Naturopathic Birth Control Methods Among Young Adults in The Ningo- Prampram Municipality of the Greater Accra Region.

ABSTRACT

Background: The purpose of this research was to assess the importance of natural birth control method as alternative to artificial method since the natural does not present significant side effects on the later life of the user.

Methods: The research deployed simple random sampling in administering questionnaires to 100 respondents in the population of young adults in the Ningo-Prampram municipality. All items used in the questionnaire were anchored onto a 5-point Likert scale of strongly agree (5), agree (4), not sure (3), disagree (2), and strongly disagree (1). The objective was to identify the level of natural birth control method usage among young adults in Ningo-Prampram Municipality.

Results: The study found the strongly agreeing group in the sample constituted 41.7% whereas those in the agreeing group represented 30%. Strikingly, those who were not sure and the disagreeing group were 12.7% each whilst the strongly disagreeing was 2.9 percent. The indication presented in this sample is that, 41.7%, which is close to half of the opinions expressed in the sample are in strong support of the use of natural birth control methods among young adults in Ningo-Prampram Municipality.

Conclusion: It is indicative that, given the benefits of natural birth control methods, more young adults are in strong agreement of its usage since it presents the user with no later life health issues such as infertility and complications in parturition. It is therefore important that, the issues of Sexually Transmitted infections (STIs) are addressed with abstinence and or fidelity with one sexual partner.

Keywords: Birth control, Naturopathy, Sexually Transmitted Infections, Fidelity, Partner

INTRODUCTION

According to worldwide estimates, some 600,000 women die each year of pregnancy-related causes, and 75,000 die following unsafe abortions. At least 200,000 of these maternal deaths are attributable to the failure or lack of contraceptive services. In addition to preventing mortality, effective contraception improves maternal health (Grimes, 2000).

The assessment findings reinforce the importance of conducting ongoing advocacy and mobilization with governments, donors, and implementing agencies across the humanitarian development continuum to prioritize contraception as part of SRH in humanitarian settings, from preparedness to response to recovery, recognizing that contraception is lifesaving and part of the standard of care in emergencies. Finally, it is critical to continue building the evidence base on effective contraceptive programming (Women Refuge Commission, 2021).

Reliable contraception allows women to invest in their human capital with much less risk and so achieve higher education and professional degrees. By separating sex from procreation and giving women more control over their bodies, it also lifted the obligation to marry early (Carl Djerassi, 2015).

2.2 Theoretical Framework

Based on the nature of this work, the study of natural birth control method among young adults in peri-urban dwellings of Ningo-Prampram municipality has been anchored on two theories: Malthusian population theory (1798) and dependency theory (1957)

2.2.1 Malthusian population theory

The Malthusian theory was developed by Thomas Malthus in 1798 which explained how population growth could be controlled by natural factors such as diseases, famine, wars or calamity if human interventions in their effort fail to curtail the growth. The world population has reached an alarming levels of almost 8 billion without corresponding levels of resource growth and land size expansion. The population of Ghana has also seen substantial increase from 24 million to 31 million in the last 10 years as Ningo-Prampram saw its increment from 70,923 to 87,393, a growth rate of 2.9% at the national level and 2.3% at the local level of Ningo-Prampram. Yet resource levels and land size have not expanded to correspond with the increases in population, thus leading to multiple sale of lands and communal conflicts and deaths. There also have been outbreak of diseases such as cholera and skin conditions due to congestion and lack of access to portable water by the population. The use of natural birth control methods must therefore be given attention in promoting education and awareness to control the exponential growth in the population as envisaged by Thomas Malthus.

2.2.2 Dependency theory

The dependency theory is based on inequality in social development where resources of society are disproportionally utilized by the privileged or the rich against the underprivileged or poor in the society. It was developed by Paul Baran in 1957 on the premise that resources flow from a periphery of poor and underdeveloped states to a core of wealthy states, enriching the latter at the expense of the former.

There is glaring inequality in the distribution of birth control methods in Ghana in general and deprived communities like Ningo-Prampram in particular, manifesting itself in the rich or

the privileged getting access to high quality forms of contraceptive medications or medical procedures against the poor. The opportunity available to the poor therefore, is for them to resort to natural birth control methods which come with minimal cost and side effects.

2.3 Types of Natural Birth Control Methods

Natural methods are some of the oldest forms of contraception available. Natural birth control methods include specific actions that people can naturally do to help prevent unintended pregnancy (Brian Levine, 2019). Natural birth control often does not cost anything and usually has no side effects.

