beat or hit his				
wife if she does not care for her children				
in the proper way?	345 (63.6)	191 (35.2)	5 (0.9)	1 (0.1)
Is it OK for a husband to beat or hit his				
wife if she argues with him?	316 (58.3)	216 (39.8)	9 (1.6)	1 (0.1)
Is it OK for a husband to beat or hit his				
wife if she refuses to have sex with him?	320 (59.0)	213 (39.3)	9 (1.6)	0(0.0)
Is it OK for a husband to beat or hit his				
wife if she burns the food?	284 (52.4)	250 (46.1)	8 (1.4)	0 (0.0)

## **Intimate Partner Violence**

Questions in this section were adapted from the Revised Conflict Tactics Scale [74]. Respondents were asked about their experiences with physical or sexual abuse by others, since the age of 18. This included harassment from partners, customers, acquaintances, bosses, family members, or other individuals. Results are presented in Table 15.2. More than half of the respondents (67.3%, n= 365) had been called insulting names and had their property destroyed, 60.7% (n= 329) had been forced to have sex without a condom, and 53.8% (n=292) had been forced to have sex against their will.

**Table 15.2 Intimate Partner Violence (N=542)** 

		Happened in
	Yes	the last three
Statement	n (%)	months
Called you insulting names, such as fat or ugly, slut or whore,		
destroyed something that belonged to you, or accused you of		
being a lousy lover?	365 (67.3)	177 (32.6)
Twisted your arm, or thrown something at you that could hurt, or		
pushed, grabbed or slapped you?	286 (52.7)	256 (47.2)
Prevented you from seeing family or friends, held you captive,		
stalked you, or verbally threatened to hurt you or your family?	74 (13.6)	468 (86.3)
Kicked you, slammed you against a wall, beaten you up, punched		
or kicked you, hit you with something that could hurt or burned or		
scalded you on purpose?	209 (38.5)	333 (61.4)
Broken bones, cuts, bruises or other injuries that required medical		
care because of a fight?	53 (9.78)	489 (90.2)
Deprived you of food, water, or sleep?	122 (22.5)	420 (77.4)
Insisted you have sex even though you didn't want to?	292 (53.8)	250 (46.1)
Forced you to have sex without a condom?	329 (60.7)	213 (39.3)
Used force or threatened to use force to make you have sex with		
other men in exchange for money or drugs?	87 (16.05)	455 (83.9)

### **Economic Abuse**

Respondents' experiences of economic abuse were assessed by asking questions related to things some men or women do to hurt others financially, for example, making them ask for money, demand to know how money was spent, make important financial decisions without talking to them first [75, 76]. Responses were rated on a 5-point scale, with 1 = never, 2 = hardly ever, 3 = sometimes, 4 = often, and 5 = quite often. Respondents rated highly items related to being asked for money by both an intimate partner (mean= 2.9, SD= 1.3) or a family member (mean= 2.2, SD =1.4); intimate partner keeping financial information from them (mean= 2.5, SD= 1.4), and not making important financial decisions without talking to their intimate partner (mean= 2.4, SD=1.3). Results are presented in Table 15.3 below. Individual responses are presented in Table A.9 of the Appendix.

Table 15.3. Economic Abuse (N= 542)

	Current or Past	
	Intimate Partner	Family Member
Statement	Mean, SD	Mean, SD
Make you ask him/her for money	2.9 (1.3)	2.2 (1.4)
Demand to know how money was spent.	2.3 (1.3)	1.8 (1.2)
Demand that you give him/her receipts and/or change		
when you spend money.	1.9 (1.2)	1.5 (1.0)
Keep financial information from you	2.5 (1.4)	1.9 (1.3)
Make important financial decisions without talking to you		
first.	2.4 (1.3)	1.8 (1.2)
Threaten you to make you leave work	1.9 (1.3)	1.5 (1.0)
Demand that you quit your job.	1.9 (1.3)	1.5 (1.1)
Beat you up if you said you needed to go to work.	1.6 (1.1)	1.3 (0.9)
Do things to keep you from going to your job.	1.7 (1.2)	1.4 (1.0)
Spend the money you need for rent or other bills	2.1 (1.3)	1.5 (1.1)
Pay bills late or not pay bills that were in your name or		
both your names.	2.0 (1.3)	1.5 (1.0)
Borrow money or purchase things on credit under your		
name.	1.6 (1.1)	1.5 (1.1)

### **16. SEXUAL BEHAVIOR**

# **Sex Life**

Participants were assessed on a range of experiences related to love and having a romantic partner/boyfriend/girlfriend, using items from the modified Risk Behavior Scale [76, 77]. The average age for respondents' first sexual debut was 16.7 years (range: 10-33). At baseline, 59.9% (n=325) of respondents had a romantic partner, 37.2% (n=202) reported a boyfriend as their main partner, and 14% (n=80) reported their spouse. On average, respondents had been in a relationship with their main partner for about 3.6 years (range: 0-28).

In addition, respondents' most recent experiences with a sexual partner (paying partner or main partner) in the past month were assessed. Results are presented in Table 16.1 below. The majority of respondents (78%, n=423) reported a paying customer. Among those who reported a main partner (n=325), 32.2% (n=175) reported their boyfriend as their last sexual partner.

**Table 16.1 Sex Life (N=542)** 

Statement	Frequency
Statement  Do you currently have someone who you consider to be your main	n (%)
partner	
Yes	325 (59.9)
No	217 (40.0)
	,
Your main partner is:	
Boyfriend	202 (37.2)
Spouse	80 (14.7)
Ex-Boyfriend	9 (1.6)
Ex-Spouse	6 (5.1)
Regular sexual partner or lover	28 (5.1)
Not applicable	217 (40.0)
What relationship do you have with your most recent sexual partner?	
Spouse	17 (3.1)
Boyfriend	42 (7.5)
Casual partner	60 (11.0)
Customer who paid you in cash, goods, or other services	423 (78.0)
What relationship do you have with your most recent intimate	
partner/regular partner (if you have one)	
Spouse	135 (24.9)
Boyfriend	175 (32.2)
Casual partner	83 (15.3)
Not applicable	149 (27.4)
Did you perform oral sex on your most recent sexual partner in the past 30 days	
Yes	110 (20.3)
No	432 (79.7)
Did you perform oral sex on your intimate partner/regular partner if you	
have one?	
Yes	33 (6.0)
No	77 (14.2)
Not applicable	432 (79.7)
Did you have anal sex with your most recent sexual partner in the past 30 days	
Yes	7 (1.2)
No	535 (98.7)
Did you have anal sex with your intimate partner /regular partner if you have one?	
Yes	2 (0.3)
	()

No	286 (52.7)
Not applicable	254 (46.8)

# **Condom Self-Efficacy**

Items in this section were adapted from the Condom Self-Efficacy Scale [79]. Respondents were assessed on their confidence in using condoms with a male sexual partner. The 8-items were rated on 3-point scale, with, 1=very confident, 2=somewhat confident, and 3=not at all confident. All items were reverse coded such that higher scores indicate higher levels of condom self-efficacy. The total mean score was 19.0 (SD=4.7, range 8-24) indicating moderate levels of condom use self-efficacy. Results are represented in Table 16.2 below and individual responses are presented in Table A.10 of the Appendix.

Table 16.2. Condom Self-Efficacy (N=542)

Statement	Mean (SD)
Put a male condom on a hard penis?	2.7 (0.7)
Unroll a male condom down correctly on the first try?	2.5 (0.7)
Start over with a new male condom if you placed it on the wrong way?	2.4 (0.9)
Unroll a male condom fully to the base of the penis?	2.5 (0.7)
Squeeze air from the tip of a male condom?	2.2 (0.9)
Take a male condom off without spilling the semen or cum?	2.5 (0.8)
Take a male condom off before your partner loses his hard on?	2.4 (0.8)
Use spermicide or lubricant with a male condom?	1.7 (0.9)
Total Mean Score	19.0 (4.7)
Range	8-24

In addition, respondents were asked to indicate whether any of the actions in the self-efficacy scale above, actually happened with their most recent sexual partner. About 69.3% (n= 376) reported putting a male condom on a hard penis, 68.6% (n= 372) stated they had unrolled a male condom down correctly on the first try, and 67.3% (n=363) stated they unrolled a male condom fully to the base of the penis. Results are presented in Table 16.3.

Table 16.3 Condom Self-Efficacy During the Most Recent Sexual Encounter (N=542)

	Yes	No
Statement	n (%)	n (%)
Put a male condom on a hard penis	376 (69.3)	166 (30.6)
Unroll a male condom down correctly on the first try	372 (68.6)	170 (31.3)
Start over with a new male condom if you placed it on the wrong		
way	241 (44.6)	299 (55.3)
Unroll a male condom fully to the base of the penis	363 (67.3)	176 (32.6)
Squeeze air from the tip of a male condom	276 (51.6)	258 (48.3)
Take a male condom off without spilling the semen or cum	334 (62.0)	204 (37.9)
Take a male condom off before your partner loses his hard on	320 (59.1)	221 (40.5)
Use spermicide or lubricant with a male condom	119 (22.3)	413 (77.6)

## **Condom Use Communication Self-Efficacy with an Intimate Partner**

Questions in this section were adapted from the Couple's Communication Scale [80]. The 7-item scale assesses the extent of sexual communication within couples. Specifically, respondents were asked whether the statements related to condom use self-efficacy had happened during their last sexual encounter with an intimate partner. Responses were rated on a 5-point scale, with 1= Definitely no, 2= Probably no, 3= Maybe, 4= Probably yes and 5 = Definitely yes. The total mean score was 24.8 (SD= 7.5, actual range = 7-35), indicating moderate levels of condom use communication self-efficacy with an intimate partner. Results are presented in Table 16.4 below and individual responses are presented in Table A.11 of the Appendix.

