KNOWLEDGE AND ATTITUDE RELATING TO SEXUAL BEHAVIOUR DURING PREGNANCY AMONG WOMEN OF REPRODUCTIVE AGE IN YEMETU COMMUNITY, IBADAN, NIGERIA

BY

Erdoo Abigail IGBANA
B.Sc. Biological Sciences (Benue State University)
MATRIC. NO.: 203592

A Project in the Department of Health Promotion and Education Submitted to Faculty of Public Health

In partial fulfilment of the requirements for the degree of

MASTER OF PUBLIC HEALTH
(POPULATION AND REPRODUCTIVE HEALTH EDUCATION)

Of the

UNIVERSITY OF IBADAN

MAY, 2019

ABSTRACT

Pregnancy is an intriguing period in the life of a woman which brings about several changes that may affect the mental, emotional, physical and psychological wellbeing of the mother and the growth of her unborn child. Sexual behaviour which has been proven to be beneficial during pregnancy is often frowned at in some African communities due to the poor knowledge of its benefits. The study investigated the level of knowledge, attitude and sexual practice, of women of reproductive age during pregnancy in Yemetu community, Ibadan, Oyo state Nigeria.

This was a descriptive cross sectional survey using a multistage sampling technique to select 300 women residing within Yemetu communities. Quantitative data was collected using a semi-structured, interviewer-administered questionnaire. Knowledge was measured on an 11-point scale; score of $\geq$9 was classified as good, $\geq$5.5-8 as fair and <5.5 as poor. Attitude was measured on a 17-point scale; score of $\geq$10 was classified as positive and a score of <10 as negative. Practice was measured on 6-point scale; score of $\geq$3 was classified as healthy while a score of <3 was classified as unhealthy. Qualitative data were collected using an In-depth interview (IDI) guide from 10 consented participants identified to be pregnant and engaging in sexual activities from the questionnaire to explore their attitude and experience. Quantitative data were analysed using descriptive and inferential statistics (Chi square) at $p<0.05$ while Qualitative data were analysed thematically.

Mean age of respondents was 32.1$\pm$7.7 years. Majority (69.9%) had a good knowledge on sexual activity during pregnancy (9.3±2.0) with 89.2% getting a form of knowledge of sexual activities during pregnancy from the healthcare facility. Majority (68.7%) had a positive attitude towards sexual activities during pregnancy (12.4±8.5) with 92.0% affirming that it is gratifying and should be practised anytime during pregnancy**.** Practice of sexual activities during pregnancy was 91.5%. The forms of sexual practices were; vaginal intercourse (98.3%), kissing (38.5%), body fondling (34.4%) and masturbation (15.1%). Frequency of sexual activity during pregnancy included at least once a week (69.0%) and once a month (10.3%).The study recorded a 69.8% change in sexual activity during pregnancy with a

reduction during the first trimester (25.3%), an increase during the second-third trimester (55.4%) with a further drop at the birth week (25.3%). The main reason adduced by women who reported that they did not engaged in sexual activities during pregnancy was unavailability of their partners (33.3%). There was a statistically significant association between Knowledge and level of education of women; sexual activities and pregnancy status; knowledge and attitude towards sexual activity; attitude and sexual activity. Findings from the IDI revealed the following as benefits of engaging in sexual activity during pregnancy: happiness, feeling of being loved, easy delivery, marital harmony and health of the baby.

The study recorded good knowledge, positive attitude and healthy practice of sexual behaviour during pregnancy. Nonetheless, there is need for patient education to reduce the anxiety associated with sexual activity during pregnancy among women.

Keywords: Pregnancy and sexual activities, Sexual anxiety, pregnant women, perceived health risk.

Word count: 489

DEDICATION

This work is dedicated to my parents, my siblings and all women of reproductive age

ACKNOWLEDGEMENT

My profound gratitude goes to my supervisor, Prof. Ademola, J. Ajuwon for his professional support from the inception to the completion of this work; giving me the courage to carry on with this topic, prompt response in assessing my work and giving appropriate suggestions when necessary.

My appreciation goes to other members of staff of the Department of Health Promotion and Education especially Mr. John Imaledo for his relentless guidance, support and provision of materials for this work, The Acting Head of Department, Dr. O.E Oyewole, Dr. F.O Oshiname, Prof. O. Oladepo, Prof Oyedunni, S. Arulogun, Dr. M.A. Titiloye, Dr. Yetunde John-Akinola, Dr. Mojisola Oluwasanu, Mrs. Adeyinka T. Desmenu, Mr John Imaledo for their significant suggestions and intellectual contributions towards this work.

My gratitude also goes to the respondents that spared their time to participate in this research; this work couldn't have been a success without you. Thank you

To my friends and colleagues, Mr Samson Akande, Onuh Gloria, Sule Aisha, Adebola Adesoga, Adebola Bankole, Oyedepo Emmanuel Oyetunde, Grace Anikan, Ifunanya Ibezute I appreciate you guys for Peer review, emotional and physical support.

I most importantly want to appreciate my Parents and Sponsors, Mr. and Mrs. Emmanuel Or for their financial, emotional and intellectual contributions to this work and program.

CERTIFICATION

I hereby certify that this study was carried out by IGBANA, ERDOO ABIGAIL under my supervision in the Department of Health Promotion and Education, Faculty of Public Health, College of Medicine, University of Ibadan, Nigeria.

SUPERVISOR

Ademola, J. Ajuwon

B.Sc. (Lagos); MPH (Ib); PhD (Ib)

Professor

Department of Health Promotion and Education

Faculty of Public Health, College of Medicine,

University of Ibadan, Nigeria.

TABLE OF CONTENTS

LIST OF TABLES

LIST OF FIGURES

LIST OF APPENDICES

CHAPTER ONE

INTRODUCTION

1.0 Background Information

Pregnancy is a term used to describe the period in which a foetus develops inside a woman's womb or uterus. Pregnancy usually lasts about 40 weeks or slightly over 9 months as measures from the last menstrual period to delivery (office on women's Health, 2010). Being pregnant can be exciting and very stressful, especially if it is for the first time (Alder, 1989).

Pregnancy and birth mark a distinct period in the life of a woman. Hormonal alterations, bodily and social changes impact on women's physical well-being, mood, relationship and sexuality during pregnancy. The physical changes in a woman's body during pregnancy receive a lot of attention, but less consideration is given to the emotional changes she could be experiencing. Most existing research on sexuality during pregnancy focuses on the quantitative analysis of sexual activities, but neglects subjective experiences of women sexuality as an important component of health and well-being in a woman's life. Sexual behaviour, which is influenced by biological, psychological, and social factors, is modified as pregnancy progresses (Pauleta *et al.,* 2010).

Asides physical health, a woman's emotional well being and mental outlook also plays an important role in pregnancy. Feelings and experiences during pregnancy and their social and cultural influences should be considered in a qualitative investigation (Sereti *et al.,* 2010) to gain more insight on the impact of such influences on sexual activity during pregnancy. Systematic reviews by Von Sydow and Sereti *et al.,* 1999 have demonstrated that the frequency of coitus does not change or changes only minimally during the first and second trimesters of pregnancy. Over the years, several studies have attempted to explore sexual activities during pregnancy by concentrating on measurable sexual function and frequency (Johnson, 2010).

Sexual behaviours may include but not limiting to masturbation, caressing, kissing, cuddling, fondling, massaging, sucking, oral sex, masturbation, and many others gesture of showing love and tenderness (Allen & Fountain, 2007b; Orshan, 2008; Pilliteri, 2007). Throughout their lifespan, women perceive non-sexual behaviours to be as important as sexual activities and can be more important by the time of pregnancy because of the discomfort sometimes brought by the woman's state. However, pregnancy is said to lead to a decrease on both sexual and non-sexual behaviours (Atputharajah, 1987).

Pregnancy is a huge transition in a woman's life and it involves a complex mix of emotions. For many women, a reduction in the frequency of sexual intercourse, desire, and satisfaction occurs during the third trimester compared with the period before pregnancy (Alder, 1989). Numerous physical and psychological factors may cause this decrease in sexual activity (Stuckey, 2008). Concerning physical changes, hormonal changes can increase levels of oestrogen, progesterone, and prolactin, which are considered to be responsible for nausea and vomiting, breast tenderness, and weight gain; breast tenderness, in addition to fatigue and anxiety, may contribute to general malaise and difficulty in becoming aroused (Basson, 2005). Because sexual desire and arousal influence sexual satisfaction and intercourse frequency, it is understandable that sexual activities tend to decrease during pregnancy (Basson, 2001). Moreover, the duration of intercourse and the ability to experience orgasm decrease during the later phases of pregnancy compared with pre pregnancy, and dyspareunia increases significantly throughout pregnancy (Pauleta *et al.,* 2010). However, many sexually active pregnant women and their partners tend to decrease sexual intercourse during pregnancy because of concerns about pregnancy complications (Bartellas *et al.,* 2000).

1.1 Statement of the problem

Pregnancy is a unique period of physical, psychological, emotional, social and cultural changes (Bitzer and Alder, 2015) which may influence and affect sexual activities during this period. These changes tend to occur simultaneously although relatively little is known about the way in which women without pregnancy complications respond to this stage in their lives. No other stage in a woman's life is as loaded with cultural stereotypes as pregnancy

Unfortunately, sexual activities during pregnancy, which has been proven to be beneficial, is often frowned at in some African communities (Adinma and Aust, 1995), leading to reduction in the act during this period among both men and women (Orji, Ogunlola and Fasubaa, 2009; Rado, Vranes and Sunjic, 2014). Poor knowledge of its benefit and fear of hurting the foetus has been a challenge for many couples (Rado *et al.,* 2014). There are several studies previously conducted on sexual activities during and after pregnancy, at health facility settings, describing the changes and experience women undergo during pregnancy. However, the knowledge, attitude and practice relating to sexual activity during pregnancy has not been well explained (Laurisse, 2014). This study was therefore designed to investigate the level of knowledge, attitudes, and practice regarding sexual behaviours during pregnancy, among women of reproductive age in Yemetu community, Ibadan.

1.2 Justification

Various studies contend that it is useful for pregnant women to continue to be sexually active, specifically noting that overall sexual satisfaction was correlated with feeling happy about being pregnant, feeling more attractive in late pregnancy than before pregnancy, and experiencing orgasm (Reamy, *et al.,* 1982*)* and subsequently improving the mental and psychological health of pregnant women. Although *s*exual activity has been suggested as a way to prepare for induced labour; some believe the natural prostaglandin content of seminal liquid can favour the maturation process of the cervix making it more flexible, allowing for easier and faster dilation and effacement of the cervix, sexuality in pregnancy is hardly discuss during prenatal visits and some women may choose to avoid sex during pregnancy without discussing it with their health care provider (Lewis, 2006).

Globally, it has been noted that research has been conducted among pregnant women attending antenatal clinics. In a purposively clinical based study conducted in Santa Rosa city, the province of Laguna, in the Philippines, measuring sexual behaviour during pregnancy recorded a 70% response rate (Laurisse, 2014). Moreover, in another study conducted in Ibadan involving the effects of pregnancy and child birth on sexuality of women, there was only a 1% decline (Bello *et al.,* 2010). In another study measuring the perception and practice of women on sexuality in Nigeria, also focusing on prenatal clinic

attendees tilted towards a positive attitude to sexuality in pregnancy (Adinma, 1995). However none of such studies has assessed sexual behaviour among women during pregnancy in a community setting.

The study outcomes will aid in the identification of respondent's knowledge of the benefits of sexual activities during pregnancy. It will also help identify attitude and willingness of respondents to engage in the act. In addition, outcomes will help in designing a new curriculum, review of existing sexuality education services been rendered by healthcare providers as well as sustainable community directed interventions involving women of reproductive age in the community to increase the uptake of health services such as health education and counselling targeting the mental and psychological health of women.