2.3.1 Abstinence

Sexual abstinence means not having sexual intercourse with a partner. Abstinence works as an effective form of birth control by eliminating all chances of sperm fertilizing an egg. Unlike other forms of birth control that work to prevent pregnancy regardless of the exchange of sexual fluids, abstinence prevents semen from coming into contact with the vagina. However, a recent study by Dhillon et al.,(2021) reported a higher proportion of less-educated women reported using this method.

2.3.2 Withdrawal method

The withdrawal method relies on complete self-control. You must have an exact sense of timing to withdraw your penis in time (Robin Elise Weiss, 2020).

2.3.3 Fertility awareness method

Fertility awareness method or safe period method requires a woman to monitor her body to determine when she is most fertile. She then avoids having unprotected sex around the time of ovulation. This natural birth control method involves paying attention to different body changes such as basal body temperature or cervical mucus and recording them to predict when you will ovulate. To be successful, one needs to be willing to record and chart your fertility signs. In a study which employed a mobile application appears to improve the effectiveness of fertility awareness-based methods and can be used to prevent pregnancies if couples consistently protect themselves on fertile days(Scherwitzl et al.,2016).

Tracking their temperature

Tracking temperature throughout the menstrual cycle can help predict ovulation. Body temperature typically rises around ovulation, from 96–98ºF (35–36ºC) to 97–99ºF (36–37ºC). Steward and Raja(2020) are of the view that this approach has been in existence for ages.

Examining their cervical mucus

Cervical mucus, or vaginal discharge, changes in color, texture, and volume throughout the menstrual cycle.On a person's most fertile days, the mucus will feel slippery, similar to raw egg white. On their less fertile days, it will be sticky and cloudy. On their least fertile days, there may be little or no mucus at all. Just as with body temperature, an individual can use a chart or phone app to track their cervical mucus. However, in a recent study by Najmabadi et al.,(2021), some factors such as physical activity and body mass index may have effect on this method.

Using a calendar

The calendar method involves tracking the menstrual cycle and manually working out which days are most and least fertile. Planned Parenthood suggests that people follow their menstrual cycle for at least six periods before using the calendar method as a form of birth control. This method may be harder to use for people with varying menstrual cycle lengths and people with menstrual cycles that are shorter than 27 days. Marston and Church(2016) are of the view that this method is not effective.

2.3.4 Lactational amenorrhea

Continuous breastfeeding also known as lactational amenorrhea method can postpone ovulation for up to six months after giving birth. This natural birth control method works because the hormone required to stimulate milk production prevents the release of the hormone that triggers ovulation. The lactational amenorrhea method (LAM) is a highly effective for preventing subsequent pregnancy (98%) during the first 6 months postpartum method of contraception for postpartum women(Abraha et al.,2018).

RESEARCH METHODOLOGY

3.1 Introduction

This section of the research assesses the procedures used in conducting the research under study. It discusses the research design, population, sample and sampling technique, data collection tools, and data analysis procedure. Research methodology defines the systematic and scientific procedures used to arrive at the results and findings for a study against which claims for knowledge are evaluated (Nachamias et al., 1996). A methodology is therefore shaped by the perspective the researcher chooses to approach the study.

3. 2 **Aim**

The purpose of this research was to assess the importance of natural birth control method as alternative to artificial method since the natural does not present significant side effects on the later life of the user.

3. 3 Specific Objectives

1. To identify the use of natural birth control methods among young adults.

2. To assess the reliability of natural birth control methods among young adults.

2. To measure the sustainability of natural birth control methods among the young adults.

3.4 Research Questions

1. How effective is the use of natural birth control methods among young adults?

2. How reliable is natural birth control method among young adults?

3. How sustainable is natural birth control method among young adults?

3.5 Significance of the study

This study is to provide insight on the current state and the level of awareness and usage of natural birth control methods among young adults in deprived communities like the Ningo-Prampram municipality of Greater Accra region. Also, it will help provide significant information to young adults on the safety of natural birth control methods over synthetic and chemical based ones which pose danger on the later life of the user, Andy to reduce the effect of birth control on women.e.g taking in natural contraceptives do not only prevent pregnancy but also negate the effect of contraceptives taken inn.

The findings of this study can become a great source of inspiration into further studies on natural birth control methods for the larger population of Ghana.

3.6 Scope and Limitations of the study

3.6.1 Scope of the study

This study is on the level of awareness and usage of natural birth control methods among young adults in the deprived communities of Ningo-Prampram municipality of Greater Accra. The focus was on the population of the urban poor who find access and the cost of quality birth control methods prohibitive.

3.6.2 Limitations

The study could not target larger sample size of the target population due to time constraints and unwillingness of respondents to disclose their sexual preferences to strangers.