Table 16.4. Condom Use Communication Self-Efficacy with an Intimate Partner (N=542)

Statement	Mean (SD)
Can you discuss condom use with your intimate or casual partner?	3.8 (1.2)
Can you insist on condom use if your partner does not want to use one?	3.5 (1.3)
Can you stop and look for condoms when you're sexually aroused?	3.5 (1.3)
Can you insist on condom use every time even when you are under the	
influence of alcohol or drugs?	3.4 (1.4)
Can you insist on condom use every time when your intimate or casual	
partner is under the influence of alcohol or drugs?	3.5 (1.3)
Can you put a condom on your partner without feeling as if it is "spoiling the	
mood?"	3.3 (1.3)
Can you insist on condom use every time even if you or your partner uses	
another method to prevent on pregnancy?	3.5 (1.3)
Total Mean Score	24.8 (7.5)
Range	7-35

Respondents were then asked whether communication on items in Table 16.4 actually happened during the last sexual encounter with an intimate partner. Responses were rated on a 5-point scale, with 1= Definitely no, 2= Probably no, 3= Maybe, 4= Probably yes and 5 = Definitely yes. The total mean score was 17.0 (SD= 9.2, range = 7-35), indicating lower condom use communication self-efficacy during the sexual encounter. Results are presented in Table 16.5 below and individual responses are presented in Table A.12 of the Appendix.

Table 16.5. Condom Use Communication Self-Efficacy During the Last Sexual Encounter with an Intimate Partner (N=542)

Statement	Mean (SD)
Discussed condom use with your intimate or casual partner?	2.6 (1.5)
Insisted on condom use even when your partner did not want to use one.	2.5 (1.4)
Stopped and looked for condoms when you were sexually aroused.	2.3 (1.4)
Insisted on condom use every time even when you were under the influence	
of alcohol or drugs.	2.3 (1.4)

Total Mean Score Range	17.0 (9.2) 7-35
Insisted on condom use every time even when you or your partner used another method to prevent pregnancy.	2.4 (1.4)
Put a condom on your partner without feeling as if it was "spoiling the mood."	2.4 (1.4)
under the influence of alcohol or drugs.	2.4 (1.4)
Insisted on condom use every time when your intimate or casual partner was	

# Condom Use Communication Self-Efficacy with a Paying Customer

Similarly, condom use self-efficacy with a paying customer was assessed using the same scale. Responses were rated on a 5-point scale, with 1= Definitely no, 2= Probably no, 3= Maybe, 4= Probably yes and 5 = Definitely yes. The overall total mean score was 20.8 (SD= 4.4, range 5-25), indicating high levels of condom use self-efficacy with a paying customer. Responses are presented in Table 16.6. Individual responses are presented in Table A.13 of the Appendix.

Table 16.6 Condom Use Communication Self-Efficacy with a Paying Customer (N=542)

Statement	Mean (SD)
Can you discuss condom use with a customer?	4.4 (0.8)
Can you insist on condom use if your customer does not want to use one?	4.1 (1.1)
Can you insist on condom use with a customer every time even when you are	
under the influence of alcohol or drugs?	4.0 (1.1)
Can you insist on condom use every time when your customer is under the	
influence of alcohol or drugs?	4.0 (1.1)
Can you insist on condom use every time even if you or your customer uses	
another method to prevent on pregnancy?	4.1 (1.0)
Total Mean Score	20.8 (4.4)
Range	<b>5-25</b>

Respondents were then asked whether communication on items in Table 16.6 actually happened during the last sexual encounter with a paying customer. Responses were rated on a 5-point scale, with 1= Definitely no, 2= Probably no, 3= Maybe, 4= Probably yes and 5 = Definitely yes. The total mean score was 19.4 (SD=6.0, range 5-25), indicating moderate levels of condom use communication self-efficacy during the last sexual encounter with a paying customer. Results are presented in Table 16.7 below and Individual items are presented in Table A.14 of the Appendix.

Table 16.7. Condom Use Communication Self-Efficacy During the Last Sexual Encounter with a Paying Customer (N=542)

Statement	Mean (SD)
Discussed condom use with a customer	4.1 (1.2)
Insisted on condom use even when your customer did not want to use	, ,
one.	3.9 (1.3)
Insisted on condom use every time even when you were under the	
influence of alcohol or drugs.	3.8 (1.4)
Insisted on condom use every time when your customer was under the	
influence of alcohol or drugs.	3.8 (1.4)
Insisted on condom use every time even when you or your customer	
used another method to prevent on pregnancy	3.8 (1.4)
Total Mean Score	19.4 (6.0)
Range	19.4 (6.0) 5-25

### 17. BEHAVIOR SURVEY

### **Alcoholic Use Disorder Identification Test (AUDIT)**

Questions in this section were adapted from the Alcohol Use Disorders Identification Test [81]. The 10-item screening tool was developed to assess alcohol consumption, drinking behaviors, and alcohol-related problems. Results are presented in Table 17.1.

At baseline, 75.2% (n=408) of respondents had ever used alcohol, and 63.1% (n=342) reported using alcohol in the past 30 days. The mean number of days respondents used alcohol in the past 30 days was 11.1 (range: 1-30), with 12.7% (n=69) using alcohol 4 or more times a week. On a daily basis, 8.3% (n=45) of respondents reported inability to stop drinking once they started, and 4.9% (n=27) felt guilt or remorseful after drinking. On a weekly basis, 5.9% (n=32) failed to do what was normally expected from them because they were drinking, 19(3.5%, n=19) were unable to remember what happened the night before, and 4% (n=22) needed an alcoholic drink first thing in the morning to get going. In addition, 1.8% (n=10) of respondents have been injured or know someone who was injured as a result of drinking, and 9.2% (n=50) have someone (relative/friend/doctor or another professional) who expressed concern about their drinking in the last one month.

Table 17.1. Alcoholic Use (N=542)

	Frequency <i>n</i>
Statement	(%)
Have you ever used alcohol?	
Yes	408 (75.2)
No	134 (24.7)

### Have you used alcohol in the past 30 days?

Yes No	342 (63.1) 66 (12.1)
How often do you have a drink containing alcohol?  Never  Monthly or less 2 to 4 times a month 2 to 3 times a week 4 or more times a week	232 (42.8) 88 (16.2) 94 (17.3) 59 (10.8) 69 (12.7)
How many drinks containing alcohol do you have on a typical day when you are drinking?  1 or 2  3 or 4  5 or 6  7 to 9  10 or more Not applicable	218 (40.2) 44 (8.1) 17 (3.1) 11 (2.0) 20 (3.6) 232 (42.8)
How often do you have six or more drinks on one occasion?  Never Less than monthly  Monthly  Weekly  Daily or almost daily	342 (63.1) 90 (16.61) 23 (4.2) 54 (9.9) 33 (6.0)
How often during the last one month have you found that you were not able to stop drinking once you had started?  Never  Less than monthly  Monthly  Weekly  Daily or almost daily	361 (66.6) 73 (13.4) 28 (5.1) 35 (6.4) 45 (8.3)
How often during the last one month have you failed to do what was normally expected from you because of drinking?  Never Less than monthly Monthly Weekly Daily or almost daily	416 (76.7) 72 (13.2) 15 (2.7) 32 (5.9) 7 (1.2)
How often during the last one month have you been unable to remember what happened the night before because you had been drinking?  Never Less than monthly  Monthly  Weekly  Daily or almost daily	462 (85.2) 41 (7.5) 15 (2.7) 19 (3.5) 5 (0.9)

How often during the last one month have you needed an alcoholic drink	
first thing in the morning to get yourself going after a night of heavy	
drinking? Never	457 (84.3)
Less than monthly	43 (7.9)
Monthly	11 (2.0)
Weekly	22 (4.0)
Daily or almost daily	9 (1.6)
How often during the last one month have you had a feeling of guilt or	
remorse after drinking?	
Never	424 (78.2)
Less than monthly	54 (9.9)
Monthly	21 (3.8)
Weekly	16 (2.9)
Daily or almost daily	27 (4.9)
Have you or someone else been injured as a result of your drinking?	
Never	463 (85.4)
Less than monthly	53 (9.7)
Monthly	11 (2.0)
Weekly	10 (1.8)
Daily or almost daily	5 (0.9)
Has a relative, friend, doctor, or another health professional expressed	
concern about your drinking or suggested you cut down?	
No	449 (82.8)
YES, but not in the last one month	43 (7.9)
YES, during the last one month	50 (9.2)

# **Drug Use**

Questions in this section were adapted from the modified Risk Behavior Scale [82], and the Renaissance study [83]. Items assessed women's experiences with drugs, including which drugs they may use and how often. Responses are presented in Table 17.2.

At baseline, 19.1% (n=104) of the respondents reported having ever used stimulants (e.g., cocaine, tobacco, marijuana, shisha, petrol). Of these, 13.6% (n=74) had used stimulants in the past 30 days (mean = 16.8 days, range = 1-30). In addition, 4.9% (n=27) of respondents had ever used depressants (e.g., Valium, Pilton), 3.1% (n=17) had used depressants in the past 30 days (mean = 4.5 days, range 1-15). About 1.4% (n=8) had ever used Opioids (e.g., heroin, morphine, prescribed opioids, tramadol, dorsomorphin), only 4 respondents had used opioids in the past 30 days (mean = 8.8 days, range 1-30). About 8.3% (n=45) reported having used cannabis (marijuana), 4.8% (n=26) had used cannabis in the past 30 days (mean = 11.7 days, range 1-30).