1.3 Research Questions

This study provided answers to the following questions;

1. What is the level of knowledge of the benefits of sexual behaviour during pregnancy among women of reproductive age?
2. What is the attitude of women of reproductive age towards sexual behaviour during pregnancy?
3. What are the sources of information on sexual practices during pregnancy?
4. What sexual activities do women of reproductive age participate in during pregnancy?

1.4 **Broad Objective**

The broad objective was to investigate knowledge and behavioural practices of women of reproductive age during pregnancy in Yemetu, Ibadan, Nigeria.

1.5 Specific Objectives

1. To assess the level of knowledge of the benefits of sexual behaviours among women of reproductive age during pregnancy.
2. To examine the attitude of women of reproductive age towards sexual behaviour during pregnancy.

3. To identify the sources of information on sexual practices among women of reproductive age during pregnancy.
4. To determine the sexual activities women of reproductive age participate in during pregnancy.

1.5 Hypotheses

There is no significant association between;

1. The knowledge of the benefits of sexual behaviours during pregnancy and the demographic variables including age, educational level, marital status and occupation of women.
2. Practice of sexual activities and the demographic variables
3. Level of Knowledge and source of information
4. Knowledge and practice of sexual behaviour during pregnancy.
5. Practice of sexual activities and current pregnancy status
6. Level of knowledge and Attitude towards sexual behaviour during pregnancy among women
7. Attitude and sexual behaviours

1.6 Operational Terms

1. **Sexual behaviours**; gesture of showing love and tenderness involving, caressing, kissing, cuddling, fondling, massaging, sucking, oral sex, masturbation.
2. **Sexual Activities**; Practice of sexual behaviours
3. **Coitus**; vaginal intercourse
4. **Maternal sexuality**; a woman's sexual feelings or behaviours while she is involved in tasks normally associated with motherhood.
5. **Pregnancy**; The period in which a foetus develops inside a woman's uterus, lasting about 40 weeks as measured from the last menstrual period to delivery.
6. **Women of reproductive age**; All females within the age 15-49

CHAPTER TWO

LITERATURE REVIEW

2.1 Overview of pregnancy Period

Pregnant women experience various fears during pregnancy, including concerns about the baby's health, her husband's sexual interest, and her own body image. Those fears concerning the baby's health and sexual intercourse are largely related to what the woman believes about her sexuality during pregnancy; what she can do and what she cannot do. (Thorpe & Ling, 1992).

Pregnancy is the term used to describe the period in which a foetus develops inside a woman's uterus, lasting about 40 weeks as measured from the last menstrual period to delivery. (American College of Obstetricians and Gynaecologists, 2015). A clinical pregnancy is confirmed by both high levels of the human chorionic gonadotropic hormone and ultrasound confirmation of a gestational sac or foetal pole (heartbeat), this can be detected at about 5 weeks of pregnancy or one week after a missed period (Gurevich, 2018). Gokyildiz & Kizilkaya, 2005; defines pregnancy as a difficult period of life for women punctuated by physical and emotional changes that affect their sexual lives. Those changes are generally thought to be associated with hormonal alterations that go with the evolution of pregnancy.

There is no evidence however relating hormonal changes that occur in pregnancy to the sexual behavioural modification (Jurgense, 1985, as cited by Bitzer & Alder, 2000). It could therefore be non-hormonal factors such as emotional, socio-economical, and cultural factors that are more likely to provoke such changes in sexual behaviour. Interestingly, the identity role of the woman, the fact of becoming a mother, the partner's reaction to pregnancy, and the woman's beliefs about sexuality are also contributing factors (Hogan as cited in Gokyidiz & Kizilkaya, 2005). The long list of factors influencing the women's sexual behaviour during pregnancy, the misconceptions regarding the benefits and harms of sexual activity cannot be over emphasized (Von Sydow, 1999).

2.2 Health Concerns during Pregnancy

Feminine development has been regarded by most personality theorists as unimportant, deviant or a minor variation of the male-determined stages of life (Leifer, 1980). Indeed, attitudes towards pregnancy have been one of the most prevalent sources of discrimination against women. The knowledge of female sexuality has constantly lagged behind with relatively little known about the marital functioning of women during pregnancy.

Surprisingly, few psychological studies have dealt with women's subjective reactions to pregnancy. In fact, the most vivid accounts of what pregnancy and motherhood mean to women themselves have come not from the psychological literature but from feminist scholars, (Oakley, 1980). Other studies report increased anxiety during pregnancy and present evidence that pregnancy is characterised by emotional changes and may be experienced as a psychological challenge (Newton, 1995). A woman's moods and emotions can range from feeling overjoyed and excited to the lows of feeling impatient and scared as the delivery date approaches. Fear is a common emotion during pregnancy, in the first trimester, a woman may be afraid of having a miscarriage or engaging in anything that may affect her baby's health such that by the end of her pregnancy, a woman may be scared of being in pain during labour. This may sometimes lead to anxiety, research has shown that a woman's anxiety during pregnancy might affect her baby, the implication of this is that, infants born to women who had high levels of anxiety during pregnancy had a weakened immune response to vaccines by 6 months of age, compared to babies with more relaxed mothers (Isajeva *et al*. 2012).

Similarly, during the second and third trimesters, as a woman's baby bump becomes more visible and she gains more weight, she may feel dissatisfied with her body and how she appears and this may affect her self esteem (Brown *et al.,* 2008). These changes to a woman's looks, shape and perceived attractiveness may bring up a complicated mix of emotions.

2.3 Sexual Activities during Pregnancy

Various studies in the field of sexual and reproductive health have focused on understanding the relationship between the gestation period and sexual behaviour (Kharmis, 2007). The frequency of sexual intercourse quite varies but tends to decrease with gestational age. Nevertheless, the average woman engages in sexual activity as often as five times a month in the second trimester. On the contrary, the frequency of intercourse increases only in minority of cases (Gokyildiz and Beji 2005). Frequently there is decreased libido and sexual satisfaction attributed often to a sense of decreased attractiveness as well as the usual aches and pains of pregnancy. Typically, as pregnancy progresses, the frequency and length of intercourse decreases as well as the achievement of orgasm, sexual satisfaction and stimulation. There is also an increase in dyspareunia (Sacomori and Cardoso, 2010). In order to improve the comfort of sexual during pregnancy; couples are advised to apply lubricant during vaginal sexual intercourse, place pillows under the pelvis and use different positions. Moreover, communication between partners would be of great assistance.

2.4 Benefits of sexual activity during pregnancy

Over time, sexual intercourse has been considered merely one of a number of forms of sexual contact, however, sexuality during pregnancy have undergone considerable transformation. Many authors emphasise that pregnancy is a stimulus for partners to search for ways to maintain mutual emotional bond, close physical affinity and satisfy sexual needs not necessarily finished with an intercourse. Sexual intercourse during pregnancy has been suggested to increase marital bond and harmony amongst couple (Adinma, 1995). This is however not restricted, in a study conducted in Egypt, women were reported to feel that sex during pregnancy would improve foetal well-being and widens the birth canal, thus facilitating labour as reported by Bello *et al.,* 2010. The fact that one of the two partners is pregnant imposes some restrictions on sexual life. Most studies concerning sexual activities during pregnancy have focused on observing physiological changes, and mutual relationship

2.4.1 Induction of labour

In 2001 a Cochrane review assessing sex as a method for induction of labour, found only one trial of 28 women at greater than 39 weeks gestation that were told to have three nights of sex compared to those who were asked to abstain (Schaffir, 2006). This study confirmed no change in Bishop Score or 5 minute Apgar score and did not provide data on encouraging earlier delivery. In a RCT, 108 term pregnant women were advised to have sex and compared to 102 control group who were not given this advice. The coitus rate was not that different (60% in the intervention group compared to 40% in the control group). The two groups were similar in the rates of spontaneous onset of labour, caesarean section and neonatal outcomes (Tan *et al.,* 2009).

The relationship between orgasm and oxytocin release has never been documented. Nevertheless, in one study repeated orgasms produced rhythmic uterine contractions that were associated with decorations. This study neither proved oxytocin release nor proved any development to labour pains (Tan *et al.,* 2006). In another study there was a link between self reporting of being able to achieve orgasm before pregnancy (supposedly linked to increased frequency on intercourse in pregnancy) was associated with a shorter second stage of labour, less labour inductions, lower oxytocin augmentation rate and lower forceps delivery rate (Schaffir, 2006). Overall, there is no literature to support the theory that sex at term has an effect on Bishop Score, spontaneous onset of labour, caesarean section rates or neonatal outcomes. Also, there are not any known harmful consequences. The appropriate advice to pregnant women would seem to be that, if they are interested in having sex, there is probably no harm and there may be a possible benefit.

2.4.2 Cervical ripening

Prostaglandin concentrations increased by a factor of 10-50 in the cervical mucus of pregnant women 2-4 hours after intercourse. In a comparative study of 47 women who had intercourse at term compared to 46 who abstained, there was no difference in the Bishop score but the sexually active group delivered on average four days earlier which was not considered to be clinically significant (Toth, Rehnstrom and Fuchs, 1989).

2.5 Beliefs of Women on Sexual Activity during Pregnancy

It has been reported that 49% of women worry at some point that sexual intercourse may harm the pregnancy (Bartellas, Crane, Daley, Bennet, and Hutchens, 2000). Murkoff and Mazel (2008) have listed not less than six fears related to the beliefs of pregnant women: the fear of causing a miscarriage, the fear that having an orgasm will stimulate miscarriage or early labour, the fear that the foetus is "watching" or "aware," the fear of "hitting" the baby on the head, the fear that sex will cause infection, and the belief that sex in late pregnancy will cause premature labour thus, some women feel it necessary to avoid sexual intercourse (Andrews, 2005), therefore, the fear of injuring the foetus in its first months of life may serve also to diminish interest in sexual activities (Lewis & Black, 2006). Lewis and Black (2006) further states that some women believe that sexual activity is acceptable only for the purpose of procreation.

Most of the pregnant women studied by Fok, Chan, and Yuen (2005) were concerned about the possible adverse effects of sexual intercourse on the baby (82.9%). Their worries were principally bleeding (74.8%), labour (60.7%), infection (60.7%), rupture of membranes (54%), and foetal damage (71.8%). Finally, Adinma (1995) revealed that 30.2 percent of her respondents believed that sexual activity might cause abortion in early pregnancy. In all those cases, there was a significant decrease in women's sexuality. Having vaginal sex was said to have no negative impact on pregnancy in these studies. However, many pregnant couples are hesitant to engage in sexual activities as pregnancy progresses for fear of hurting the child. That common misconception needs to be addressed more often and openly by health practitioners.

Health practitioners sometimes attribute these to the androgen level. Meanwhile, there are very limited studies correlating both. On the other hand, many studies have concluded that the sexual function in pregnancy is not associated with the androgen blood levels (Erol *et al.,* 2007). If such misunderstanding is avoided, the sexual needs of pregnant women and their partners could be met by giving them accurate information regarding sexuality in pregnancy (Murlagh, 2010).

2.6 Information on guidelines regarding sexual behaviours during pregnancy

Female sexuality during pregnancy is almost as old as the world because the human female is the only species that can boast to any sexual activity during pregnancy (Still, 1986). It had been refuted brilliantly the claims of those who would differentiate the sexual and the reproductive functions in women and treat them as if they could be separately studied (Ludovici, 1953).

The lack of information that faces pregnant women regarding sexuality during pregnancy has been documented in several literatures. In Olusegun and Ireti's (2011) study, women were asked questions about what they know as guidelines for sexual intercourse in pregnancy. Of the total number, 0.5 % said it was not allowed under any circumstance while only 24.3 % knew that it was not allowed if there are certain complications. Of the total percentage 7.4% felt that it could be allowed occasionally, 30.9 % felt that it could not allowed in the first three months, while 2.7 % thought it could not allowed on the last month, and 39.4 % believed that it was not allowed anytime during pregnancy. They concluded that despite the relatively high level of education of the women studied, there was poor knowledge on the basic guidelines concerning sexual intercourse in pregnancy. More disturbing was the fact that this poor knowledge did not seem to improve with multiple pregnancies.