4.0 Research Design

Research design according to Coryn et al (2017) is the plan and structure of investigation conceived so as to obtain answers to research questions. The design of a research specifies the methods and procedures for acquiring the information needed. It represents the overall operational framework of the project that stipulates what information is to be collected from which source and by what procedure. The study employed a cross-sectional research design to investigate the questions generated in this study. This is because it observes a representative subset of the young adult population of Ningo-Prampram district on their usage of natural birth control methods. Due to time and resource constraints, the researcher could not observe the entire population of the district.

4.1 Research Approach

The study has employed quantitative research approach based on a cross-sectional survey design due to time limitation. Maree (2007) explains that quantitative research is a systematic and objective process of utilizing numerical data from a certain population. The quantitative approach seeks to estimate relationships between the variables (Yates 2004). The quantitative approach assisted in understanding and interpreting data from the target population on natural birth control methods among young adults in the Ningo-Prampram

Municipality of Greater Accra region. Moreover, Henn, Weinstein and Foard (2006) postulate that the major advantage of using a quantitative approach is that it is quick to gather the data and it is cost effective.

4.2 Data Collection Procedure

The research deployed the use of questionnaires which were administered to 100 respondents in the population of young adults in the Ningo-Prampram municipality. All items used in the questionnaire were anchored onto a 5-point Likert scale of strongly agree (5), agree (4), not sure (3), disagree (2), and strongly disagree (1).

These constructs were adopted from previous scholarly works by Katz et al. (2005); Granovetter (2004); Heikkilä et al. (2009); Okten and Osili (2004); Ahlin and Townsend (2007); Godquin and Quisumbing (2005), who used them in previous studies and were found to be reliable and valid.

4.3 Population and Sampling Technique

A total population of 100 people living in the municipality was used for this study as sourced from the Ghana Statistical Service 2020 report. Out of this number, a sample of 30 people were selected as respondents for the administration of questionnaires. A simple random sampling technique was used in the selection of the respondents. The total sample for this study was selected using the formula derived from Yamane (1973). Thus, a total sample of 30 participants was used for this study in line with Yamane (1973).

4.4 Research Instrument

The study used a semi-structured questionnaire to elicit responses from the users of natural birth control methods as respondents for this study. Prior to the main study, the

questionnaire was first subjected to a pilot study before embarking on the final study. After pre-testing the questionnaire, all the ambiguous, negatively worded, and difficult questions was deleted in order to have a refined questionnaire for the final field study. The measurement items used in the questionnaires were adopted from earlier studies referenced in international journals.

4.5 Data Analysis

Data analysis involves reducing and arranging the data, synthesizing searching for significant patterns and discovering what is important. Ary et al (2002) has noted three steps involved in analyzing data: organizing, interpreting and summarizing data. Statistical tools such as tables, bar graphs and pie chart were used. The analysis was done with the help of Statistical Package for Social Science (SPSS).

Prior to data analysis, final data collected from the field were verified for careless scoring, inaccurate responses, and missing instruments before capturing them into Statistical Package for Social Sciences (SPSS) that will be used to analyze the data. Data captured were checked for data entry errors, outliers, missing values, and normality as stipulated by Field (2005) and Hair, Anderson, Tatham, and Black (2010). Box plots were used to check whether values with outliers exist in the data, and missing values were checked by running frequencies for all the items included in the final questionnaire. In addition, test for normality was also performed on the final data from the field. The histogram, normal p-p plots, scatter plots, multicollinearity, and homogeneity of variance were used to establish whether the data is normally distributed as recommended by Field (2005).

4.6 Ethical Consideration

For any research investigation involving human subjects, there must be careful consideration of ethical issues that may arise in the planning, conduct, and reporting of the

study. (Fraenkel & Wallen, 2003, p.56) define ethical issues as behaviour that conforms to the standards of conduct of a given profession or group; ethical issues are largely a matter of agreement among researchers. During this research, the respondents were not subjected to any harm, or any form of deception.

The researcher complied with the research code of ethics applied by Nyarkotey College of Holistic Medicine ethics committee by receiving a formal permission letter to the data collection centre. Measures were taken to ensure respect, dignity, and confidentiality from the participants who consented to participate in the study. During the data collection process, the two main ethical issues which were taken into consideration were: informed consent and confidentiality. The participants were adults who participated voluntarily in the research. The participants were made to sign a consent form that explains the research topic and all the procedures to be followed.