Table 17.2. Drug use (N= 542)

Statement	Frequency n (%)
Have you ever used stimulants (e.g., cocaine, mira, tobacco,	( / 5)
marijuana, kuba, shisha, petrol)?	
Yes	104 (19.1)
No	438 (80.8)
Have you used stimulants in the past 30 days?	
Yes	74 (13.6)
No	30 (5.5)
Not applicable	348 (80.8)
Have you ever used depressants (for example, Valium, Pilton)?	
Yes	27 (4.9
No	515 (95.0)
Have you used depressants in the past 30 days?	
Yes	17 (3.1)
No	10 (1.8
Not applicable	515 (95.0)
Have you ever used opioids (for example, heroin, morphine, prescribed opioids, tramadol, dorsomorphin)?	
Yes	8 (1.4)
No	534 (98.5)
Have you used opioids in the past 30 days?	
Yes	4 (0.74)
No	4 (0.74)
Not applicable	534 (98.5)
Have you ever used cannabis (marijuana)?	
Yes	45 (8.3)
No	497 (91.7)
Have you used cannabis in the past 30 days?	
Yes	26 (4.8)
No	19 (3.5)
Not applicable	497 (91.7)
Have you ever used any other drugs that we did not mention here?	
Yes	16 (2.9)
No	526 (97.0)
Have you used them in the past 30 days?	
Yes	13 (2.4)
No	3 (0.5)

Not applicable 526 (97)

# **Needle Sharing Behaviors**

At baseline, only 2 respondents had injected drugs; one at age 20 and their other did not remember how old she was. The two respondents were introduced to the practice by friends and they were injected by them on the first time. Both participants reported that they had a secure place to inject the drugs, and that the place was accessible when they needed it. This place was identified as "a friend's place". In the past 30 days, one participant injected drugs 5 times, and the other 25 times. Both participants reported that they had shared needles or syringes with someone else in the past 30 days. The drugs that the two participants had injected in the past 30 days are Heroin and Methamphetamine. One participant had injected drugs with a friend and the other with a paid partner in the past 30 days. Regarding splitting a drug solution, one participant split drug solution on 10 days and the other split a drug solution on 25 days with another.

#### 18. PEER NORMS

Peer norms were measured using items tested in Nova and Undarga studies [46, 84]. The 3-items assessed respondents' views of how other women act. For each statement, responses were rated on a 4-point scale with *0=None*, *1=A few*, *2=Most and 3= All*. The total mean score of the scale was 6.82 (SD=1.5, range = 3-12), indicating moderate views. Respondents moderately ranked knowing women who use a condom every time, women who are concerned about HIV and STIs, as well as women who take the responsibility for protecting their partners against HIV and STIs. Results are presented in Table 18.1 below. Individual responses are presented in Table A.15 of the Appendix.

Table 18.1 Peer Norms (N=542)

Statement	Mean (SD)
How many women DO YOU KNOW who you think use a condom every time	
they have sex?	2.23 (0.6)
How many women DO YOU KNOW who you think are concerned about HIV,	
Hepatitis C, or sexually transmitted infections?	2.33 (0.6)
How many women DO YOU KNOW who you think take responsibility for	
protecting their partners from HIV, Hepatitis or sexually transmitted infections?	2.24 (0.6)
Total Mean Score	6.82 (1.5)
Range	3-12

#### 19. CHILDHOOD SEXUAL ABUSE

Childhood sexual abuse was assessed using items adapted from Project Nova [46]. The 8-items assess the sexual experiences that participants might have experienced when they were 18 years and younger, from someone older than themselves, including a relative, family friend or a stranger. More than half of respondents (66.2%, n= 359) reported being touched or fondled in a sexual way by an adult, other than a relative, 63.4% (n=344) reported someone touching their body in a sexual way, 43.7% (n=237) reported someone attempted to have sexual intercourse with them, and 39.3% (n=213) reported that an adult actually had sexual intercourse with them. Responses are presented in Table 19.1 below.

**Table 19.1 Childhood Sexual Abuse (N= 542)** 

Table 19.1 Cilidifood Sexual Abuse (N= 342)	Yes	No	Don't Know
Statement	n (%)	n (%)	n (%)
When you were 18 years old or younger did an adult			_
or someone at least 5 years older than you touch or			
fondle you in a sexual way?	359 (66.2)	179 (33.0)	4 (0.74)
When you were 18 years old or younger did an adult			
or someone at least 5 years older than you have you			- 4
touch their body in a sexual way?	344 (63.4)	195 (35.9)	3 (0.55)
When you were 18 years old or younger did an adult			
or someone at least 5 years older than you attempt	007 (40.7)	000 (55.0)	0 (0 07)
oral, anal, or vaginal intercourse with you?	237 (43.7)	303 (55.9)	2 (0.37)
When you were 18 years old or younger did an adult			
or someone at least 5 years older than you actually have oral, anal, or vaginal intercourse with you?	213 (39.3)	326 (60.1)	3 (0.55)
When you were 18 years old or younger did a	213 (39.3)	320 (00.1)	3 (0.55)
relative touch or fondle you in a sexual way?	65 (11.9)	475 (87.6)	2 (0.37)
When you were 18 years old or younger did a	03 (11.0)	+73 (07.0)	2 (0.07)
relative have you touch their body in a sexual way?	59 (10.9)	482 (88.9)	1 (0.18)
When you were 18 years old or younger did a	33 (13.3)	.02 (00.0)	. (5.15)
relative attempt oral, anal, or vaginal intercourse with			
you?	38 (7.01)	502 (92.6)	2 (0.37)
When you were 18 years old or younger did a	,	,	,
relative actually have oral, anal, or vaginal			
intercourse with you?	21 (3.87)	517 (95.7)	2 (0.37)

### 20. HIV/AIDS

Given that respondents live in HIV/AIDS-impacted communities, and are at a greater risk of HIV transmission, it was critical to assess their HIV knowledge, prevention attitudes, and adherence to medication for those who were living with HIV. All questions in this section were tested in our Suubi and Bridges studies [49-56] and Nova study [46].

# **HIV Knowledge Questionnaire (HIV-KQ-18)**

Items were adapted from the Brief HIV Knowledge Questionnaire [85]. Respondents were asked to indicate whether the statements related to HIV transmission were *true* or *false*. Response options included: *1=True*, *2=False*, *and 3=Don't Know*. Results are presented in Table 20.1 below.

Overall, most respondents demonstrated knowledge of the false statements about HIV i.e., a person can get HIV by sharing a glass of water with someone who has HIV (69.1%, n=375), all pregnant women infected with HIV will have babies born with AIDS (69.9% n=379), a person can get HIV by sitting in a swimming pool with a person who has HIV (57.3%, n=311). Besides, respondents also demonstrated knowledge of the true statements i.e., there is a female condom that can help decrease a woman's chance of getting HIV (86.1%, n=467), having sex with more than one partner can increase a person's chance of being infected with HIV (90.9%, n=493).

**Table 20.1 HIV Knowledge Questionnaire (N= 542)** 

			Don't
	True	False	Know
Statement	n (%)	n (%)	n (%)
Coughing and sneezing DO NOT spread HIV	256 (47.2)	184 (33.9)	102 (18.8)
A person can get HIV by sharing a glass of water with			
someone who has HIV	97 (17.90)	375 (69.1)	70 (12.92)
Pulling out the penis before a man climaxes/cums keeps a			
woman from getting HIV during sex	186 (34.3)	257 (47.4)	99 (18.27)
A woman can get HIV if she has anal sex with a man	347 (64.0)	70 (12.92)	125 (23.0)
Showering, or washing one's genitals/private parts, after			
sex keeps a person from getting HIV	152 (28.0)	293 (54.0)	97 (17.90)
All pregnant women infected with HIV will have babies born			
with AIDS	120 (22.1)	379 (69.9)	43 (7.93)
People who have been infected with HIV quickly show			
serious signs of being infected	185 (34.1)	309 (57.0)	48 (8.86)
There is a vaccine that can stop adults from getting HIV	413 (76.2)	54 (9.96)	75 (13.84)
People are likely to get HIV by deep kissing, putting their			
tongue in their partner's mouth, if their partner has HIV	263 (48.5)	191 (35.2)	88 (16.24)
A woman cannot get HIV if she has sex during her period	110 (20.3)	299 (55.1)	133 (24.5)
There is a female condom that can help decrease a			
woman's chance of getting HIV	467 (86.1)	20 (3.69)	55 (10.15)
A person will NOT get HIV if she or he is taking antibiotics.			
(e.g., Amoxillin, ampiclox, cypro)	186 (34.3)	250 (46.1)	106 (19.5)
Having sex with more than one partner can increase a			
person's chance of being infected with HIV	493 (90.9)	24 (4.43)	25 (4.61)
Taking a test for HIV one week after having sex will tell a			
person if she or he has HIV	260 (47.9)	193 (35.6)	89 (16.42)
A person can get HIV by sitting in a swimming pool with a			
person who has HIV	106 (19.5)	311 (57.3)	125 (23.0)
A person can get HIV from oral sex	309 (57.0)	104 (19.1)	129 (23.8)

In addition, respondents demonstrated knowledge of the most unsafe and high-risk behaviors for HIV transmission, i.e., having unprotected sex (95.9%, n=520), and sharing a needle with an HIV positive person (93.0%, n=515). However, respondents also rated some behaviors which are considered safe, as unsafe. For example, 56.2% (n=305) reported that kissing an HIV positive person is risky, and about 28.6% (n=155) reported that touching a toilet seat that an HIV positive person has touched is unsafe. Responses are presented in Table 20.2 below.