Unfortunately, there is a tendency for healthcare providers to presume that a pregnant woman does not need sexual advice especially when she does not feel comfortable having such discussion. Information may be shared with the pregnant woman by her mother, mother-in-law, grandmother, or female friends. A woman may choose to abstain without consulting with her health-care provider if she is uncomfortable discussing sexuality with someone outside her immediate circle of female friends and relatives (Lewis and Black, 2006). Runeborg (2008) reminds that issues relating to human sexuality are not only for children and young people but it is important as well for all adults who still lack information or are engaged in new situations that require new kinds of knowledge. Pregnant women stick completely to Runeborg's statement when it is considered that even though for getting pregnant they needed a minimum of information about sexuality.

Pregnancy is a new experience, which comes with a couple of physical and psychological changes that influence the body image and sexual behaviour. Therefore, pregnant women need new information regarding those changes to be able to cope up. Also because it is certitude that sexual problems during pregnancy may have a negative effect on marital bonds and may be an obstacle for the adaptation of women to this transient phase (Aslan, *et al.,* 2005).

2.7 Attitude of Pregnant Women towards Sexual activities in Pregnancy

More recently, premarital counselling and contraception are discussed in most gyneco-obstetrical books, but rarely, is the issue on sexuality during pregnancy and the post-partum period mentioned. This has reflected, too, in the attitude of the society towards sexuality and its difficulty in accepting that pregnant women have sexual needs (Still, 1986). Nowadays, there are certainly more materials being published regarding sexuality during pregnancy. Nonetheless, still the general attitude regarding pregnant women's sexuality remains the same and this seems to affect their own attitude toward sexuality.

Some literature do not present pregnant women as directly linked with the negative attitude towards sexuality during pregnancy, but more often the attitude of these pregnant women is driven by their beliefs about the potential harm on their unborn baby (Uwapusitanon & Choobun, 2004). This is supported by Ijzen and Fishbein's theory which stipulates that belief determines one's attitude on a given behaviour, so the "person's attitude towards a behaviour can be predicted by multiplying the evaluation of each of the behaviour's consequences by the strength of the belief". Other factors such as the lack of knowledge, anger, and fear are presented as facilitators in the rise of a negative attitude toward sexuality during pregnancy among pregnant women (Brown, Bradford, & Ling, 2008). Some women do not think that sexual intercourse during pregnancy is a necessity. They are having hard time finding a concrete and meaningful reason for having sex during pregnancy. Even though over 65 percent of Naim and Buttho's (2000) respondents found sexual activity gratifying, over 40 percent did agree that the purpose of sexual activity during pregnancy is just to fulfil the marital obligations; therefore the partner is mostly the initiator of sexual activity during pregnancy.

A positive attitude regarding sexuality during pregnancy is also noted in the literature. Adinma (1995) concludes that the attitude toward sexuality among African women during pregnancy and after childbirth is positive. She recommends therefore considering the positive attitude in the overall management of sexuality in the pregnant African woman. Still in Nigeria, Bello *et al.,* (2011) concluded that their respondents had a positive attitude towards sexuality during pregnancy and indicated an interest in discussing sexuality with their caregivers. In Asia during the same period of Adinma's study, Bustan, *et al.,* (1995) in their study of "Maternal sexuality during pregnancy and after child birth" on Muslim Kuwaiti women demonstrated that a positive attitude toward sexuality in pregnancy has a positive impact on sexual behaviour during pregnancy too.

Fluctuations in sexual desire are effectively normal during pregnancy. Most women admit that their libido change at least to some degree in pregnancy. Sexual desire is largely influenced by the oestrogen level and the mother's beliefs. In addition, the researchers agree that sexual desire is the factor least affected during pregnancy. It is even said to be higher than pre-pregnancy at certain gestational ages. Allen and Fountain (2007b) call on the health-care providers and the childbirth educators to validate that increase in sexual desire within the range of normalcy and to encourage women to explore non-coital means of intimacy with their partners, including cuddling, fondling, or masturbation to maintain closeness and relieve sexual tension.

2.8 Factors influencing the Practice of Sexual Activities during Pregnancy

There is a range of non-penetrative sexual activity: caressing, kissing, cuddling, fondling, massaging, sucking, oral sex, masturbation, and many others gesture of showing love and tenderness (Allen & Fountain, 2007; Orshan, 2008). Concerning women throughout their lifespan, non-coital behaviours are as important as coital activity and can be more important by the time of pregnancy because of the discomfort brought by the woman's state. However, pregnancy is said to lead to a decrease on both coital and non-coital behaviours (Atputharajah, 1987).

According to Main *et al.,* (1993) Hippocrates had conferred to sexual intercourse during pregnancy the power to lead to abortion. Some traditions, such as those held by the British strongly discourage sexual intercourse during pregnancy. The cultural prescriptions

generally affect the women's response regarding sexual intercourse during pregnancy, perhaps because of cultural tendencies to not associate expectant mothers with sexuality. However, researchers have not found that sexual intercourse is contraindicated during pregnancy in a healthy pregnant woman (Wong *et al.,* 2009).

Sexual intercourse can be prohibited during pregnancy in case of vaginal bleeding, placenta covering the opening of a woman's cervix during pregnancy, premature dilatation of the cervix, history of premature delivery, multiple pregnancy, engaged foetal head, and the presence of infection (Murkoff, 2008; Orshan, 2008 and Wong *et al.,* 2009). The potential physical effects of the sexual activity during pregnancy then must be discussed with the health care practitioner. The pregnant woman and her partner cannot decide to stop sexual intercourse without consulting the health care provider since other options as non-coital behaviour may be explored (Andrews, 2005).

2.9 Complications of sexual intercourse in pregnancy

The risks of sexual intercourse during pregnancy include bleeding, pelvic inflammatory disease, placental abruption, venous air embolism and uterine rupture. Vaginal bleeding in pregnancy is common and often has no harmful effect. However, it is associated with spontaneous abortion, preterm delivery and low birth weight. In contrast to common belief, sexual intercourse is not associated to vaginal bleeding in pregnancy; this was confirmed in a cohort study of vaginal bleeding in the first trimester (Bustan, 1995).

It has been assumed that penile stimulation of the cervix during intercourse can result in a similar risk of haemorrhage and as a result, women have been advised to abstain while pregnant. However, little evidence exists to support this typical advice, likely because it is an ethically impossible study to perform and most physicians would be too embarrassed to publish a case report. There is one study that demonstrates the safety of trans-vaginal ultrasound probes in the setting of placenta praevia in which they demonstrated a mean angle between the rigid probe and the axis of cervix and concluded that 'it is not physically possible for the vaginal probe, which is fixed and straight, to enter the cervix without being aligned with the cervical canal' and demonstrated no cases of vaginal

bleeding (Truhlar *et al.,* 2007). Despite poor evidence, it is probably still safest to advise women with placenta praevia to refrain since the theoretical risk of ante partum haemorrhage could be catastrophic. Restriction of sexual intercourse is often recommended for prevention and management of threatened preterm labour (PTL). The mechanisms suggested include: oxytocin release by nipple and/or clitoral stimulation, prostaglandin in semen, ripening of the cervix and increased vaginal colonization of microorganisms.

In general, most of the studies could not find any relationship between frequency of intercourse and Preterm labour (Nassar *et al.,* 2004). However, some studies identified specific risk groups where sexual activity increased the risk for PTL. Such risk factors included: lower genital tract infection (Read and Klebanoff, 2002) and colonization of the vagina with specific microorganisms (Nassar *et al.,* 2004).

2.10 Conceptual model and its application to the study; Theory of Reasoned Action.

The theory of Reasoned Action was developed by Martin Fishbein and Icek Ajzen. The theory of Reasoned Action is a behavioural theory that specifies a limited number of psychological variables that can influence a behavior; (a) intention; (b) attitude toward the behaviour; (c) subjective norm; and (d) behavioural control beliefs. There are two important changes. First, Reasoned Actions adds another element in the process of persuasion, behavioral intention. Reasoned Action is explicitly concerned with behavior. However, this theory also recognizes that there are situations that limit the influence of attitude on behavior. Therefore, Reasoned Action predicts behavioral intention, a compromise between stopping at attitude predictions and actually predicting behavior. In relation to assessing knowledge, attitude and practice of sexual behaviour among women of reproductive age, the following tenets in the model were applied as discussed below;

Behavioural intention

This tenet described how modifying factors such as; knowledge, age, number of co-wives can influence an individual's perception like perceived likelihood of engaging in sexual activities during pregnancy. The modifying factors will also influence individual's

perceived benefit and constraints of sexual activity, it also determine if a person considers sexual activity as a threat to pregnancy. This tenet also indirectly influences an individual's approach to experiencing sexual activities during pregnancy. Section A and B on the instrument explored this variable by asking questions such as information on sexual behaviour during pregnancy, perceived consequences of engaging in sexual activities during pregnancy.

Subjective norm

These are beliefs about whether key people whom they discuss and share information with such spouse, relative, friends and health personnel approve or disapprove of sexual behavior during pregnancy, what an individual thinks others would want or expect them to do and the motivation to comply or how important it is for them to do what they think others expect of them; this will serve as motivation to engage in sexual behaviour. This is reflected in section C of the research instrument.

Attitude

This is the personal evaluation of sexual activity during pregnancy.i.e do the women see sexual activities during pregnancy as good, neutral or bad. Questions exploring attitude of women towards sexual activity are reflected in section D of the research instrument. Attitude influences and predicts behaviour which may be positive or negative.

Perceived behavioural control

Belief that one has, and can exercise, control over performing the behavior Do they believe engaging in sexual activities during pregnancy is up to them? This entails the ability of pregnant women to engage in sexual activities given the presence of factors such as encouragement from the health facility, relatives or significant other and/or the knowledge of the outcome (benefits) of such behaviour that may facilitate or impede its practice. This tenet was explored in section E of the study instrument.