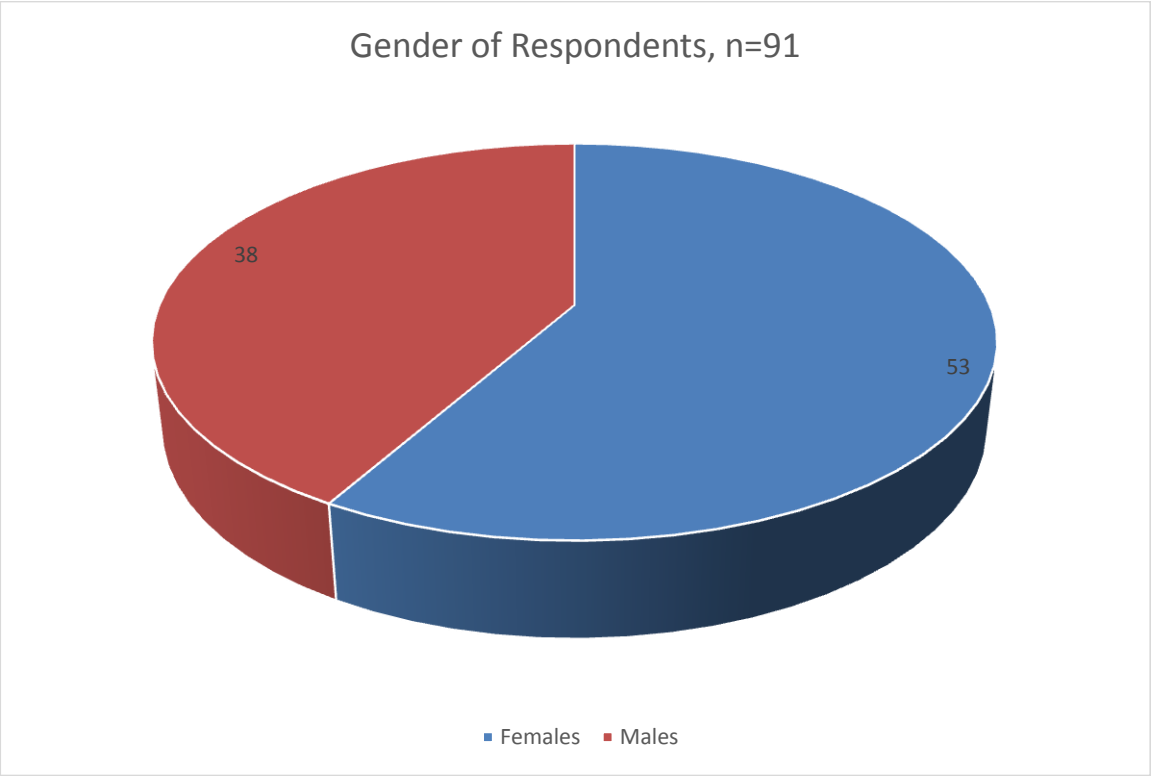
RESULTS AND DISCUSSION

5.1 Introduction

This section of the study however analyses data gathered from respondents and presents them in tables and pie charts. Data analysis and presentation starts with the demographic variables of the study such as gender, age, educational background, marital status and employment status. The research objectives were considered in analyzing other sections of the study. Out of hundred (100) questionnaires administered to residents of Ningo-Prampram, ninety (91) were retrieved by the researcher which translate to a response rate of 91%.