Table 20.2. HIV/AIDS Transmission Knowledge (N=542)

	Safe	Unsafe	Not Sure
Statement	n (%)	n (%)	n (%)
Sharing needles or syringes with an HIV/AIDS infected			
person	17 (3.14)	515 (95.0)	10 (1.85)
Having unprotected sex with an HIV/AIDS infected			
person	10 (1.85)	520 (95.9)	12 (2.21)
Holding hands with an HIV/AIDS infected person	394 (72.6)	79 (14.58)	69 (12.73)
Touching toilet seats, spoons, cups or other objects after			
a person infected with HIV/AIDS	296 (54.6)	155 (28.6)	91 (16.79)
Kissing a person who is infected with HIV/AIDS	158 (29.1)	305 (56.2)	79 (14.58)

General knowledge of HIV/AIDS was also assessed by asking respondents to indicate which of the 12 statements were correct about HIV/AIDS. Response options were: 3 = True, 2 = false and 1 = Don't Know. Responses are presented in Table 20.3. Similar to HIV-KQ-18 questions, there was some variability in respondents' HIV general knowledge. Most respondents were able to accurately answer items such as, "If a person has a sexually transmitted infection (STI) they are at a greater risk of becoming infected with HIV" (89.4% n=485), and "A person can test negative for the HIV, but still be infected and pass the virus onto others" (77.3% n=419).

Table 20.3. HIV/AIDS General Knowledge (N=542)

	True	False	Don't Know
Statement	n (%)	n (%)	n (%)
People living with HIV can become re-infected with			
the virus.	245 (45.2)	192 (35.4)	105 (19.3)
With the new HIV medications, HIV infection is no			
longer a danger	286 (52.7)	182 (33.5)	74 (13.65)
Careful cleansing after sex will help protect you from			
HIV and other STIs	231 (42.6)	232 (42.8)	79 (14.58)
A person can test negative for the HIV virus, but still			
be infected and pass the virus onto others	419 (77.3)	57 (10.52)	66 (12.18)

If a person has an STI, they are at a greater risk of			
becoming infected with HIV	485 (89.4)	20 (3.69)	37 (6.83)
Vaseline or oil-based lubricants are effective when			
used with a condom.	200 (36.9)	95 (17.5)	247 (45.5)
STIs always have symptoms	468 (86.3)	40 (7.38)	34 (6.27)
Having unprotected anal sex	352 (64.9)	84 (15.5)	106 (19.5)
While injecting, you won't get HIV/AIDS if you clean			
a syringe/needle with alcohol	146 (26.9)	229 (42.2)	167 (30.8)
While injecting, you won't get HIV/AIDS if you clean			
a syringe with boiled water	218 (40.2)	193 (35.6)	131 (24.1)
While injecting, you won't get HIV/AIDS if you use			
your own syringe whenever loading from a common			
container	160 (29.5)	216 (39.8)	166 (30.6)
While injecting, you won't get HIV/AIDS if you add			
human blood into the drug when preparing it	96 (17.71)	281 (51.8)	165 (30.4)

# **HIV Stigma Scale**

Items measuring HIV-related stigma were adapted from the HIV Stigma Scale [86]. Respondents were asked to indicate how true each statement was on a 4-point Likert scale, with 1=Strongly Disagree, 2=Disagree, 3=Agree, and 4=Strongly Agree. Results are presented in Table 20.4. The total mean score was 13.1 (SD= 2.71, actual range = 6-24) indicating moderate levels of HIV-related stigma. High scores were recorded on items such as "People who have HIV/AIDS face verbal abuse" (mean= 3.1, SD= 0.95), and "People living with HIV/AIDS face rejection from their peers" (mean= 3.1, SD= 0.94). Individual responses are presented in Table A.16 of the Appendix.

**Table 20.4. HIV Stigma (N= 542)** 

Statement	Mean (SD)
People who have HIV/AIDS face verbal abuse	3.1 (0.95)
People living with HIV/AIDS face rejection from their peers	3.1 (0.94)
People who have HIV/AIDS should be treated the same as everyone else	1.5 (0.73)
People with HIV/AIDS do not deserve any support.	1.8 (0.99)
People with HIV/AIDS should not have the same freedoms as other people.	1.8 (0.98)
People living with HIV/AIDS should be treated similarly by health care	
professionals as people with other illnesses.	1.5 (0.80)
Total Mean Score	13.1 (2.71)
Range	6-24

#### **HIV Prevention Discussions with Sexual Partners**

Respondents were asked if they had discussed HIV prevention-related issues with their sexual partners. Results are presented in Table 20.5 below. Respondents agreed to the statements related to discussing HIV testing (67.9% n=368), using condoms (84.3% n=457), and "ever talked to a sexual partner about the personal risk of HIV" (75.85 n=411).

**Table 20.5. HIV Prevention Discussions with Sexual Partners (N= 542)** 

Tuble 20.0. The Free Harmon Biodessions with October	Yes	No	Don't Know
Statement	n (%)	n (%)	n (%)
In the last 30 days, did you discuss HIV testing			
with any of your sexual partner(s)	368 (67.9)	173 (31.9)	1 (0.18)
In the last 30 days, did you discuss using			
condoms or HIV medications with any of your			
sexual partner(s)	406 (74.7)	135 (24.9)	1 (0.18)
Think about your most recent sexual partner. Did			
you use a condom with your most recent partner			
the last time you had sex	301 (55.5)	241 (44.4)	0
Have you ever talked with this person about using			
condoms	457 (84.3)	84 (15.50)	1 (0.18)
Have you ever talked to this person about			
personal risk of HIV	411 (75.8)	129 (23.8)	2 (0.37)
Have you ever talked with this person about			
preventing HIV transmission	416 (76.7)	122 (22.5)	4 (0.74)
Have you ever asked this person to use a condom	468 (86.3)	74 (13.65)	0
Do you regularly receive financial support from			
this person	420 (77.4)	122 (22.5)	0

## **HIV Testing**

At baseline, 98.7% (n=535) of the respondents reported that they had been tested for HIV. Of these, 35.4% (n=192) reported having received an HIV positive test result and 34.3% (n=186) had already been enrolled on ART. However, only 2% (n=13) knew their viral counts. When asked about their risk of getting HIV, 20% (n=111) of the respondents stated that there was "a very great chance" of them getting HIV and 19% (n=106) reported that there was "some chance" of them getting the virus. Responses are presented in Table 20.6 below.

Table 20.6. HIV Testing (N=542)

	Frequency
Statement	n (%)
Have you ever been tested for HIV/AIDS	
Yes	535 (98.7)
No	7 (1.29)

Have you ever been told by a health professional, following HIV testing, that you are HIV positive?	
Yes	192 (35.4)
No	343 (63.2)
	,
If yes, have you initiated Anti-Retroviral Therapy (ART)?	
Yes	186 (34.3)
No	6 (1.1)
Do you know your viral load count, as told to you by your health care	
professional?	
Yes	13 (2.40)
No	143 (26.3)
Don't remember	36 (6.64)
Not applicable	350 (64.5)
What would you say your chances are of getting the HIV virus	
Almost certain will NOT get HIV	63 (11.6)
Very small chance	40 (7.38)
Some chance	106 (19.5)
Very great chance	111 (20.4)
Almost certain will get HIV	31 (5.7)
Not applicable	191 (35.2)

### **Adherence to Medication**

We assessed medication adherence for participants who were aware of their HIV status and enrolled on ART (34.3% n=186). Results are presented in Table 20.7. Most respondents (58.4%, n=111) had not missed any of their medication in the past 30 days. The average number of days missed at least one dose of medication was 1.4 (SD= 4.0, range 0-20). More than half of respondents (52.3%, n=100) reported that they had done an "excellent job" at taking their medication, and 63.3% (n=121) reported that they "always" took their HIV medicine as prescribed.

Table 20.7. Medication Adherence (N=186)

Frequency <i>n</i>
(%)
111 (58.4)
29 (15.2)
21 (11.0)
13 (6.84)

4 5 7 10 14	5 (2.63) 1 (0.53) 5 (2.63) 1 (0.53) 1 (0.53)
30	3 (1.58)
In the last 30 days, how good a job did you do at taking your HIV medicine the way you were supposed to?	
Very poor	1 (3.66)
Poor	1 (0.52)
Fair	9 (4.71)
Good	24 (12.4)
Very good	50 (26.1)
Excellent	100 (52.3)
In the last 30 days, how often did you take your HIV medicines in the way you were supposed to?	
Never	3 (1.57)
Rarely	3 (1.57)
Sometimes	8 (4.19)
Usually	11 (5.76)
Almost always	45 (23.5)
Always	121 (63.3)

# 21. Pre-EXPOSURE PROPHYLAXIS (PrEP)

Respondents' views about PrEP use were assessed using items adapted from Ye and colleagues [87]. PrEP —an antiretroviral medication can be prescribed to HIV-negative individuals to prevent them from becoming infected. PrEP medication lowers the chance of getting infected with HIV, if taken once a day before an individual is exposed to HIV. Respondents were asked whether they ever heard of PrEP, whether they think it should be promoted among WESW, as well as their attitudes towards using the medication.

Prior to study enrollment, 59% (n=320) of respondents had heard about PrEP; and of these, 19.7% (n=63) had received a PrEP prescription. When asked whether PrEP should be promoted among WESW, 76.9% (n=246) of respondents stated that it *absolutely should be* promoted and 20.6% (n=66) thought it *should be* promoted among WESW. More than half (60.1%, n=326) indicated that if PrEP were effective and safe, they would be willing to suggest their friend accept it.

In addition, respondents' attitudes towards PrEP use were assessed. Responses were rated on a 5-point scale, with 1=Absolutely unwilling, 2= possibly unwilling, 3= unknown, 4=Possibly willing

and 5= Absolutely willing. As indicated in Table 21.1, the overall mean score was 16.4 (SD =4.9, range = 4-20), indicating positive attitudes towards PrEP use. Individual responses are presented in Table A.17 of the Appendix.