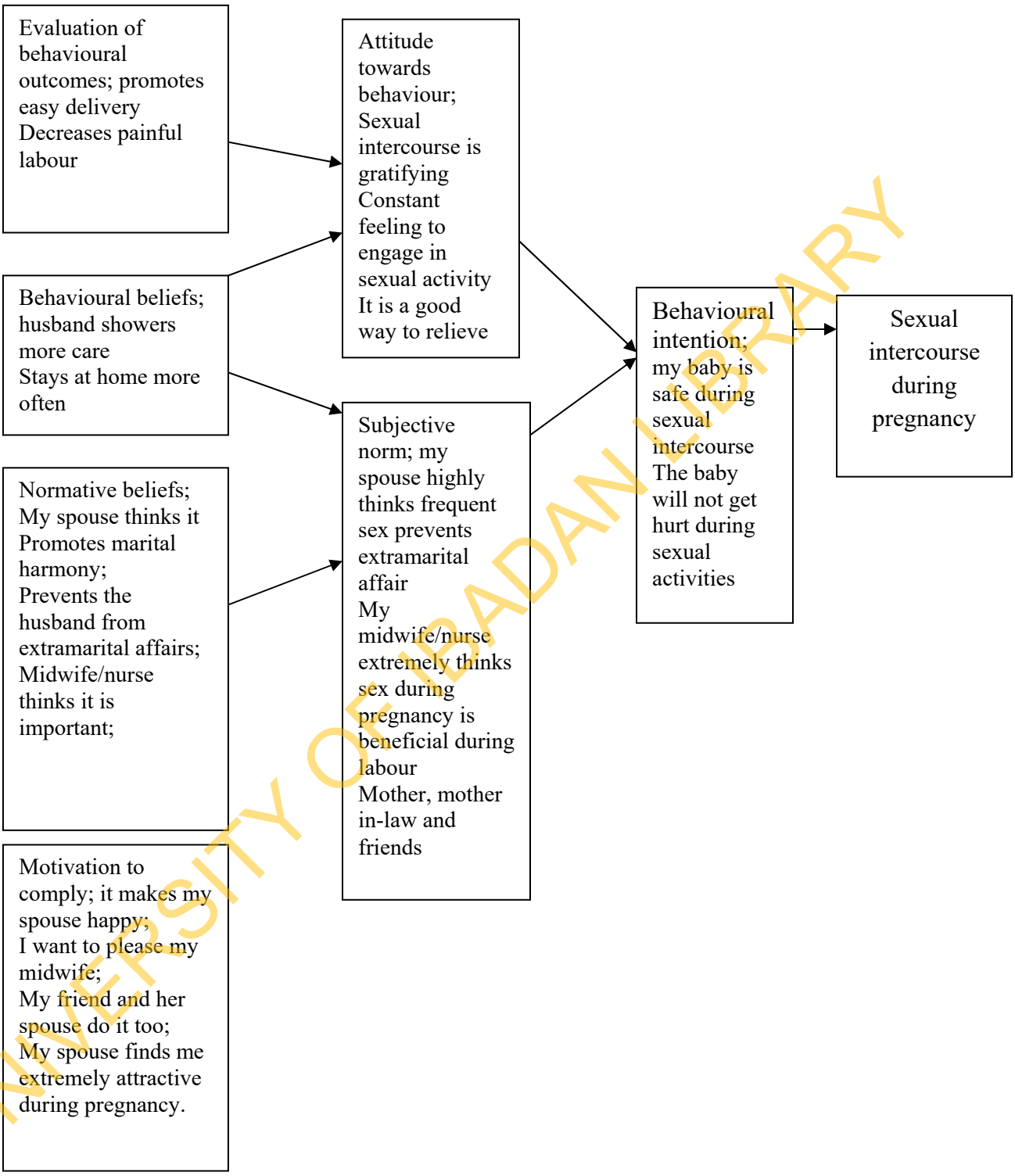


Fig.1.1 The theory of Reasoned Action explaining knowledge, attitude and practice of sexual behaviours during pregnancy (Ajzen & Fishbein 1980)

CHAPTER THREE

METHODOLOGY

3.1 Research Design

The study was descriptive and cross sectional in design.

3.2 Description of the Study Area

Yemetu is one of the indigenous communities in ward three, Ibadan North Local Government Area. It is bounded on the North by the University College Hospital, on the West by Beere road, on the East by the State Secretariat road and on the South by Oje road. The community combines some of the features of an urban-slum which includes poor housing units, dense and overcrowded living quarters which creates breeding grounds for communicable diseases as described by the United Nations Human Settlements Programme (UN HABITAT, 2005). It has been observed that the community consists of both the core settlers and the transitory settlers. The women are predominantly petty traders, artisans and market traders.

The community has one police station, one secondary health facility, five functioning private hospitals and fifteen patent medicine stores, these which will therefore provide an avenue to get information that will help assess their knowledge, attitude and practice of sexual behaviours during pregnancy. Recent information from the National Population Commission reveals that the current estimated population is 110,758 with women within the age range 15-49 estimated to be 25,921. The community is divided into ten different clusters of forty-four settlements as stated by the Yemetu Community Urban Project Development Association.

3.3 Study population

The study was conducted among women of reproductive age living within the communities of Yemetu, located in Ibadan north consisting of a total estimate of 25,921 women of reproductive age (NPC, 2015). The study was carried out among women who were currently pregnant, women who had been pregnant in the last one year and women who had given informed consent to participate in the study.

3.4 Inclusion criteria

1. Women living in Yemetu as at the time study is carried out
2. Women within the age range 15-49 years old.
3. Women who report that they are currently pregnant and/or primid.
4. Women who give informed consent

3.5 Exclusion criteria

1. Women who have never being pregnant.
2. Individuals who are below 15 years and not living with their partner or spouse.
3. Women who are not living within Yemetu communities.
4. Women who decline consent to participate.

3.6 Sample size determination;

Araoye's (2004) formula, $N= Z^2pq/ d^2$ for calculating descriptive study sample size was used for this study.

Therefore, using the prevalence of similar studies conducted in Jos, by Anzaku *et al.,* (2015) of 20%:204 respondents), the prevalence for this study was derived as follows $N= \frac{(1.96)^2\times0.20\times0.80}{0.05\times0.05} = 246$

A non-response rate of 10% of 246 = 24.6 approximately 25

Therefore, 10% of 246 will be added to sample size calculated to make the sample size 271. Approximately **300** for a better representation

3.7 Sampling procedures for quantitative study

A three staged sampling technique was used for recruitment of study participants. Details of the procedures for the recruitment in each stage are provided below

Stage 1:

A proportionate sampling was done by mapping out the communities within Yemetu to determine the number of respondents that will be recruited in each community. Yemetu is made up of 44 sub areas; these areas have been clustered into 10 communities based on proximity and estimate population size as stated by the Yemetu community Urban Project Development Association. These included;

1. Aladorin Central(Awos, Obadara Road, Ore-meji, Bababumi area, Dandanu KDF Area, Queen Elizabeth road opposite UCH Area).
2. Oke-Aremo Junction; Aloko Compound, Adatula Area, Atoo Area, Aroworowon/Oloola, Bino Compound area.
3. Oni-Lane; Gbajumo Avenue, Kogbe Lane, Adijumari I/II, Matanfa I/II, Adatan Compound area.
4. Yemetu Rogan; Omolewa, Adisa Adeoye, Kolapo Aremu, God's Blessing, Barracks.
5. Yemetu Yekere; Sogbeyin, Faremi/ Abanise, Sangodoyin, Arowotosuna.
6. Adeoyo Central; Oju Adeoyo, Agbadigbudu, Isale Adeoyo, Oju Koto.
7. Akabiako; Oloke Compound area, Akuja Compound area, Opere/Matanga II, Yemetu Stream/ Yemetu Oju Odo
8. Isale Oje; Temidire, Kadelu, Inu Koto.
9. Yemetu Adabale; Ile-Olota, Akin bile, Adekanbi, Alawada, Igosun.
10. Delesolu; Ojo Badan Compound area, Zion Area, Total garden,

The number of women recruited in each clustered community was determined proportionately based on an estimated population of reproductive aged women in those communities (25,921) using the formula below;

$$\text{Number of respondents for each community} = \frac{\text{Total number of RA women in each community} \times \text{Sample size}}{\text{Total number of RA women in all clusters}}$$

$$\text{E.g.No. of Respondents in Isale Oje area} = \frac{3787 \times 300}{25921} = 44$$

Table 3.1 No of participants in each community

S/N	Cluster communities	Number of Reproductive aged women in the community	Number of selected participants in the community
1.	Isale Oje	3787	44
2.	Delesolu	1928	23
3.	Oni-lane	3457	40
4.	Yemetu Rogan	3611	42
5.	Alaadorin	1879	21
6.	Oke Aremo	2139	24
7.	Yemetu Yekere	3370	39
8.	Yemetu Adabale	2180	26
9.	Adeoyo Central	1676	19
10.	Akabiako	1894	22
	Total	**25921**	**300**

Source; National Population Commission, Oyo State (2015)

Stage 2:

This involved the selection of households that would participate in the study; the houses in each cluster was numbered and then written on a paper for the purpose of balloting; only the houses picked through balloting were selected. Each selected woman in the household that satisfied the inclusion criteria was randomly invited to participate in the study. For households in which more than one woman was eligible for recruitment into study, two ballot papers were made and any of the women who picked a "yes" was recruited into the study.

Stage 3:

Consent was obtained from the women before questionnaire was administered. These were recruited from all the clustered communities in Yemetu. Eligible participants who refused to participate were replaced with other participants who consented and signed the consent form before interviews were conducted

3.8 Sample Procedures for Qualitative study

The questionnaire was scanned through to identify women who were pregnant immediately after questionnaire administration. Consent was obtained to conduct in-depth interviews, only consenting pregnant women were individually taken to a secluded area within the household for the purpose of privacy and interviewed..

3.9 Procedures and Instrument for Data Collection

Quantitative (questionnaire) and qualitative methods (In-depth interview) were used for data collection.

3.9.1Quantitative method

A semi- structured, pre-tested, interviewer-administered questionnaire was used to collect information from the research participants (see Appendix II). This was developed based on the set objectives, review of literature and guidance of the research supervisor. The questionnaire consisted of five (5) sections. Section A assessed the socio-demographic characteristics of study participants. Section B explored the general knowledge of subjects on sexual behavior during pregnancy. Section C identified the sources of information of respondents regarding sexual behavior during pregnancy. Section D explored the attitude

of women towards sexual behavior during pregnancy; Section E explored the practice of sexual behavior during pregnancy.

Three (3) different scales were used during the quantitative study. These were; a scale for assessing the general knowledge of respondents on sexual behavior during pregnancy, a scale for determining their attitude towards sexual behavior during pregnancy and a scale for assessing respondents' sexual behavior during pregnancy.

3.9.2 Qualitative method

An In-depth Interview was conducted using an IDI guide (see Appendix II). This consisted of questions targeting the attitude, practices and perceived benefits of sexual behaviours during pregnancy. Respondents' who were found to be pregnant during the study were also interviewed using the IDI guide.

3.10 Validity

Extensive literature review was done to derive items on the draft questionnaire. It was critically reviewed by the research supervisor, senior colleagues and peers. Validity was also ensured by using simple language and ensuring clarity of questions in the research instrument. Some questions were adopted from previous studies (Ajen *et al.,* 2015: Adimma *et al,* 1995) studies regarding knowledge of respondents and sources of information

3.10.1 Reliability

To ensure reliability, a pretest was conducted among 10% of the study size of women of reproductive age who are pregnant or who have been pregnant in the last one year at ward 5 Akinyele LGA, which has similar features as the main study area as regards population characteristics and socio-demography. The pretest excluded individuals who were not married and women who declined consent. After the administration of the questionnaires, they were asked about the simplicity of each question, whether they understand the questions or not and suggest the removal of some questions, language or option. Cronbach's alpha was used to obtain a reliability coefficient. Score of 0.5 upward will be reliable. The reliability obtained for this study was 0.75 Cronbach's alpha which indicated strong reliability of the instrument. This was done to determine whether the questions

were clear and simple enough for respondents to understand and to also determine consistency of the questions.

3.11 Data Collection Process

Quantitative Component

Three (3) trained research assistants conducted interviews with the study participants to ensure viable collection of data. Their training featured on; providing an overview of the research topic, obtaining informed consent, data collection procedure, how to review questionnaire to ensure completeness and accuracy, issues relating to privacy and good interpersonal relationship. The criteria for selection of research assistants included; good communication skill, good interpersonal relationship, availability, interest for the research, respect for persons, familiarity with communities within Yemetu and being opened to acquiring good knowledge of the research topic after training.

Questionnaire was administered to selected study participants (one copy per participant) by the researcher and the three (3) trained research assistants after obtaining informed consent through provision of adequate information about the study; on the purpose, the risk involved, the benefit and the requirement of the participant. Data were collected in the selected households of the study participants within duration of seven days. For the purpose of reference and to avoid discrepancies, serially numbered interviewer-administered questionnaires were used. A maximum of two pregnant women were selected in each of the 10 cluster communities in Yemetu community, this selection was based on level of education; women who were at least educated up to the secondary school level, women who had indicated in the questionnaire that they have ever experienced sexual behaviour during pregnancy and observed to be pregnant as well as women who may have no experience of sexual behaviour during pregnancy were considered for the administration of qualitative research instrument.

Qualitative Component

Interviews were conducted in Yoruba the predominant language spoken in Ibadan and English for those who could understand English language. Each respondent was given assurance of confidentiality that her name or anything relating to them that would indicate their identity was not included to gain more insight of their experience. Interview was done in their room or a place that ensured convenience and privacy within the house. Audio recording and note taking was carried out during the interview sessions for those who consented to have a detailed interview.

Interviews were recorded on audiotapes, transcribed and translated into English. Topics covered during the interviews were socio-demographic characteristics of the women, perceived benefits of sexual activity during pregnancy, attitude towards sex during pregnancy and practice of sexual activities during pregnancy.