5.2 Demographic Data

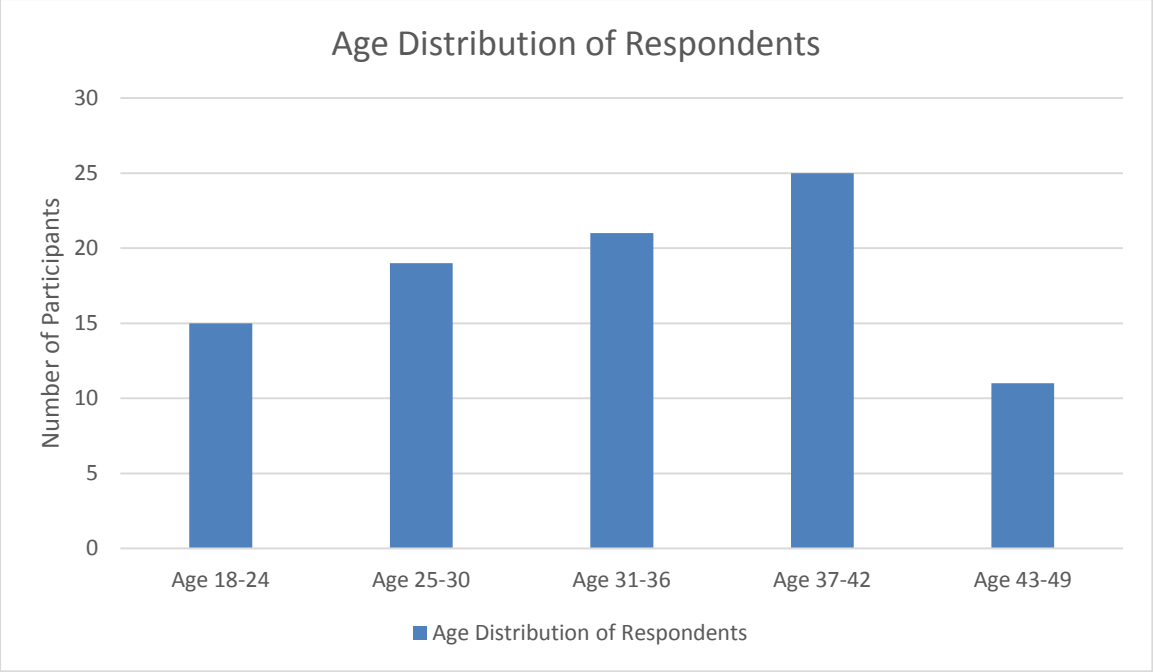
This segment of the analysis deals with the demographic variables of the respondents who participated in the study. The variables analyzed in this section are: gender, age distribution, marital status, educational level and employment status.



Source: Field Data, 2021

Figure 1: Gender of Respondents

Figure 1 is a distribution of the respondents' gender. From figure 1, the number of female respondents was 53, representing 58% whiles their male counterparts was 38, representing 42% of the samples. Thus, females played an integral role in the study than their male counterparts. And this could be because females are more concerned about their reproductive health issues than males.



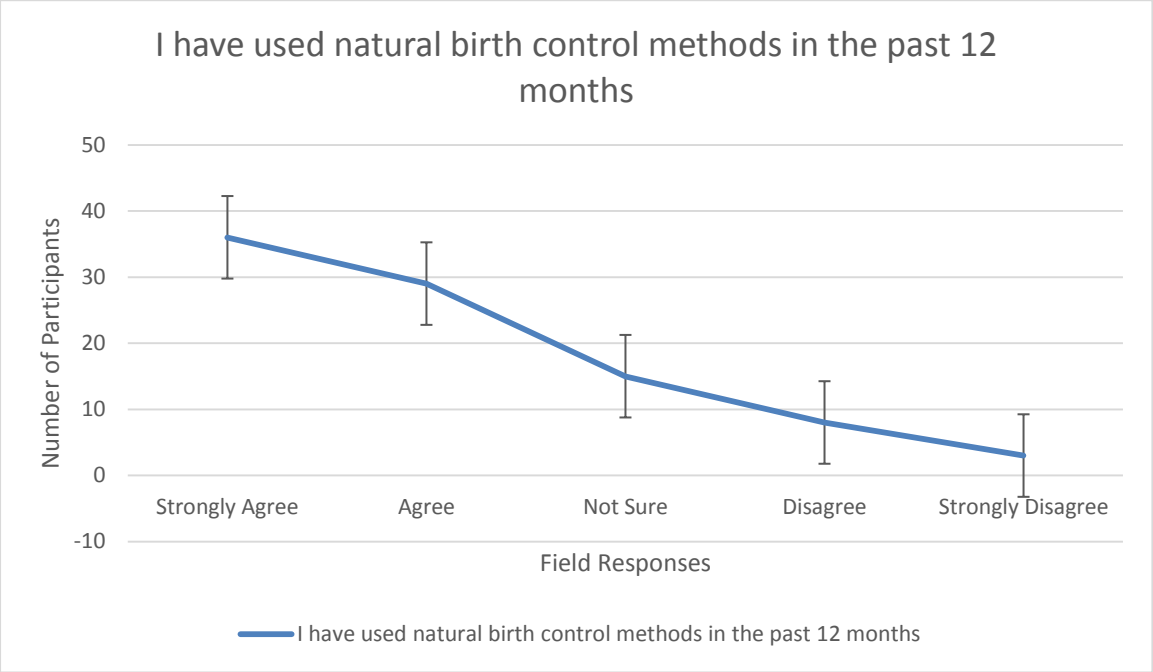
Source: Field Data 2021

Figure 2: Age Distribution of Respondents

Figure 2 provides a distribution of the ages of the respondents for the study. According to figure 2, 16.5% and 12.1% of the respondents were aged between 18-24 and 43-49 whereas 20.9%, 23.1% and 27.5% were aged between 25-30, 31-36 and 37-42 years respectively. From these findings, it could be inferred that, majority, that is 82.4% of the respondents, between the ages 25-49 are of child bearing age.