Table 21.1 Attitudes Towards PrEP (N= 542)

Statement	Mean (SD)
If PrEP was safe and effective, how likely would you be willing to use it?	4.0 (1.3)
If PrEP was safe, effective and free, how likely would you be willing to use it?	4.1 (1.2)
If PrEP was safe, effective, free and being used by few people around you,	
how likely would you be willing to use it?	4.0 (1.3)
If PrEP was safe, effective, free and being used by many people around you,	
how likely would you be willing to use it?	4.1 (1.2)
Total Mean Score	16.4(SD=4.9)
Range	4-20

For respondents who indicated an unwillingness to use PrEP i.e., responded with "Absolutely unwilling" or "Possibly unwilling" in Table 21.1 above (n=91), reasons for not accepting to use PrEP are presented in Table 21.2 below. Worries about side effects (41.7%, n= 38), objections from customers (32.9%, n=30) and discrimination by others (n=32.9, n=30) were among the highly ranked reasons.

Table 21.2. Reasons for Unwillingness to Accept PrEP (N=91)

	Yes	No
Reason	n (%)	n (%)
No risk of HIV infection, not necessary	24 (26.3)	67 (73.6)
Worry about the side effects of drugs	38 (41.7)	53 (58.2)
Worry about drugs having no effects	21 (23.0)	70 (76.9)
Worry about discrimination by others	30 (32.9)	61 (67.0)
Worry about objections of customers	30 (32.9)	61 (67.0)
Worry about objection of families	26 (28.5)	65 (71.4)
Worry about the objections of gatekeepers	25 (27.4)	66 (72.5)
Other reason	37 (40.6)	54 (59.3)

In terms of information access, respondents indicated that they would like to get information about PrEP through radios (51.2% n=278), television (44.1%, n=239), doctor (88% n=477), and friends (38.3% n=208). Regarding where the respondents would like to get the PrEP medicines, hospitals (85.2% n=462), AIDS counseling service organizations (74.7% n=405), and Ministry of Health (67.1% n=374) were the most rated. Reasons for selecting these places included "strong protection of privacy" (86.1% n=467), "convenience" (88.5% n=480), and "high level of medical care" (82.1% n=445).

Finally, all respondents were asked about their concerns about PrEP. Responses are presented in Table 21.3 below. Overall, concerns about PrEP side effects (30.8%, n=167), convenience of acquiring drugs (33.5%, n=182) and taking drugs (28.7%, n=156), as well as its effectiveness (28.4%, n=154), were rated highly.

Table 21.3 Concerns about PrEP (N=542)

	Yes	No
Concern	n (%)	n (%)
Effect (effective)	154 (28.4)	388 (71.5)
Safety (side effects)	167 (30.8)	375 (69.1)
Cost	114 (21.0)	428 (78.9)
Convenience of acquiring drugs	182 (33.5)	360 (66.4)
Convenience of taking drugs	156 (28.7)	386 (71.2)
Attitudes of the people around	106 (19.5)	436 (80.4)
Support of sexual partners	87 (16.05)	455 (83.9)
Support of families	84 (15.50)	458 (84.5)
The people around use drugs or not	86 (15.87)	456 (84.1)
Others	18 (3.32)	524 (96.6)

# 22. PERSONAL HEALTH

#### **Physical Health**

Respondents were asked several questions regarding their health including overall life and physical health satisfaction, energy level, medication intake, and history of STIs. Responses are presented in Table 22.1 below. Respondents were generally satisfied with their life. Over half of respondents (52.7%, n=286) were "extremely satisfied" with their life. About 23.4% (n= 127) rated their physical health as "excellent" and 46.8% (n=254) reported that they "sometimes" experienced low energy. In terms of medication intake, 41.7% (n=226) reported that they were taking some form of medication. Of the total sample, 23.8% (n=129) of the respondents had been diagnosed with an STI, including Gonorrhea, Trichomonas, Chlamydia, Syphilis and Herpes.

Table 22.1 Personal Health (N=542)

	Frequency
Variable	n (%)
How satisfied are you with your life overall?	
Extremely satisfied	286 (52.7)
Very satisfied	91 (16.7)
Somewhat satisfied	104 (19.1)
Not very satisfied	41 (7.5)
Not satisfied at all	20 (3.6)

Excellent	127 (23.4)
Good	210 (38.7)
Fair	179 (33.0)
Poor	16 (2.9)
Very poor	10 (1.8)
	, ,
I have low energy:	
Almost always	23 (4.2)
Often	52 (9.5)
Sometimes	254 (46.8)
Almost never	84 (15.5)
Never	129 (23.8)
	(,
Do you take any medications?	
Yes	226 (41.7)
No	316 (58.3)
Have you ever been diagnosed with any Sexually Transmitted	
Disease (STDs)?	
Yes	129 (23.8)
No	413 (76.2)
	,
If yes, have you been diagnosed with: (N= 129)	
Gonorrhea	28 (21.7)
Trichomonas	12 (9.30)
Chlamydia	21 (16.2)
Syphilis	68 (52.7)
Herpes	3 (2.3)
Other STIs	45 (34.8)
	10 (0 1.0)

#### **Biomarker Data**

In addition to self-reports, all respondents provided blood, urine specimens, and vaginal swab specimens to test for common bacterial and viral STIs, including HIV. Testing in a study-certified local laboratory was performed to assess Trichomonas, Chlamydia, Gonorrhea, and HIV. Results are presented in Table 22.2. At baseline, 7.38% (n=40) of respondents tested positive for Trichomonas, 2.58% (n=14) tested positive for chlamydia, 1.29% (n=7) tested positive for Gonorrhea and 40.5% (n=220) tested HIV positive. All respondents with a positive STI diagnosis received treatment. Those who tested HIV positive were initiated on ART, if they were not already enrolled at study initiation.

Table 22.2. Biomarker Results (N=542)

	Positive	Negative
Infection	n (%)	n (%)
HIV	220 (40.5)	322 (59.4)
Chlamydia	14 (2.58)	528 (97.4)
Gonorrhea	7 (1.29)	535 (98.7)

Trichomonas	40 (7.38)	502 (92.6)
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#### 23. MENTAL HEALTH

# **Brief Symptom Inventory (Depression Subscale)**

Items assessing depressive symptoms were adapted from the Brief Symptoms Survey [88]. The 5-items assessed whether respondents had experienced any of the problems listed in the past 7 days, with 1=Not at all, 2=A little bit, 3=Moderately, 4=Quite a bit, and 5=Extremely. Table 23.1 presents the mean scores and standard deviations for each item, and the overall mean score for the subscale. The overall mean score was 10.9 (SD=4.9, range = 6-30), indicating moderate levels of depressive symptoms. Individual responses are presented in Table A.18 of the Appendix.

Table 23.1. Brief Symptom Inventory (N=542)

Statement	Mean (SD)
Thoughts of ending your life	1.4 (0.99)
Feeling lonely even when you are with people	1.8 (1.16)
Feeling sad	2.0 (1.19)
Feeling no interest in things	2.0 (1.22)
Feeling hopeless about the future	1.8 (1.15)
Feelings of worthlessness	1.5 (1.10)
Total Mean Score	10.9 (4.98)
Range	6-30

### **Post-Traumatic Stress Disorder (PTSD)**

Post-traumatic stress disorder was measured using six items adapted from the abbreviated PTSD checklist [89, 90]. Respondents were asked how often the set of problems and complaints in response to stressful life experiences applied to them in the past month. Responses were rated on a 5-point Likert scale, with 1= not at all, 2 = a little bit, 3 = moderately, 4 = quite a bit, and 5 = extremely. Table 23.2 presents the mean scores and standard deviations for each item, and the overall mean score. The total mean score was 13.7 (SD= 5.8, range 6-30), indicating moderate levels of PTSD. Individual responses are presented in Table A.19 of the Appendix.

Table 23.2. Post-Traumatic Stress Disorder (N=542)

Statement	Mean (SD)
Repeated, disturbing memories, thoughts, or images of a stressful	
experience from the past.	2.4 (1.3)
Feeling very upset when something reminded you of a stressful	
experience from the past.	2.6 (1.4)

Avoided activities or situations because they reminded you of a	
stressful experience from the past	2.4 (1.3)
Feeling distant or cut off from other people.	2.0 (1.2)
Feeling irritable or having angry outbursts.	2.4 (1.4)
Difficulty concentrating.	2.0 (1.2)
Total Mean Score	13.7 (5.8)
Range	6-30

# **Social Desirability Scale Short Form C (MC-C)**

Items measuring social desirability were adapted from Marlowee -Crowne Social Desirability Scale Short Form [91]. Respondents were asked to indicate whether the statement related to their personal attitudes and traits was *True or False*. Results are presented in Table 23.3. Some of the statements that were *true* to most of respondents include those related to "feeling resentful when I don't get my way" (70.4%, n=382), "being a good listener" (87.6%, n=475) and "always willing to admit it when I make a mistake" (86.5%, n=469).

Table 23.3. Social Desirability Scale (N=542)

-	True	False
Statement	n (%)	n (%)
It is sometimes hard for me to go on with my work if I am not		
encouraged	231 (42.6)	311 (57.3)
I sometimes feel resentful when I don't get my way	382 (70.4)	160 (29.5)
On a few occasions, I have given up doing something		
because I thought too little of my ability	365 (67.3)	177 (32.6)
There have been times when I felt like rebelling against		
people in authority even though I knew they were right	262 (48.3)	280 (51.6)
No matter who I'm talking to, I'm always a good listener	475 (87.6)	67 (12.36)
There have been occasions when I took advantage of		
someone	382 (70.4)	160 (29.5)
I'm always willing to admit it when I make a mistake.	469 (86.5)	73 (13.47)
I sometimes try to get even rather than forgive and forget.	399 (73.6)	143 (26.3)
I am always courteous, even to people who are disagreeable.	459 (84.6)	83 (15.31)
I have never been irked when people expressed ideas very		
different from my own.	329 (60.7)	213 (39.3)
There have been times when I was quite jealous of the good		
fortune of others.	217 (40.0)	325 (59.9)
I am sometimes irritated by people who ask favors of me.	274 (50.5)	268 (49.4)
I have never deliberately said something that hurt someone's		
feelings.	326 (60.1)	216 (39.8)

## 24. ACCESS TO MEDICAL CARE

Respondents' ability to access medical care was assessed using 6-items related to seeking medical care in the past 12 months [92, 93]. Responses were rated on a 5-point scale with 1 = Strongly Agree, 2= Somewhat Agree, 3= Uncertain, 4= Somewhat Disagree, and 5= Strongly Disagree. Results are presented in Table 24.1. The overall mean score was 16.7 (SD= 4.5, range = 6-29), indicating moderate levels of ease of access medical care. Individual responses are presented in Table A.20 of the Appendix.