3.12 Data Management and Analysis

Quantitative Component

For the purpose of reference and to avoid discrepancies, serially numbered interviewer-administered questionnaires were used for entry and recall. A coding guide was developed along with the data collection tool in order to facilitate its analysis. Questionnaires were reviewed to ensure consistency and completeness. Data cleaning and quality assurance was done. Using the coding guide, the data collected was carefully entered into the statistical software (SPSS version 20) and analyzed using descriptive statistics and chi square. The results obtained from the SPSS were summarized and presented in tables and charts. Simple percentages and mean were used to summarize variables such as socio-demographics. Chi square was used for testing associations between dependent and independent variables, $p<0.05$ were considered significant;

Respondents' knowledge of sexual behaviour was measured on an 11 point knowledge scale. Knowledge Score (KS) of ≤5.5 was rated as poor knowledge, KS of >5.5≤ 8 was considered fair and KS ≥9 was rated as good knowledge this was done by allotting one (1) point to any correct answer and zero (0) point for any incorrect answer. A 17 point scale was used to measure the attitude towards sexual behaviour where a score ≤10 represented a negative attitude and a score >10 rated as positive attitude towards sexual behaviour by allotting one (1) point to any correct answer and zero (0) point for any incorrect answer.

Questions to examine the extent and frequencies of practice of sexual behaviours during pregnancy were reported in percentage. To identify major source of information on sexual behaviour, a 15 statement questions was used and reported in percentage to identify the major source of information available to women.

Chi square test, Fishers exact test and regression analysis were conducted to investigate the relationship between socio-demographic variables and knowledge of sexual behaviour, relationship between attitude and knowledge of sexual behaviour and association between sexual activities and attitude and also association between sexual activities and pregnancy status among of reproductive age.

Qualitative Component

The completed questionnaire were quickly reviewed to identify those that were observed to be pregnant for an In-depth interview, this was done purposively. The in-depth interview data were subjected to thematic analysis. Themes were created in line with responses in IDI guide for analysis and report writing. Audio recordings were transferred to the computer system for better audio presentation. The voice notes were played repeatedly to ensure that each respondent's opinion was clearly heard for translation, transcription and documentation.

3.13 Ethical Considerations

Ethical approval was obtained from the Oyo state ethical committee, Ministry of Health, Oyo State before data collection. (See appendix III)

Careful explanation of purpose, content and implications of the study was provided and informed consent obtained from each respondent before data collection. Participants were fully assured of the confidentiality of data during and after the collection of data. Participants were informed that participation is voluntary and they will not suffer any consequences if they chose not to participate

a. Confidentiality of data

Serial numbers and not names of participants were used to maintain confidentiality. The respondents were assured that their responses will be kept confidential and the questionnaires kept safe in a locked cupboard. Information on the system was password-protected and accessible to members of the research team only.

b. Beneficence to Participants

The study will have long term benefits on reproductive age women. This is because the findings will be forwarded to relevant stake-holders in reproductive and sexual health and will provide useful information for developing relevant programmes such appropriate health education and counselling strategies for women.

c. Non-maleficence (non-harmful) to Participants

The study is non-invasive and will not physically harm the participants.

d. Right of decline/withdrawal from the study without loss of benefits

The participants will be assured that they are free to decide not to participate, can choose to discontinue at any point during the process of the interview and that they will not suffer any consequences if they chose not to participate.

3.14 Limitation(s) of the Study

Due to the sensitivity of the subject of investigation, some respondents may have given normative response during data collection. This was however minimized by assuring the respondents of actions that will be taken to ensure confidentiality.

CHAPTER FOUR

RESULTS

4.1 Socio-demographic characteristics

The summary of the profile of the respondent is presented in table 4.1a and b respectively. The ages of the respondent range from 18 years to 46 years with a mean of 32.1±7.7 Majority of the respondents (41.8%) were between 26-35 years. Majority (62.0%) had a highest level of education at the secondary level and were Christians (60.9%). The Yoruba's constituted the majority of the respondents (75.9%) with majority married(93.0%) and their partners having no other wives except them (85.7%) and (54.5%) having 2-3 children. The respondents: (60.9%) had been pregnant within the last year and (29.1%) currently pregnant as at the time of data collection, with the majority (29.1%) of those pregnant in their second trimester (18.8%). Similarly, 47.8% of the women were engaged in various businesses and trades while 30.1% were mainly artisans. Majority (99.0%) had received a form of education on sexual activity during pregnancy in the healthcare centre (89.2%).

Table 4.1a Socio-demographic variables n=300

Socio-demographic variable	Frequency	Percentage
Level of Education		
Primary	15	5.0
Secondary	186	62.0
Tertiary	97	32.3
None	2	7.0
Age at last birthday		
16-25	68	22.6
26-35	126	42.0
36-45	91	30.4
46-55	15	5.0
Religion		
Christianity	182	60.7
Islam	115	38.3
Traditional	3	1.0
Ethnic Group		
Yoruba	227	75.7
Hausa	15	5.0
Igbo	34	11.3
Marital status		
Single	7	2.3
Married	279	93.0
Divorced	9	3.0
Widowed	5	1.7

Table 4.1b Socio-demographic variables contd

Socio-demographic variable	Frequency	percentage
Number of other wives n=299		
One wife	252	84.7
Two wives	37	12.3
≥ two wives	5	1.7
Number of children		
≤1	94	31.4
2-3	164	54.6
≥4-5	42	14.0
Occupation		
Professional	25	8.3
Artisan	90	30.0
Teachers	34	11.3
Housewives	8	2.7
Others *	143	47.8
Pregnancy status within the last year n=297		
Yes	181	60.7
No	118	39.3
Current pregnancy status		
Yes	87	29.0
No	213	71.0
Age of pregnancy(months) n=87		
≤3	15	17.2
4-6	57	65.5
≥7	15	17.2
Ever received any form of education on sexual activities during pregnancy		
Yes	291	99.0
No	3	1.0
Where education was received		
Hospital	264	89.2
Church	13	4.3
Others **	19	6.3

**Occupation others; Business (75), trading (68)*

***Others education received; friends (4), relatives (15)*

4.2 Knowledge of Benefits of Sexual Behaviours during Pregnancy

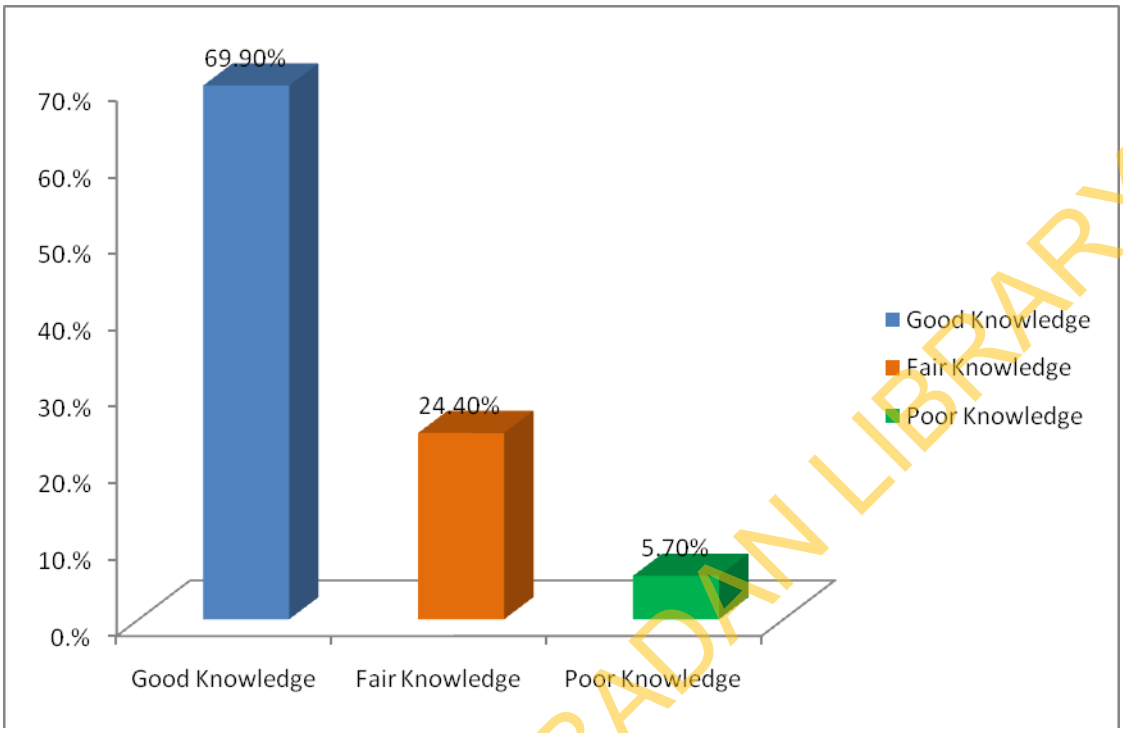
In determining respondents knowledge of the possible consequences of the practice of sexual activity during pregnancy, (99.7%) agreed that having sexual activity during pregnancy aids easy delivery, increases closeness among couple (91.6%) and subsequently increasing the chances of producing a healthy baby (97.7%). Similarly, 69.6% disagreed that sexual activity during pregnancy does not lead to miscarriage or preterm delivery (72.3%), also, 72.6% equally disagreed that sexual activity leads to vaginal bleeding, 58.8 disagreed that sexual activity will produce black spots on the baby's skin.

On the benefits of sexual activity during pregnancy to the mother, 81.1% alleged that sexual activity during pregnancy is a form of exercise that widens the vagina (97.0%) to aid easy delivery (98.3%) during child birth. 80.7% also agreed that sexual activity during pregnancy relieves emotional tension for couples (Table 4.2). Knowledge on sexual activity during pregnancy presented in fig. 4.1 indicates that 69.9% had good knowledge, 24.4% had fair knowledge and 5.7% had poor knowledge on the consequences and benefits of sexual activity during pregnancy.

Table 4.2 knowledge on sexual behaviour during pregnancy n=296

Knowledge statement	True n(%)	False n(%)	Not sure n(%)
possible consequences of engaging in sexual activities during pregnancy;			
easy delivery	295(99.7)*	1(0.3)	0(0)
Healthy baby	293(97.7)*	1(0.3)	2(0.7)
Closeness among couple	271(91.6)*	7(2.4)	18(6.1)
Miscarriage	2(0.7)	206(69.6)*	88(29.7)
Preterm delivery	2(0.7)	214(72.3)*	80(27.0)
Vaginal bleeding	2(0.7)	215(72.6)*	79(26.7)
Black spots	17(5.7)	174(58.8)*	105(35.5)
Perceived benefits of sexual activity to the mother			
Aids easy delivery	291(98.3)*	3(1.0)	2(0.7)
Widens the vagina	287(97.0)*	2(0.7)	7(2.3)
Relieves emotional tension	239(80.7)*	18(6.1)	39(13.2)
Physical fitness	240(81.1)*	21(7.1)	35(11.7)

**correct answers*



Mean score; 9.26±2.03

Figure 4.1: Level of knowledge on sexual behaviour during pregnancy

4.3 Sources of information on Sexual Behaviours during Pregnancy

In exploring the guidelines for sexual activities and beliefs about whether key people approve or disapprove of sexual behavior as a motivation for sexual activities during pregnancy, 53.4% agreed to finding out from the internet that sexual activity during pregnancy is beneficial, also from radio programs (58.8%), television (27.4%), 59.8% reported finding out from friends while 91.9% which is the majority reported been educated on sexual activity during pregnancy at the antenatal clinic visits. Similarly, 16.2% attested to reading from books, pregnancy manuals (65.5%) and newspapers (16.2%).