5.3 Analysis of Research Questions

5.3.1 Usage of Natural Birth Control Methods

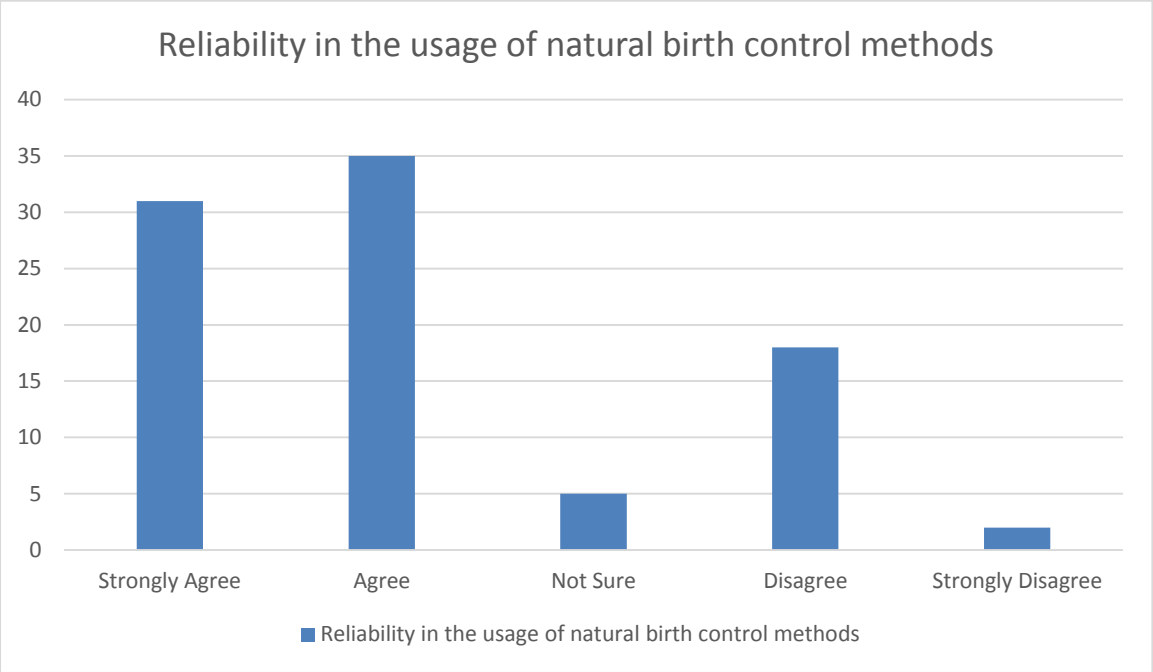


Source: Field Data 2021

Figure 3: Use of Natural Birth Control Methods in the past 12 months

Figure 3 assessed the usage of birth control methods by respondents in the past 12 months. It came out that, majority of the participants, 39.6% indicated that they strongly agree to the use of natural birth control methods such as the withdrawal method in the past 12 months as against 3 out of the 91 respondents disagreeing strongly. Again, 31.9% of the respondents showed agreement to the use of natural birth control methods in the past 12 months as against in 8 respondents disagreeing. Only 15 out of the 91 respondents, that is 16.5% were not sure of their use of natural birth control methods in the past 12 months. Overall, 65 respondents or 71.4% agreed in their usage of natural birth control methods compare with 26 or 28.5% who were not sure, disagreed or strongly disagreed to their use of natural birth control methods in the past 12 months.