Table 24.1. Access to Medical Care (N= 542)

Statement	Mean (SD)
If I need medical care, I can get admitted without any trouble	2.0 (1.1)
It is hard for me to get medical care in an emergency*	3.3 (1.4)
Sometimes I go without the medical care I need because it is too expensive*	3.8 (1.3)
I have easy access to the medical specialists that I need	2.8 (1.4)
Places, where I can get medical care, are very conveniently located	2.1 (1.1)
I am able to get medical care whenever I need it	2.5 (1.3)
Total Mean Score	16.7 (4.5)
Range	6-29

<sup>\*</sup>Items have been reverse-coded so that higher scores indicate ease of access to medical care

#### **Barriers to Medical Care**

Similarly, respondents were asked to think about barriers to getting the needed or recommended medical care [94]. Overall, most respondents (69.9%, n=379) agreed that they were unable to pay for medical care, 46.8% (n=254) were not sure where to go, 62.5% (n=339) did not have transportation, and 48.8% (n=265) reported the clinic hours not being convenient. Results are presented in Table 24.2 below.

Table 24.2. Barriers to Medical Care (N=542)

	Agree	Disagree
Variable	n (%)	n (%)
I was unable to pay for medical care	379 (69.9)	163 (30.0)
I was not sure where to go to get medical care	254 (46.8)	288 (53.1)
I did not have transportation to medical care	339 (62.5)	203 (37.4)
The clinic's hours of operation were inconvenient for me	265 (48.8)	277 (51.1)
I was treated poorly at a clinic in the past	185 (34.1)	357 (65.8)
I did not want to be seen at a clinic	150 (27.6)	392 (72.3)
I do not trust doctors	113 (20.8)	429 (79.1)
I don't really care about taking care of myself at this time	112 (20.6	430 (79.3)
I did not have childcare	204 (37.6)	338 (623)
I was too drunk or high	72 (13.2)	470 (6.7)

#### 25. CONCLUSION

This report presented baseline survey data on the 542 women enrolled in the Kyaterekera Project prior to HIVRR, savings and financial literacy interventions. The report provides a detailed understanding of participants in the following key areas: family and community background, family relationships, social support, family socio-economic status, gender relations and peer norms, savings and financial self-efficacy, sex work and sex work stigma, gender-based violence, sexual behaviors, drug use and arrest history, childhood sexual abuse, HIV/AIDS knowledge, stigma and prevention attitudes, PrEP use, personal health, mental health and access to health care. These baseline data acts as benchmarks from which change will be measured, at 6, 12, 18, and 24-months-post intervention, between the usual care and treatment conditions. Given that data was self-recorded, social desirability is a potential limitation. Overall, the baseline survey data illustrates how women engaged in sex work currently view themselves, their families, their communities, and their futures

## **26. APPENDIX: EXTENDED TABLES**

Table A.1. Distance to Community Resources (N=542)

	Near (about 0-2 kms)	Far (over 2 kms)	Not applicable
Community resource	n (%)	n (%)	n (%)
Place of employment	449 (82.8)	93 (17.16)	0(0.0)
Medical institution	419 (77.3)	123 (22.6)	0(0.0)
Bank	115 (21.2)	242 (44.6)	185 (34.1)
Clean water source	519 (95.7)	23 (4.24)	0(0.0)

Table A.2. Community Satisfaction (N=542)

		Most of	About Half		
	Always	the time	of the time	Sometimes	Never
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
I like where I live	203 (37.4)	145 (26.7)	52 (9.59)	120 (22.1)	22 (4.06)
I wish I lived in a different					
house	82 (15.13)	110 (20.3)	65 (11.99)	133 (24.5)	152 (28.0)
I wish I lived in another					
village/community	164 (30.2)	141 (26.0)	49 (9.04)	99 (18.27)	89 (16.42)
I like my village/ community	189 (34.8)	126 (23.2)	64 (11.81)	131 (24.1)	32 (5.90)
I like my neighbors	234 (43.1)	139 (25.6)	64 (11.81)	89 (16.42)	16 (2.95)
This village/community is					
filled with not nice people	79 (14.58)	212 (39.1)	56 (10.33)	108 (19.9)	87 (16.05)
My family's house is nice	140 (25.8)	100 (18.4)	50 (9.23)	174 (32.1)	78 (14.39)
There are a lot of fun things					
to do where I live	160 (29.5)	105 (19.3)	46 (8.49)	155 (28.6)	76 (14.02)

Table A.3. Family Cohesion (N=542)

	, ,	Most of	About half		
	Always	the time	the time	Sometimes	Never
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Do your family members					
ask each other for help					
before asking non-family					
members for help?	184 (33.9)	121 (22.3)	34 (6.27)	140 (25.8)	63 (11.62)
Do your family members					
like to spend free time	174 (32.1)				
with each other?		149 (27.4)	58 (10.70)	121 (22.3)	40 (7.38)
Do your family members					
feel close to each other?	197 (36.3)	108 (19.9)	60 (11.07)	126 (23.2)	51 (9.41)
Are you available when					
others in the family want					
to talk to you?	164 (30.2)	112 (20.66)	51 (9.41)	171 (31.5)	44 (8.12)
Do you listen to what					
other family members					
have to say, even when					
you disagree?	182 (33.5)	128 (23.6)	58 (10.70)	143 (26.3)	31 (5.72)
Do you do things together					
as a family?	169 (31.1)	127 (23.4)	60 (11.07)	132 (24.3)	54 (9.98)
Do you think that your					
family members love you?	232 (42.8)	126 (23.2)	43 (7.93)	109 (20.1)	32 (5.90)

**Table A.4. Multidimensional Scale of Perceived Social Support** 

	Very						Very
	Strongly	Strongly	Mildly			Strongly	Strongly
	Disagree	Disagree	Disagree	Neutral	Mildly Agree	Agree	Agree
Variable	n (%)	n (%)	n (%)	n (%)	n (%)	n (%)	n (%)
There is a special person who is around							
when I am in need.	76 (14.0)	25 (4.61)	27 (4.98)	11 (2.03)	146 (26.9)	78 (14.3)	179 (33.0)
There is a special person with whom I can							
share my joys and sorrows.	68 (12.5)	34 (6.27)	19 (3.51)	8 (1.48)	105 (19.3)	111 (20.4)	197 (36.3)
My family really tries to help me.	99 (18.2)	34 (6.27)	32 (5.90)	16 (2.95)	128 (23.6)	93 (17.1)	140 (25.8)
I get the emotional help and support I							
need from my family	101 (18.6)	36 (6.64)	41 (7.56)	6 (1.11)	134 (24.7)	85 (15.6)	139 (25.6)
I have a special person who is a real							
source of comfort to me.	68 (12.5)	25 (4.61)	26 (4.80)	10 (1.85)	92 (16.9)	118 (21.7)	203 (37.4)
My friends really try to help me.	100 (18.4)	46 (8.49)	25 (4.61)	13 (2.40)	141 (26.0)	79 (14.5)	138 (25.4)
I can count on my friends when things go	, ,	, ,	, ,		, ,		, ,
wrong.	112 (20.6)	40 (7.38)	39 (7.20)	7 (1.29)	142 (26.2)	78 (14.3)	124 (22.8)
I can talk about my problems with my							
family.	70 (12.9)	27 (4.98)	26 (4.80)	5 (0.92)	105 (19.3)	114 (21.0)	195 (35.9)
I have friends with whom I can share my							
joys and sorrows.	87 (16.0)	36 (6.64)	37 (6.83)	12 (2.21)	123 (22.6)	91 (16.7)	156 (28.7)
There is a special person in my life who							
cares about my feelings.	87 (16.0)	33 (6.09)	34 (6.27)	8 (1.48)	112 (20.6)	92 (16.9)	176 (32.4)
My family is willing to help me make							
decisions.	89 (16.4)	37 (6.83)	45 (8.30)	7 (1.29)	118 (21.7)	89 (16.4)	157 (28.9)
I can talk about my problems with my							
friends.	98 (18.0)	33 (6.09)	32 (5.90)	9 (1.66)	142 (26.2)	88 (16.2)	140 (25.8)

Table A.5. Importance of Saving for a Specific Goal (N=542)

					Not
	Extremely	Very	Somewhat	Not Very	Important
	Important	Important	Important	Important	at all
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Saving money for a family					_
business	330 (60.8)	204 (37.6)	2 (0.37)	5 (0.92)	1 (0.18)
Saving money for one's					
personal development,					
including vocational					
technical or job training	300 (55.3)	227 (41.8)	9 (1.66)	5 (0.92)	1 (0.18)
Saving money for family					
use	299 (55.1)	231 (42.6)	8 (1.48)	3 (0.55)	1 (0.18)
Saving money to buy an					
animal (cow, goat)	274 (50.5)	244 (45.0)	12 (2.21)	8 (1.48)	4 (0.74)
Saving money to move into	·				·
one's own home	302 (55.7)	224 (41.3)	8 (1.48)	5 (0.92)	3 (0.55)

Table A.6. Confidence in Ability to Save (N=542)