On the other hand, 70.3% had discussed sexual activity during pregnancy with postpartum women, 67.2% discussed with their mother in-laws while 52.0% had heard from female relatives and 60.5% from sisters as well and their husbands (60.1%). It was also recorded that respondents had also received information on sexual activity during pregnancy from their teachers (16.6%), classmates (15.2%), and physicians (29.7%). This is represented on table 4.3

Table 4.3 Sources of Information on sexual behaviour during pregnancy

Sources of information	Frequency	Percentage
Internet	158	53.4
Friends	177	59.8
Health facility	272	91.9
Books	48	16.2
Newspaper	48	16.2
Discussion with postpartum women	208	70.3
Radio	174	58.8
Pregnancy manual	194	65.5
Female relatives	154	52.0
Mother in-law	199	67.2
Sisters	179	60.5
Teachers	49	16.6
Classmates	45	15.2
Physicians	88	29.7
Television	81	27.4
Husband	178	60.1

4.4 Attitude of women towards Sexual Behaviours during Pregnancy

In determining the attitude of women of reproductive age towards the practice of sexual activities during pregnancy, 98.0% affirmed that having sexual intercourse while pregnant is good and are of the opinion that sex should be allowed anytime during pregnancy (92.0%), agreeing with the opinion that sex during pregnancy is safe (94.3%) and gratifying (97.7%) and 96.7% will have sex while pregnant for the health of the baby. This is represented in table 4.4a, b and c respectively and the attitudinal evaluation of women during pregnancy represented in fig. 4.2

Table 4.4a Attitude towards sexual activities during pregnancy, n=300

Statements	Agree (%)	Undecided (%)	Disagree (%)
I think having sexual intercourse while I am pregnant is good	293(98.0)*	0(0)	6(2.0)
I am of the opinion that sex should be allowed during pregnancy only occasionally	287(96.0)	0(0)	12(4.0)*
I will have sex with my partner while pregnant so that my baby can be healthy	289(96.7)*	9(3.0)	0(0)
I agree to the fact that sexual intercourse should not be allowed during the first 3 month of pregnancy	145(48.5)	107(35.8)	47(15.7)*
Sex should be allowed only during the last month of pregnancy	116(38.8)	99(33.1)	84(28.1)*
Sex should be allowed any time during pregnancy	276(92.0)*	13(4.3)	11(3.7)
If I have sex while i am pregnant, I will Have abortion	8(2.7)	70(23.3)	222(74.0)*
I think having sex while pregnant leads to pre-mature labour	2(0.7)	57(19.0)	241(80.3)*
The baby can feel us when we have sex	28(9.3)	175(58.3)	97(32.3)*
I am of the opinion that sex during pregnancy is safe	283(94.3)*	8(2.7)	9(3.0)

***positive responses**

4.4b Table Attitude towards sexual activities during pregnancy

Statement	Agree (%)	Undecided (%)	Disagree (%)
My baby will get infected if I have sex while pregnant	3(1.0)	78(26.0)	219(73.0)*
I have sexual intercourse during pregnancy because it is gratifying	293(97.7)*	5(1.7)	2(0.7)
I only engage in sexual activity during pregnancy to satisfy my own desire	18(6.0)	85(28.3)	197(65.7)*
Sex during pregnancy will bring me and my spouse closer	273(91.0)*	12(4.0)	15(5.0)
I do not allow my husband come close to me during pregnancy	77(25.7)	50(16.7)	173(57.7)*
Sexual activity during pregnancy is a form of exercise	239(79.7)*	23(7.7)	38(12.7)
Having sex when i am pregnant is not necessary	17(5.7)	76(25.3)	207(69.0)*

positive responses

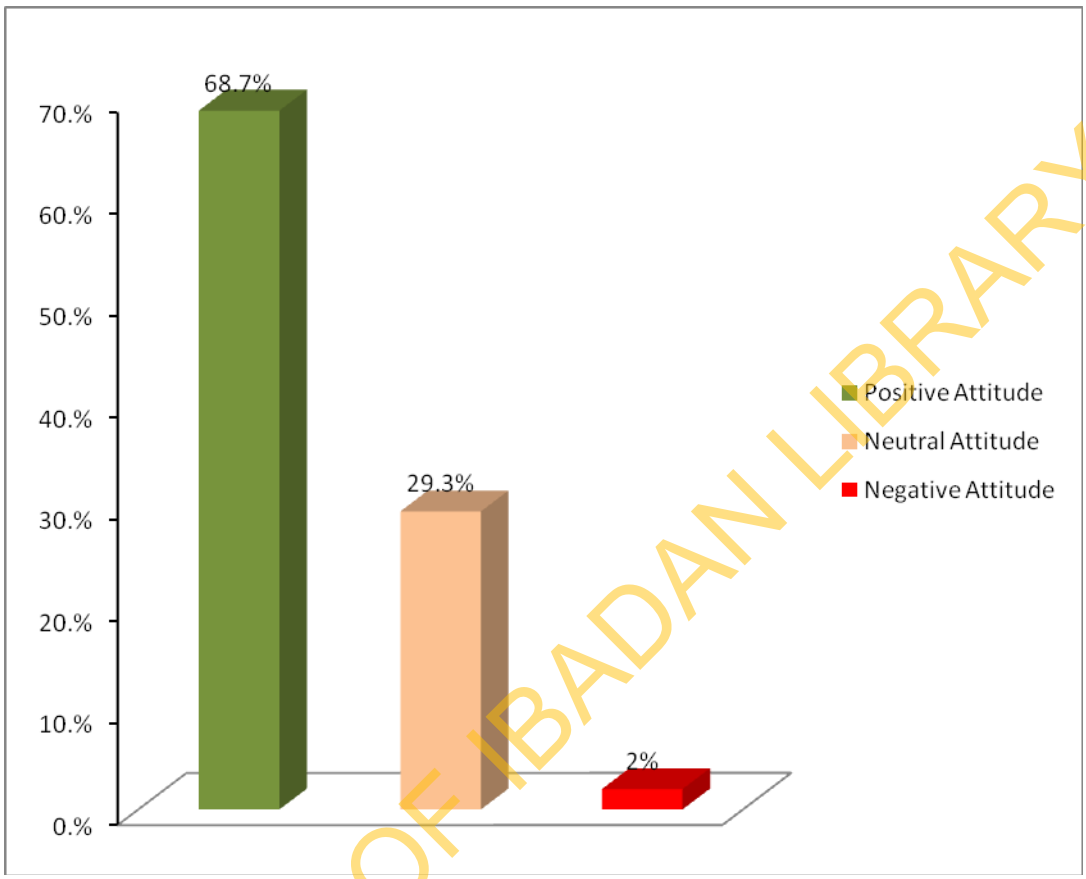


Fig 4.2 Attitudinal evaluation of sexual activity during pregnancy

4.5 Sexual Activities during Pregnancy

In determining the practice of sexual activity during pregnancy, 95.7% of respondents had engaged in sexual activity during their last pregnancy with the majority predominantly engaging in sexual intercourse (98.3%), 38.5% kissing, 34.4% fondling and 15.1% masturbating for sexual satisfaction. About 91.5% of the respondents were noted to engage in healthy practice of sexual activity. 50.0% of the respondents have engaged their healthcare providers in discussion concerning sexual activity during pregnancy. The frequency of this is represented in Table 4.5.

Table 4.5 Practice of sexual activity during pregnancy

Practice of sex during pregnancy	Frequency	Percentage
Undertook sexual activity during last pregnancy	287	95.7
Never undertook sexual activity during last pregnancy	13	4.3
Type of sexual activity engaged in*		
Kissing	112	38.5
Fondling	100	34.4
Masturbation	44	15.1
Sexual intercourse	286	98.3
Discussion of sexual activity with healthcare providers	150	50.0

***multiple response**

4.6 Frequency and reasons for Sexual Activities during Current Pregnancy

A total of 87 (%) of the women were pregnant during the time of data collection. These women were involved in sexual intercourse at least once a week (69.0%) with 60.9 pregnant respondents having sexual intercourse at 2-3 times a month and 20.7% having sexual intercourse 2-3 times in a week. The respondents, (3.4%) were recorded to be experiencing sexual activity 4-7 times in a week while 10.3% reported having sexual intercourse at most once a month. Majority of the respondents preferred to engage in sexual intercourse during pregnancy at the second trimester (86.2%) while 21.8% preferred to have intercourse during the third trimester and 18.4% during the first trimester of pregnancy. However, 69.8% change in sexual activity was recorded with a reduction in sexual activity during the first trimester (25.3%) and a recorded increase in sexual activity during the second-third trimester (55.4%) with a further drop in sexual activity at the birth week (25.3%).

The reasons reported for the change in sexual activity during pregnancy was the fear of harming the baby (60.5%), reduction in sexual desire (60.5%), feeling less attractive as pregnancy progresses (44.4%) and subsequently feeling less desire from their partner (42.7%), while 37.0% recorded difficulty in lubrication. On the contrary, (38.3%) however recorded an increase in sexual desire as pregnancy progressed. Majority (91.1%) of respondents having good control on sexual activity during pregnancy. The summary of this is represented in table 4.6.

Table 4.6 Frequency and reasons for sexual activities during current pregnancy n=87

Sexual frequency	Frequency	Percentage
Periods of sex during pregnancy*		
At most once a month	9	10.3
2-3 times a month	53	60.9
At least once a week	60	69.0
2-3 times a week	18	20.7
4-7 times a week	3	3.4
Preferred trimester to engage in sexual intercourse during pregnancy		
First trimester	16	18.4
Second trimester	75	86.2
Third trimester	19	21.8
change in sexual activity as pregnancy progresses	60	69.8
Decrease in sexual activity within first–second trimester	21	25.3
Increase in sexual activity within first-second trimester	9	10.3
Increase in sexual activity within second–third trimester	46	55.4
Decrease in sexual activity within second-third trimester	15	17.2
Decrease in sexual activity during birth week	21	25.3
Increase in sexual activity during birth week	8	9.2
Reasons for change in sexual activity		
Fear of harming the baby	49	60.5
Reduction in sexual desire	49	60.5
Feeling less desire from partner	35	42.7
Feeling less attractive	36	44.4
Increase in sexual desire	31	38.3
Difficulty in lubrication	30	37.0

**multiple response*

Vaginal intercourse was considered as the predominant mode of sexual behaviour (100%) followed by kissing (38.5%), fondling (34.4%) and mutual masturbation (15.1%). Other sexual behaviours assessed in this study were anal sex (0%) and oral sex (8.0%) (Fig 4.3)

Low frequencies of sexual activity during pregnancy were recorded among women who reported feeling no sexual desire for their partner while pregnant (41.7%) and discomfort (25.0%). Most of the respondents who had no sexual activity during their pregnancy reported that their partner was not available (33.3) while 8.3% conformed that they had gotten pregnant out of wedlock and so were staying alone (Fig 4.4).