5.3.2 Reliability in the use of Natural Birth Control Methods

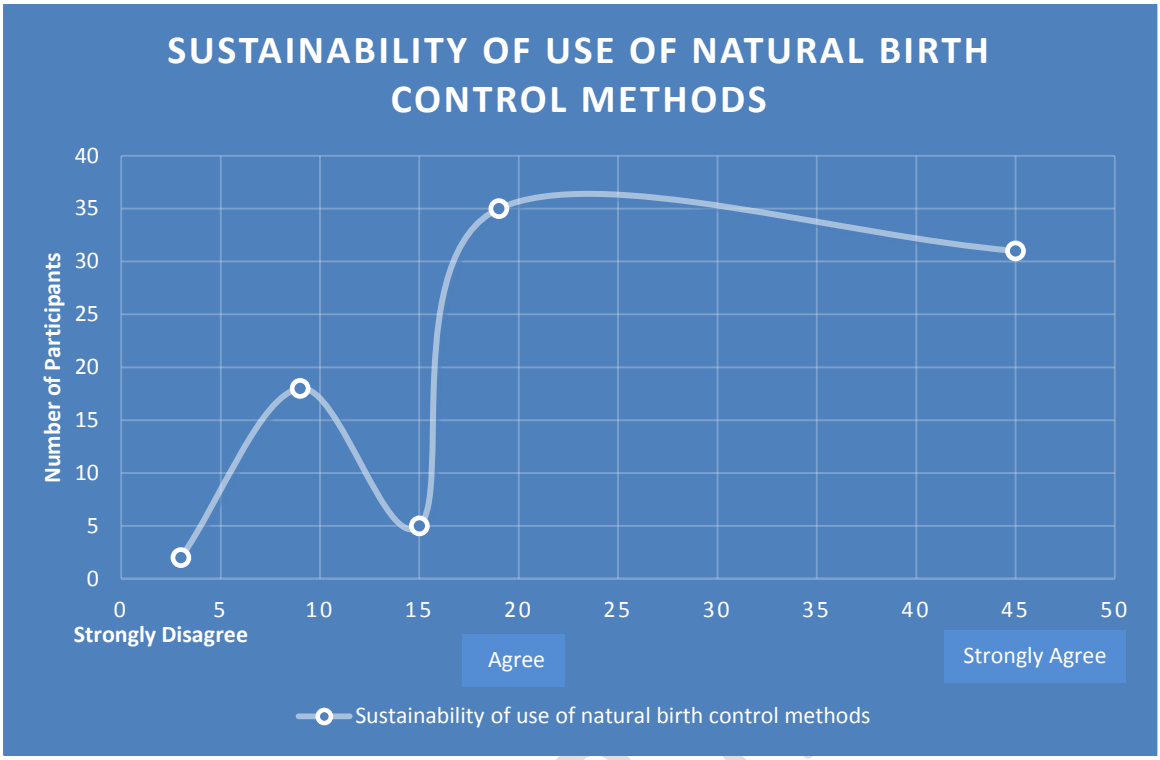


Source: Field Data 2021

Figure 4: Reliability in the usage of natural birth control methods.

Figure 4 showed how respondents perceived the reliability of natural birth control methods the usage over the past 12 months and results indicated that, 34.1% strongly agreed as against 2.2% who strongly disagreed to the reliability of natural birth control methods. On the other hand, 38.5 showed agreement as against 19.8% showing disagreement on the reliability over the past 12 months. Only 5.5% were not sure of the reliability of natural birth control methods within research period. Overall, 72.5% perceived natural birth control methods to be more reliable as compared with 27.5% who were not sure, disagreed or strongly disagreed to the reliability of natural birth control methods over the past 12 months.

5.3.3 Sustainability of the use of Natural Birth Control Methods



Source: Field Data 2021

Figure 5: Sustainability in the use of natural birth control methods in the next 12 months.

In figure 5, respondents' future usage of natural birth control methods was measured as sustainability which showed a result of 49.5% agreeing strongly to their usage in the next 12 months as against 3.3% disagreeing strongly. On the other hand, 20.9% and 9.9% showed agreement and disagreement respectively for their future usage of natural birth control methods in the next 12 months. However, 15 respondents, representing 16.5% were not sure of their future usage of natural birth control methods. In all, 64 out of the 91 respondents, representing 70.3% showed positive perception of the future usage of natural birth control methods.

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

6.1 Introduction

Natural birth control methods have positive response among young adults in Ningo-Prampram municipality. It is believed to be cost effective though some respondents have differing opinions on religious grounds, especially the withdrawal method. In all, people have strong preference to its usage as it is cost effective with minimal side effects on the later life of the user.

There were also concerns on STIs contraction which the respondents believe pose significant danger on the life of users who solely rely as birth control method.

6.2 Summary of Findings

6.2.1 Use of Natural Birth Control Methods in the past 12 months

In the findings, 39.6% showed strong agreement in their usage of natural birth control methods in the past 12 months which contrasts with only 3.3% showing strong disagreement. Remarkably, there was another sharp contrast of 31.9% and 8.8% in those who merely agreed and disagreed in the usage of natural birth control methods respectively. It was observed that, only 16.5% were unsure of their usage of natural birth control methods in the past 12 months.

6.2.2 Reliability in the usage of natural birth control methods

The question on reliability was answered with much enthusiasm as those who strongly agreed (34.1%) and those who merely agreed (38.5%) cumulatively (72.6%) accounted for more than two-thirds of the total number of respondents. It gave the indication of optimism in the future usage of the method since it can be relied upon.