					Not
	Extremely	Very	Somewhat	Not Very	Confident
	Confident	Confident	Confident	Confident	at all
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Save money for a family					_
business	308 (56.8)	118 (21.7)	66 (12.1)	28 (5.1)	22 (4.0)
Saving money for one's					
personal development,					
including vocational technical					
or job training	273 (50.3)	142 (26.2)	64 (11.8)	40 (7.3)	23 (4.2)
Save money for family use	308 (56.8)	137 (25.2)	57 (10.5)	26 (4.8)	14 (2.5)
Save money to buy an animal					
such as a goat, pig, or cow	277 (51.1)	144 (26.5)	57 (10.5)	38 (7.0)	26 (4.8)
Save money to move into					
one's own home	315 (58.1)	114 (21.0)	52 (9.5)	38 (7.0)	23 (4.2)

Table A.7. Financial Self-Efficacy (N=542)

	Extremely Confident	Very Confident	Somewhat Confident	Not Very Confident	Not Confident at all
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
How confident are you that you can meet your goals for					
becoming financially secure? How confident are you that	251 (46.3)	79 (14.5)	115 (21.2)	67 (12.3)	30 (5.5)
you can meet your goals for	222 (40.9)	98 (18.0)	123 (22.6)	76 (14.0)	23 (4.2)

obtaining adequate employment					
How confident are you that					
you can meet your goals for building savings?	248 (45.7)	112 (20.6)	107 (19.7)	48 (8.8)	27 (4.9)
How confident are you that	, ,	, ,	, ,	, ,	, ,
you can meet your goals for					
paying off your debts?	253 (46.6)	115 (21.2)	101 (18.6)	46 (8.4)	27 (4.9)

Table A.8. Sex Worker Stigma Index (N= 542)

	Strongly			Strongly
	Disagree	Disagree	Agree	Agree
Variable	n (%)	n (%)	n (%)	n (%)
I feel that if I disclosed being a sex worker to				
some people, they would not talk to me				
anymore	71 (13.1)	83 (15.3)	196 (36.1)	192 (35.4)
I feel that if I disclosed being a sex worker to				
some people they would not talk to my family	68 (12.5)	92 (16.9)	190 (35.0)	192 (35.4)
I feel that if I disclosed being a sex worker to				
some people would think I was immoral	43 (7.9)	58 (10.7)	185 (34.1)	256 (47.2)
I feel that if I disclosed being a sex worker to				
some people, I would be threatened with				
violence	61 (11.2)	83 (15.3)	218 (40.2)	180 (33.2)
I feel that if I disclosed being a sex worker to				
some people, they would treat me differently	47 (8.6)	55 (10.1)	205 (37.8)	235 (43.3)
I feel that if I disclosed being a sex worker to				
my husband, he would hit me	115 (21.2)	79 (14.5)	149 (27.4)	199 (36.7)
I feel that if I disclosed being a sex worker to				
my husband, he would not talk to me anymore	112 (20.6)	81 (14.9)	167 (30.8)	182 (33.5)
I feel that if I disclosed being a sex worker to				
my family, I would not be able to see my	(, , , , , )	0= (1= 0)	( )	
children	77 (14.2)	97 (17.9)	183 (33.7)	185 (34.1)
I feel that if I disclosed being a sex worker to	5.4.(0.0)	75 (40.0)	100 (05.4)	004 (40 7)
my family, they would desert me	54 (9.9)	75 (13.8)	192 (35.4)	221 (40.7)
I feel that if I disclosed being a sex worker to	50 (O.5)	EE (40.4)	004 (07.0)	004 (40.6)
my family, they would treat me differently	52 (9.5)	55 (10.1)	204 (37.6)	231 (42.6)

Table A.9. Economic Abuse (N= 542)

Table A.s. Lconomic Abuse (14-	. J+L)				0 ::
		Hardly		0.0	Quite
	Never	Ever	Sometimes	Often	Often
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Make you ask him/her for					
money					
Current or past intimate partner	131 (24.1)	19 (3.5)	181 (33.3)	152 (28.0)	59 (10.8)
Family member	278 (51.2)	35 (6.4)	99 (18.27)	79 (14.58)	51 (9.41)
Demand to know how money					
was spent.					
Current or past intimate partner	236 (43.5)	33 (6.0)	138 (25.4)	94 (17.34)	41 (7.56)
Family member	354 (65.3)	44 (8.1)	61 (11.25)	56 (10.33)	27 (4.98)
Demand that you give					
him/her receipts and/or					
change when you spend					
money.					
Current or past intimate partner	324 (59.7)	33 (6.0)	97 (17.90)	64 (11.81)	24 (4.43)
Family member	412 (76.0)	32 (5.9)	43 (7.93)	39 (7.20)	16 (2.95)
Keep financial information					
from you					
Current or past intimate partner	215 (39.6)	29 (5.3)	115 (21.2)	127 (23.4)	56 (10.3)
Family member	339 (62.5)	26 (4.8)	76 (14.02)	70 (12.92)	31 (5.72)
Make important financial					
decisions without talking to					
you first.					
Current or past intimate partner	230 (42.4)	36 (6.6)	119 (21.9)	129 (23.8)	28 (5.17)
Family member	338 (62.3)	38 (7.0)	85 (15.68)	56 (10.33)	25 (4.61)
Threaten you to make you					
leave work					
Current or past intimate partner	335 (61.8)	32 (5.9)	77 (14.21)	70 (12.92)	28 (5.17)
Family member	417 (76.9)	40 (7.3)	31 (5.72)	37 (6.83)	17 (3.14)
Demand that you quit your					
job.					
Current or past intimate partner	339 (62.5)	24 (4.4)	83 (15.31)	65 (11.99)	31 (5.72)
Family member	410 (75.6)	38 (7.0)	39 (7.20)	35 (6.46)	20 (3.69)
Beat you up if you said you	, ,	` ,	, ,	, ,	,
needed to go to work.					
Current or past intimate partner	401 (73.9)	30 (5.5)	49 (9.04)	45 (8.30)	17 (3.14)
Family member	443 (81 7)	37 (6.8)	25 (4.61)	23 (4.24)	14 (2.58)
Do things to keep you from	, ,	, ,	, ,	,	,
going to your job.					
Current or past intimate partner	355 (65.5)	30 (5.5)	87 (16.5)	52 (9.59)	18 (3.32)
Family member	430 (79.3)	38 (7.0)	31 (5.72)	20 (3.69)	23 (4.24)
Spend the money you need	ζ/	· -/	` /	·/	` /
for rent or other bills					
Current or past intimate partner	278 (51.2)	46 (8.4)	117 (21.5)	72 (13.2)	29 (5.35)
Family member	400 (73.8)	41 (7.5)	44 (8.12)	40 (7.38)	17 (3.14)
		( )	()	( )	(=)

Pay bills late or not pay bills that were in your name or both your names.					
Current or past intimate partner	309 (57.0)	45 (8.3)	94 (17.34)	63 (11.6)	31 (5.72)
Family member  Borrow money or purchase	412 (76.0)	42 (7.7)	41 (7.56)	32 (5.90)	15 (2.77)
things on credit under your					
name.					
Current or past intimate partner	396 (73.0)	41 (7.5)	50 (9.23)	35 (6.46)	20 (3.69)
Family member	414 (76.3)	34 (6.2)	33 (6.09)	36 (6.64)	25 (4.61)

Table A.10. Confidence in Condom Self Efficacy (N=542)

	Very	Somewhat	Not at all
	Confident	Confident	Confident
Variable	n (%)	n (%)	n (%)
Put a male condom on a hard penis?	418 (77.1)	68 (12.5)	56 (10.3)
Unroll a male condom down correctly on the first try?	372 (68.3)	93 (17.1)	77 (14.2)
Start over with a new male condom if you placed it on			
the wrong way?	325 (59.9)	83 (15.3)	134 (24.7)
Unroll a male condom fully to the base of the penis?	373 (68.8)	86 (15.8)	83 (15.3)
Squeeze air from the tip of a male condom?	288 (53.1)	89 (16.4)	165 (30.4)
Take a male condom off without spilling the semen or			
cum?	368 (67.9)	76 (14.0)	98 (18.0)
Take a male condom off before your partner loses his			
hard on?	342 (63.1)	84 (15.5)	116 (21.4)
Use spermicide or lubricant with a male condom?	173 (31.9)	64 (11.8)	305 (56.2)

Table A.11. Condom Use Communication Self-Efficacy with an Intimate Partner (N=542)

Tubic A.T.I. Goldoni God Gollina	Definitely	Probably		Probably	Definitely
	No	No	Maybe	Yes	Yes
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Can you discuss condom use					
with your intimate or casual					
partner?	47 (8.67)	54 (9.96)	46 (8.49)	187 (34.5)	208 (38.3)
Can you insist on condom use if					
your partner does not want to					
use one?	64 (11.8)	99 (18.2)	51 (9.41)	157 (28.9)	171 (31.5)
Can you stop and look for					
condoms when you're sexually					
aroused?	64 (11.8)	81 (14.9)	49 (9.04)	183 (33.7)	165 (30.4)
Can you insist on condom use					
every time even when you are					
under the influence of alcohol or					
drugs?	69 (12.7)	95 (17.5)	50 (9.23)	163 (30.0)	165 (30.4)
Can you insist on condom use					
every time when your intimate or					
casual partner is under the					
influence of alcohol or drugs?	60 (11.0)	96 (17.7)	43 (7.93)	180 (33.2)	163 (30.0)
Can you put a condom on your					
partner without feeling as if it is					
"spoiling the mood?"	71 (13.1)	111(20.4)	53 (9.78)	168 (31.0)	139 (25.6)
Can you insist on condom use					
every time even if you or your					
partner uses another method to					
prevent on pregnancy?	50 (9.23)	87 (16.0)	59 (10.8)	191 (35.2)	155 (28.6)