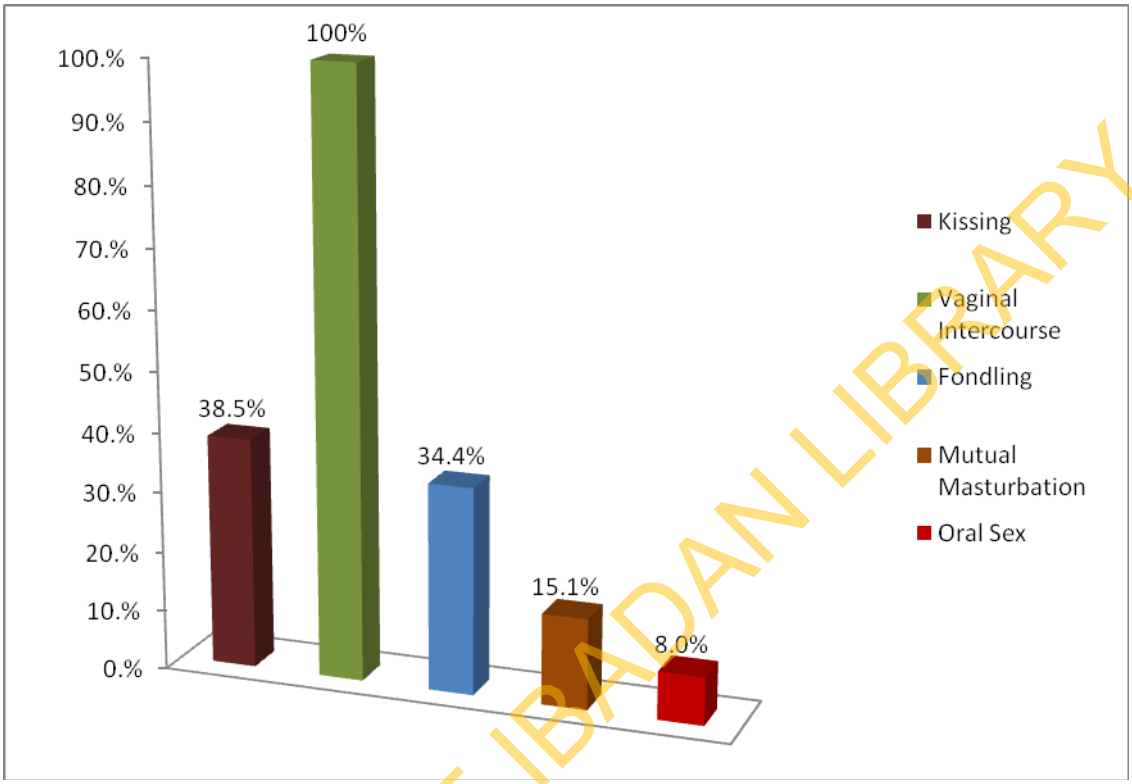


Fig 4.3 Predominant sexual practices

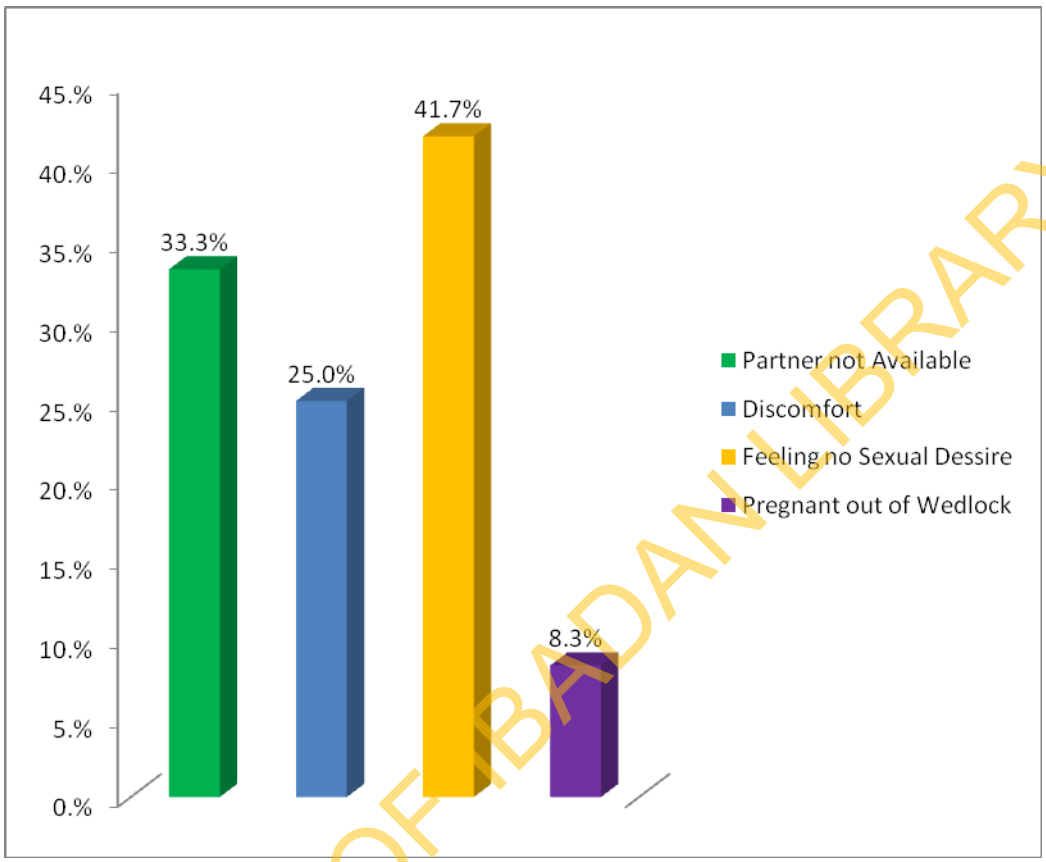


Fig 4.4 Respondents reasons for not having sexual activity during pregnancy

4.7 Test of Hypothesis

Test of Hypothesis 1

There is no significant association in the knowledge of sexual behaviours during pregnancy across the socio demographic characteristics such as level of education, Age, Marital Status and occupation of women of reproductive age in Yemetu

From the study, there is a statistically significant association between respondents' level of education and level of knowledge on sexual behaviour during pregnancy as $p<0.05$ that is, the level of education determines the level of knowledge of sexual behaviour during pregnancy. This is shown in table 4.7

Test of Hypothesis 2

There is no significant association between practices of sexual activity and socio-demographic characteristics.

The study has noted a statistically significant association between sexual activity and marital status; women who are married and living with their spouses are more likely to engage in sexual activities during pregnancy compared to women who are not married. This is shown in table 4.8

Test of Hypotheses 3

There is no significant association between level of knowledge and the source of information on sexual activities during pregnancy.

Findings from the study suggests that there is a significant association between the level of knowledge of women of reproductive age and the source of knowledge such as the internet, sisters, mother in law, female relatives, pregnancy manuals, having a discussion on sexual issues with postpartum women, educational instructors such as teachers, classmates, health physicians. These sources of knowledge have a significant influence on the women's level of knowledge as shown in tables 4.9a, b and c respectively.

Test of Hypothesis 4

There is no significant association between level of knowledge and practice of sexual behaviour during pregnancy among women of reproductive age Yemetu, Ibadan

From the study, there was no statistically significant association between level of knowledge of respondents and the practice of sexual behaviour as $p>0.05$. This is presented in table 4.10

Test of Hypothesis 5

There is no significant association between the practice of sexual activities during pregnancy and pregnancy status.

From study, there is a significant association between sexual activity and pregnancy status as $p<0.05$ as shown in table 4.11

Test of Hypotheses 6

There is no significant association between level of knowledge and respondents attitude towards sexual activity during pregnancy.

From table 4.12, there is a strong significant association between level of knowledge and respondents attitude towards sexual activity during pregnancy. The more informed and educated they are, the more positive their attitude towards sexual activity

Test of Hypothesis 7

There is no significant relationship between attitude of respondents and sexual activity.

From the study, there is a significant relationship between attitude of respondents and sexual activity, $p<0.05$ as seen in table 4.13. This implies that sexual activity of respondents is influenced by their attitude towards sex during pregnancy.

Table 4.7 Association between level of knowledge and socio-demographic factors

Variables	Level of knowledge of sexual behaviour during pregnancy						
	Poor (%)	Fair (%)	Good (%)	Total (%)	X^2	df	p value
Level of education					18.11	6	0.003*
Primary	4(26.7)	7(46.7)	4(26.7)	15(5.0)			
Secondary	7(3.8)	41(22.2)	137(74.1)	185(61.9)			
Tertiary	6(6.2)	25(25.8)	66(68.0)	97(32.4)			
No education	0(0)	0(0)	2(100)	2(0.7)			
Total	**17(5.7)**	**73(24.4)**	**209(69.9)**	**299(100)**			
Age					6.25	6	0.396
16-25	5(7.4)	14(20.6)	49(72.1)	68(22.7)			
26-35	8(6.4)	38(30.4)	79(63.2)	125(41.8)			
36-45	4(4.4)	18(19.8)	69(75.8)	91(30.4)			
46-55	0(0)	3(20.0)	12(80.0)	15(5.0)			
Total	**17(5.7)**	**73(24.4)**	**209(69.9)**	**299(100)**			
Marital status					8.98	6	0.175
Single	2(28.6)	1(14.3)	4(57.4)	7(2.3)			
Married	14(5.1)	67(24.1)	196(70.8)	277(93.0)			
Divorced	1(11.1)	3(33.3)	5(55.6)	9(3.0)			
Widowed	0(0)	2(40.0)	3(60.0)	5(1.7)			
Total	**17(5.7)**	**73(24.4)**	**208(69.9)**	**298(100)**			
Occupation					13.66	8	0.085
Professional; Nurses, Lab Tech, Chemist	2(80.0)	9(36.0)	14(56.0)	25(8.4)			
Artisan(Tailoring, Hair Dressing, Make Up	9(10.0)	21(23.3)	60(66.7)	90(39.2)			
Civil Servant; Teachers	3(8.8)	9(26.5)	22(64.7)	34(11.4)			
Business, Trading	2(1.4)	32(22.4)	109(76.2)	143(48.0)			
Housewife	1(16.7)	2(33.3)	3(50.0)	6(1.7)			
Total	**17(5.7)**	**73(24.4)**	**208(69.9)**	**298(100)**			

***Fishers Exact test**

Table 4.8; Association between sexual activity and socio-demographic characteristics

Variables	Level of sexual Activities during Pregnancy					
	Healthy (%)	**Unhealthy (%)**	**Total (%)**	**X^2**	**df**	**p value**
Level of education				7.325	3	0.062
Primary	12(80.0)	3(20.0)	15(5.1)			
Secondary	169(92.3)	14(7.7)	183(62.0)			
Tertiary	88(92.6)	7(7.4)	95(32.2)			
No education	1(50.0)	1(50.0)	2(0.7)			
Total	**270(91.5)**	**25(8.5)**	**295(100)**			
Age				7.64	3	0.050
16-25	65(98.5)	1(1.5)	66(22.4)			
26-35	108(88.5)	14(11.5)	122(41.5)			
36-45	81(89.0)	10(11.0)	91(31.0)			
46-55	15(1.0)	0	15(5.1)			
Total	**269(91.5)**	**25(8.5)**	**294(100)**			
Marital status				12.48	3	0.006*
Single	4(57.1)	3(42.8)	7(2.4)			
Married	251(92.3)	21(7.7)	272(92.8)			
Divorced	9(1.0)	0	9(3.1)			
Widowed	4(80.0)	1(20.0)	5(1.7)			
Total	**268(91.5)**	**25(8.5)**	**293(100)**			
Occupation				9.48	4	0.050
Professional; (Nurses, Lab Tech, Chemist)	25(1.0)	0(0)	25(8.5)			
Artisan(Tailoring, Hair	79(91.9)	7(8.1)	86(29.3)			
Dressing, Make Up)	27(79.4)	7(20.6)	34(11.6)			
Teachers	131(92.3)	11)7.7)	142(48.3)			
Business, Trading	7(1.0)	0(0)	7(2.4)			
Housewife						
Total	**269(91.5)**	**25(8.5)**	**294(100)**			

***significant**

Table 4.9a; Association between level of knowledge and source of information

Source of knowledge	Level of knowledge of sexual behaviour during pregnancy						
	Poor (%)	Fair (%)	Good (%)	Total (%)	X^2	df	p value
Internet					11.707	2	0.003*
Yes	4(2.5)	31(19.6)	123(77.8)	158(53.4)			
No	12(8.7)	42(30.4)	84(60.9)	138(46.6)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Friends					13.20	2	0.001*
Yes	5(2.8)	35(19.8)	137(77.4)	177(59.8)			
No	11(9.2)	38(31.9)	70(58.8)	119(40.2)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Health centre							
Yes	15(5.5)	68(25.0)	189(69.5)	272(91.9)			
No	1(4.1)	5(20.8)	18(75.0)	24(8.1)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Books					**1.93**	**2**	**0.381**
Yes	1(2.1)	10(20.8)	37(77.1)	48(16.2)			
No	15(6.0)	63(25.4)	170(68.5)	248(83.8)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
News paper					**2.27**	**2**	**0.322**
Yes	1(2.1)	15(31.3)	32(66.7)	48(16.2)			
No	15(6.0)	58(23.4)	175(70.6)	248(83.8)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Discussion with postpartum women					**15.353**	**2**	**0.000***
Yes	6(2.9)	44(21.2)	158(76.0)	208(70.3)			
No	10(11.4)	29(33.0)	49(55.7)	88(29.7)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			