6.2.3 Sustainability of the use of Natural Birth Control Methods

Sustainability was used as a measure to indicate the future willingness to use natural birth control methods and the findings were that, respondents were more willing to resorting to its use than are against it. The results indicated that, 49.5% strongly agreed to their willingness of using it in the next 12 months as against only 3.3% disagreeing strongly. It came out also

that, 20.9% agreed as against 9.9% disagreeing. Predictably, only 16.5% said they were not sure of its usage in the next 12 months.

In all, the strongly agreeing group in the sample constituted 41.7% whereas those in the agreeing group represented 30%. Strikingly, those who were not sure and the disagreeing group were 12.7% each whilst the strongly disagreeing was 2.9 percent. The indication presented in this sample is that, 41.7%, which is close to half of the opinions expressed in the sample are in strong support of the use of natural birth control methods.

6.3 Conclusion

Although this study sought to advocate a sole usage of natural birth control methods due to the highly manifesting side effects of synthetic methods, it is evident from the findings of this study that, on religious grounds and issues relating to the contraction of STIs, one cannot rely solely on the natural methods much as one cannot apply only the artificial methods.

In light of this, the conclusion can be drawn that, making information and educational resources available timeously on both natural and artificial methods, will provide an assuring way of controlling births to curtail the exponential growth in population which has the potential of escalating the spread of diseases, creating conflicts as national resources continue be disproportionally meagre.

6.4 Recommendation

From the foregoing, the following recommendations are made to the stakeholders in healthcare delivery, population control and resource allocation in Ningo-Prampram municipality.

- NCCE should intensify campaign on birth control methods, especially the natural method of abstinence among teenagers; 13 to 19 years to ensure they do not become mothers at an age that their economic means are not sustainable.
- Young adults of child-bearing age must also be taught the proper use of both natural and artificial birth control methods, taking cognizance of safety measures as some artificial methods pose danger on the later-life of users.
- The health directorate of the municipality must have an outreach programme to educate the population on the various birth control measures; using videos and animations to drive

home strong message on the repercussions of the excessive usage of artificial birth control methods on the reproductive system.

7. ETHICAL APPROVAL

Ethical consideration for this case study research was obtained from Nyarkotey College of Holistic Medicine.

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Appendix

RESEARCH QUESTIONNAIRE

Dear Respondent,

I will be very grateful if you could respond to the following questionnaire to enable the researchers obtain data on the topic, "Natural Birth Control Methods among Young Adults in the Ningo-Prampram Municipality of The Greater Accra Region".

This is purely for an academic work and your opinions will highly be confidential. Please respond to the following by either writing in the blank space provided or ticking the appropriate box.

Section 1: Background Information

Please kindly tick appropriately

Gender 1) Male_____ 2) Female _____

Age Group

a) 18 – 24 _____

b) 25 – 30 _____

c) 31 – 36 _____

d) 37 – 42 _____

e) 43 – 49 _____

Number of people in your household

5 or less _____ 2) 6 – 10 _____ 3) More than 10 _____

Number of years lived in this community

(1) 5 years or less _____ (2) 6 – 10 years _____ (3) 11 – 15 years _____

(4) More than 15 years_____

Are you able to read and write?

Yes _____ (2) No _____

Section 2: Usage of natural birth control method

Please circle the most appropriate option for each of the questions below;

Strongly agree (5), agree (4), not sure (3), disagree (2) strongly disagree

5. I have used natural birth control method in the past 12 months
6. I intend using natural birth control method in the coming years.
7. I have strong positive perception toward use of natural birth control method.
8. My attitude toward use of natural birth control method is always positive
9. I enjoy using natural birth control methods
10. My use of natural birth control methods meets my sexual expectation
11. I usually have no complaints on the use of natural birth control methods
12. I prefer natural birth control method to other forms of birth control.

Section 3: Reliability of Natural Birth control methods

Strongly agree (5), agree (4), not sure (3), disagree (2) strongly disagree (1)

Ties

13. In this household, some members see natural birth control method as odd.
14. In this household, we usually discuss forms of birth control.
15. In this household, we have different religious views on birth control methods.
16. In this household, we have members who prefer other forms of birth control.

Section 4: Sustainability of Natural birth control methods

Please circle the most appropriate option for each of the questions below;

Strongly agree (5), agree (4), not sure (3), disagree (2) strongly disagree (1)

17. There are many birth control methods I could choose from
18. There are many friends in my circle who also have preferences as mine

19. The use of natural birth control method is most cost effective

20. The use of natural birth control method poses the danger of STIs

21. The use of natural birth control method continue as long as my partner agrees.