Table A.12. Condom Use Communication Self-Efficacy with the Last Intimate Partner (N=542)

	Definitely	Probably		Probably	Definitely
	No	No	Maybe	Yes	Yes
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Discussed condom use with your					
intimate or casual partner?	202 (37.2)	97 (17.9)	49 (9.04)	102 (18.8)	92 (16.9)
Insisted on condom use even					
when your partner did not want to					
use one.	193 (35.6)	129 (23.8)	58 (10.7)	75 (13.84)	87 (16.0)
Stopped and looked for condoms					
when you were sexually aroused.	210 (38.7)	149 (27.4)	35 (6.46)	71 (13.10)	77 (14.2)
Insisted on condom use every					
time even when you were under					
the influence of alcohol or drugs.	207 (38.1)	143 (26.3)	45 (8.30)	66 (12.18)	81 (14.9)
Insisted on condom use every	· · · · · · · · · · · · · · · · · · ·		•		•
time when your intimate or	197 (36.3)	153 (28.2)	45 (8.30)	66 (12.18)	81 (14.9)
-	. ,		. ,	` '	

casual partner was under the					
influence of alcohol or drugs.					
Put a condom on your partner					
without feeling as if it was					
"spoiling the mood."	204 (37.6)	152 (28.0)	34 (6.27)	67 (12.36)	85 (15.6)
Insisted on condom use every					
time even when you or your					
partner used another method to					
prevent pregnancy.	209 (38.5)	145 (26.7)	35 (6.46)	68 (12.55)	85 (15.6)

Table A.13. Condoms Use Communication Self-Efficacy with a Paving Customer (N=542)

Table A.13. Condoms use Communication Sen-Emicacy with a Paying Customer (N=542)						
	Definitely	Probably		Probably	Definitely	
	No	No	Maybe	Yes	Yes	
Variable	n (%)	n (%)	n (%)	n (%)	n (%)	
Can you discuss condom use						
with a customer?	16 (2.95)	9 (1.66)	18 (3.32)	176 (32.4)	323 (59.5)	
Can you insist on condom use						
if your customer does not want						
to use one?	22 (4.06)	45 (8.3)	30 (5.54)	174 (32.1)	271 (50.0)	
Can you insist on condom use						
with a customer every time						
even when you are under the						
influence of alcohol or drugs?	30 (5.54)	37 (6.8)	35 (6.46)	194 (35.7)	246 (45.3)	
Can you insist on condom use						
every time when your						
customer is under the						
influence of alcohol or drugs?	24 (4.43)	49 (9.04)	33 (6.09)	192 (35.4)	244 (45.0)	
Can you insist on condom use						
every time even if you or your						
customer uses another						
method to prevent on						
pregnancy?	20 (3.69)	47 (8.67)	36 (6.64)	181 (33.3)	258 (47.6)	

Table A.14. Condom Use Communication Self-Efficacy with the Last Paying Customer (N=542)

	Definitely	Probably		Probably	Definitely
	No	No	Maybe	Yes	Yes
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Discussed condom use with a					
customer?	38 (7.01)	28 (5.17)	39 (7.20)	166 (30.6)	271 (50.0)
Insisted on condom use even when your customer did not					
want to use one.	51 (9.41)	56 (10.3)	40 (7.38)	150 (27.6)	245 (45.2)
Insisted on condom use every					
time even when you were	60 (11.0)	69 (12.7)	40 (7.38)	146 (26.9)	227 (41.8)

under the influence of alcohol or drugs. Insisted on condom use every time when your customer was under the influence of alcohol					
or drugs.	57 (10.5)	54 (9.96)	40 (7.38)	158 (29.1)	233 (42.9)
Insisted on condom use every	•	•	•	·	
time even when you or your					
customer used another					
method to prevent on					
pregnancy	60 (11.0)	53 (9.78)	39 (7.20)	160 (29.5)	230 (42.4)

Table A.15. Peer Norms (N= 542)

	None	A few	Most	All
Variable	n (%)	n (%)	n (%)	n (%)
How many women DO YOU KNOW who				
you think use a condom every time they				
have sex?	40 (7.38)	343 (63.2)	148 (27.3)	11 (2.03)
How many women DO YOU KNOW who				
you think are concerned about HIV,				
Hepatitis C, or sexually transmitted				
infections?	32 (5.90)	311 (57.3)	186 (34.3)	13 (2.40)
How many women DO YOU KNOW who				
you think take responsibility for protecting				
their partners from HIV, Hepatitis or				
sexually transmitted infections?	41 (7.56)	333 (61.4)	160 (29.5)	8 (1.48)

Table A.16. HIV Stigma (N=542)

	Strongly			Strongly
	Disagree	Disagree	Agree	Agree
Variable	n (%)	n (%)	n (%)	n (%)
People who have HIV/AIDS face verbal				
abuse	49 (9.04)	66 (12.1)	189 (34.8)	238 (43.9)
People living with HIV/AIDS face rejection				
from their peers	51 (9.41)	51 (9.41)	195 (35.9)	245 (45.2)
People who have HIV/AIDS should be				
treated the same as everyone else	310 (57.2)	189 (34.8)	26 (4.80)	17 (3.14)
People with HIV/AIDS do not deserve any				
support.	245 (45.2)	183 (33.7)	51 (9.41)	63 (11.62)
People with HIV/AIDS should not have the				
same freedoms as other people.	253 (46.6)	181 (33.3)	48 (8.86)	60 (11.07)
People living with HIV/AIDS should be				
treated similarly by health care				
professionals as people with other				
illnesses.	318 (58.6)	171 (31.5)	26 (4.80)	27 (4.98)

Table A.17 Attitudes Towards PrEP (N= 542)

	Absolutely unwilling	Possibly unwilling	Unknown	Possibly willing	Absolutely willing
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
If PrEP was safe and effective,					_
how likely would you be willing					
to use it?	59 (10.9)	19 (3.5)	25 (4.6)	149 (27.4)	290 (53.5)
If PrEP was safe, effective and					
free, how likely would you be					
willing to use it?	57 (10.5)	17 (3.1)	18 (3.3)	147 (27.1)	303 (55.9)
If PrEP was safe, effective, free					
and being used by few people					
around you, how likely would		/ >			()
you be willing to use it?	61 (11.2)	22 (4.0)	16 (2.9)	176 (32.4)	267 (49.2)
If PrEP was safe, effective, free					
and being used by many people					
around you, how likely would	=0 (40 O)	10 (0.0)	00 (4.0)	4== (00.0)	000 (54.0)
you be willing to use it?	59 (10.8)	12 (2.2)	23 (4.2)	155 (28.6)	293 (54.0)

Table A.18. Brief Symptom Inventory (N=542)

	Not at all	A little bit	Moderately	Quite a bit	Extremely
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Thoughts of ending your life	409 (75.4)	80 (14.76)	13 (2.40)	17 (3.14)	23 (4.24)
Feeling lonely even when					
you are with people	267 (49.2)	173 (31.9)	25 (4.61)	48 (8.86)	29 (5.35)
Feeling sad	218 (40.2)	181 (33.3)	46 (8.49)	72 (13.28)	25 (4.61)
Feeling no interest in things	219 (40.4)	187 (34.5)	43 (7.93)	56 (10.33)	37 (6.83)
Feeling hopeless about the					
future	305 (56.2)	133 (24.5)	35 (6.46)	43 (7.93)	26 (4.80)
Feelings of worthlessness	384 (70.8)	83 (15.31)	16 (2.95)	36 (6.64)	23 (4.24)

Table A.19. Post-Traumatic Stress Disorder (PTSD) (N=542)

	Not at all	A little bit	Moderate	Quite a bit	Extremely
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
Repeated, disturbing					
memories, thoughts, or					
images of a stressful					
experience from the past.	176 (32.4)	190 (35.0)	39 (7.20)	81 (14.9)	56 (10.3)
Feeling very upset when					
something reminded you of a					
stressful experience from the					
past.	129 (23.8)	177 (32.6)	62 (11.4)	103 (19.0)	71 (13.1)

Avoided activities or					
situations because they					
reminded you of a stressful					
experience from the past	171 (31.5)	185 (34.1)	56 (10.3)	74 (13.6)	56 (10.3)
Feeling distant or cut off from					
other people.	247 (45.5)	185 (34.1)	31 (5.72)	43 (7.93)	36 (6.64)
Feeling irritable or having					
angry outbursts.	182 (33.5)	171 (31.5)	42 (7.75)	72 (13.2)	75 (13.8)
Difficulty concentrating.	243 (44.8)	189 (34.8)	36 (6.64)	34 (6.27)	40 (7.38)

Table A.20. Access to Medical Care (N= 542)

	Strongly	Somewhat	Uncertain	Somewhat	Strongly
	Agree	Agree		Disagree	Disagree
Variable	n (%)	n (%)	n (%)	n (%)	n (%)
If I need medical care, I can get					_
admitted without any trouble	231 (42.6)	196 (36.1)	23 (4.24)	66 (12.1)	26 (4.80)
It is hard for me to get medical					
care in an emergency	78 (14.39)	112 (20.6)	27 (4.98)	201 (37.0)	124 (22.8)
Sometimes I go without the					
medical care I need because it is					
too expensive	58 (10.70)	50 (9.23)	13 (2.40)	217 (40.0)	204 (37.6)
I have easy access to the medical					
specialists that I need	115 (21.2)	165 (30.4)	28 (5.17)	159 (29.3)	75 (13.84)
Places where I can get medical					
care are very conveniently					
located	175 (32.2)	231 (42.6)	24 (4.43)	85 (15.68)	27 (4.98)
I am able to get medical care					
whenever I need it	144 (26.5)	187 (34.5)	27 (4.98)	124 (22.8)	60 (11.07)

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