*Significant

Table 4.9b Sexual activity and sources of information contd

Source of knowledge	Level of knowledge of sexual behaviour during pregnancy						
	Poor (%)	Fair (%)	Good (%)	Total (%)	X^2	df	p value
Radio					5.36	2	0.069
Yes	5(2.9)	45(25.9)	124(71.3)	174(58.8)			
No	11(9.0)	28(23.0)	83(68.0)	122(41.2)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Pregnancy Manuals					27.81	2	0.000*
Yes	3(1.5)	38(19.6)	153(78.9)	194(65.5)			
No	13(12.7)	35(34.3)	54(52.9)	102(34.5)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Female relatives					9.83	2	0.007*
Yes	4(2.6)	31(20.1)	119(77.3)	154(52.0)			
No	12(8.5)	42(29.6)	88(62.0)	142(48.0)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Mother in-law					**14.77**	**2**	**0.001***
Yes	5(2.5)	43(21.6)	151(75.9)	199(67.2)			
No	11(3.7)	30(30.9)	56(18.9)	97(32.8)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Sisters					**11.47**	**2**	**0.003***
Yes	5(2.8)	37(20.7)	137(76.5)	179(60.5)			
No	11(9.4)	36(30.8)	70(59.8)	117(39.5)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Teachers					**6.62**	**2**	**0.037***
Yes	3(6.1)	5(10.2)	41(83.7)	49(16.6)			
No	13(5.3)	68(27.5)	166(67.2)	247(83.4)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			

*Significant

Table 4.9c; Association between level of knowledge and source of information

Source of knowledge	Level of knowledge of sexual behaviour during pregnancy						
	Poor (%)	Fair (%)	Good (%)	Total (%)	X^2	df	p value
Classmates					6.62	2	0.001*
Yes	1(2.2)	2(4.4)	42(93.3)	45(15.2)			
No	15(6.0)	71(28.3)	165(65.7)	251(84.8)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Physicians					9.70	2	0.008*
Yes	1(1.1)	15(17.0)	72(81.8)	88(29.7)			
No	15(7.2)	58(27.9)	135(64.9)	208(70.2)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Television					3.32	2	0.190
Yes	4(4.9)	26(32.1)	51(63.0)	81(27.4)			
No	12(5.6)	47(21.9)	156(72.6)	215(72.6)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			
Husband					**3.67**	**2**	**0.160**
Yes	6(3.4)	44(24.7)	128(71.9)	178(60.1)			
No	10(8.5)	29(24.6)	79(67.0)	118(39.9)			
Total	**16(5.4)**	**73(24.7)**	**207(69.9)**	**296(100)**			

**significant*

Table 4.10. Association between practice of sexual activity and level of knowledge

		Practice of sexual activities during pregnancy		
		Unhealthy (%)	**Healthy (%)**	**Total (%)**
level of knowledge of Respondents	**Poor**	4(23.5)	13(76.5)	17(5.8)
	Fair	6(8.2)	67(91.8)	73(24.8)
	Good	15(7.4)	189(92.6)	204(69.4)
	Total	**25(8.5)**	**269(91.5)**	**294(100)**

X^2 = 5.288, df= 2, p value = 0.071

Table 4.11 Association between sexual activity and pregnancy status

		Sexual activity		
		Unhealthy n(%)	**Healthy n(%)**	**Total (%)**
Current Pregnancy Status	**Yes**	2(2.3)	85(97.7)	87(29.6)
	No	24(11.5)	184(88.5)	208(70.4)
	Total	**26(8.8)**	**268(91.2)**	**294(100)**

X^2 = 8.302, df= 1, p value = 0.004

Table 4.12; Association between level of knowledge and attitude of respondents towards sexual behaviour

	Attitude			
	Negative%	**Neutral%**	**positive%**	**Total**
Level of Knowledge of sexual behaviour during pregnancy				
Poor	2(11.8)	2(11.8)	13(76.5)	17(5.7)
Fair	3(4.1)	9(12.3)	61(83.6)	73(24.4)
Good	1(0.5)	49(23.4)	159(76.1)	209(69.9)
Total	**6(2.0)**	**60(20.1)**	**233(77.9)**	**299(100)**

X^2 = 13.830, df= 4, p value = 0.005*

***Fishers Exact test**

.

Table 4.13: Association between attitude and practice of sexual activity of respondents

	Practice of Sexual Activity		
	Unhealthy (%)	**Healthy (%)**	**Total (%)**
Attitude			
Negative	4(66.7)	2(33.3)	6(2.0)
Neutral	6(6.9)	81(93.1)	87(29.5)
Positive	15(7.4)	187(92.6)	202(68.5)
Total	**25(8.5)**	**270(91.5)**	**295(100)**

X^2 = 26.761, df= 2, p value = 0.000

4.8 Logistic Regression Analysis

Education was noted to have significant effect on knowledge about sexual behaviour, participants with secondary education were about 3.3 times more likely to have fair knowledge compared to those without formal education (OR = 3.298, P= 0.025). Also participants that got information through pregnancy manuals were 3.9 times more likely to have fair knowledge on sexual activities more than respondents that did not read pregnancy manuals (OR = 3.85, P= 0.015). Similarly, respondents that acquired information through female relatives were 1.8 times more likely to have fair knowledge on sexual behaviour (OR = 1.83, P= 0.049). Respondents who obtained information through teachers were 7.4 (1/0.135) times less likely to have fair knowledge about sex compared to those that did not received information from teachers. This indicated that participants that acquired information through teachers were 7.4 times more likely to have poor knowledge about sexual activities compared to those that did not received information through teachers (OR = 0.135, P= 0.035).

In the same vein, participants with secondary education were about 5.1 times more likely to have good knowledge compared to those without formal education (OR = 5.093, P= 0.002). Also participants that got information through pregnancy manuals were 5.8 times more likely to have good knowledge about sexual activities more than respondent that did not read pregnancy manuals (OR = 5.833, P= 0.015). Respondent who obtained information through teachers were 4.4 (1/0.228) times less likely to have good knowledge about sexual activities compared to those that did not received information from teachers. This indicated that participants that acquired information through teacher were 4.4 times more likely to have poor knowledge about sex compared to those that did not received information through teachers (OR = 0. 0.228, P= 0.012).

Table 4.14 Effect of socio-demographic factors on Level of knowledge

Level of Knowledge	Factors	Odd ratio	95% CI for Odds Ratio		p-value
			Lower	Upper	
Fair	**Education**				
	Primary	1.576	0.425	5.843	0.496
	Secondary	3.298	1.162	9.357	0.025*
	Tertiary	2.385	0.657	8.667	0.187
	no education (reference)	1.000	1.000	1.000	
	Source of knowledge				
	Internet	1.135	0.243	5.307	0.873
	Friends	0.860	0.195	3.792	0.842
	Discussion with postpartum women	1.300	0.316	5.345	0.716
	pregnancy manual	3.850	1.608	24.376	0.015*
	female relatives	1.835	1.324	10.387	0.049*
	Sisters	1.025	0.225	4.676	0.975
	Teachers	0.135	0.018	0.040	0.035*
	Classmates	0.337	0.018	6.401	0.469
	Physicians	2.343	0.210	26.147	0.489
Good	**Education**				
	Primary	0.763	0.174	3.355	0.721
	Secondary	5.093	1.864	13.915	0.002*
	Tertiary	2.405	0.683	8.465	0.172
	no education				
	Source of knowledge				
	Internet	1.232	0.281	5.405	0.782
	Friends	1.036	0.249	4.318	0.9361
	Discussion With Postpartum Women	1.704	0.436	6.669	0.444
	Pregnancy Manual	5.833	0.996	34.148	0.004*
	Female Relatives	1.781	0.329	9.638	0.503
	Sister	0.972	0.223	4.244	0.970
	Teachers	0.228	0.034	1.513	0.012*
	Classmates	1.803	0.135	24.024	0.655
	Physicians	2.590	.246	27.216	0.428

Poor is reference category. * significant

Respondents with positive attitude towards sex were 0.68 times more likely to have healthy sexual practice than those that with negative attitude (OR = 0.678, P= 0.045). Single participants in this study were 3.2 (1/0.316) times less likely to have healthy sexual practice than widows (OR = 0.316, P = 0.002). Married respondents were 2.7 times more likely to have healthy sexual practice compared to widows (OR = 2.72, P = 0.037). The practice of sexual activity among divorced and widowed participants was not significantly different (Table 4.15).

Participants in age group 16-25 years were 13.2 (1/0.076) times less likely to be pregnant compared to participants in age group 46-55 years (OR = 0.076, P= 0.002). Participants with healthy sexual practice were 7.4 times less likely to be pregnant compared to those that had an unhealthy practice of sexual activity (OR= 0.136, P= 0.006). this has been represented on table 4.16

Table 4.15 Effect of Associated factors on sexual activity

Factors	Odd ratio	95% CI for Odds Ratio		p-value
		Lower	Upper	
Marital status				
Single	0.316	0.022	0.552	0.002*
Married	2.720	1.285	25.966	0.037*
Divorced	5.177	0.000	34.544.	0.385
Widowed (reference)	1.000	1.000	1.000	
Attitude towards sex				
Positive	0.678	0.247	0.864	0.045*
Negative (reference)	1.000	1.000	1.000	

***significant**

Table 4.16: Effect of Associated factors on pregnant status

Factors	Odd ratio	95% CI for Odds Ratio		p-value
		Lower	Upper	
Occupation				
Professional; Nurses, Lab Tech, Chemist	0.103	0.009	1.193	0.069
Artisan(Tailoring, Hair Dressing, Make Up	0.418	0.041	4.240	0.461
Civil Servant; Teachers	0.272	0.024	3.115	0.295
Business, Trading	0.263	0.026	2.690	0.260
Housewife (Ref)				
Age				
16-25	0.076	0.015	0.395	0.002*
26-35	0.338	0.070	1.631	0.177
36-45	0.797	0.158	4.036	0.784
46-55(Ref)				
Practice of sexual activity				
Healthy	0.136	0.017	1.052	0.006*
Unhealthy reference)				

***-significant**

4.9 Findings from the in-depth interview among women who were currently pregnant at the time of study.

A total of ten (10) in-depth interviews were conducted among consenting participants. The participants were within the ages of 20 and 30. The profile of in-depth interview participants is presented on table 4.19. Seven were artisans, and three were traders. For majority of the respondents, discussing about sexual activities during pregnancy with their mother –in-law, friends, husband and also encouragement from the health facility was the impetus to engage in sexual activity during pregnancy.

Table 4.17 Socio-demographics and practice of sexual activity during pregnancy from In-depth interview

Respondent	Age	Number of children	Age of pregnancy	Key behavioural influencer	Frequency of sexual behaviour outcome
Respondent A	26	1	5 months	Mother-in-law	2-3 times a week
Respondent B	22	None	6 months	Health facility	Once a month
Respondent C	22	None	7 months	Health facility	2-3 times a month
Respondent D	30	2	4 months	Friends, health facility, husband	2-3 times a week
Respondent E	21	1	5 months	Health facility	2-3 times a week
Respondent F	29	2	6 months	Friends who have given birth	1 time a week
Respondent G	28	2	6 months	Health personnel, husband	Atleast twice a week
Respondent H	24	1	5 months	Mother in-law, health facility	2-3 times a week
Respondent I	20	None	6 months	Health facility, husband	2 times a week
Respondent J	20	None	7 months	Health facility, friend	2-3 times a month

4.9.1 Benefits of sexual behaviour during pregnancy

The narratives of participants suggest several common themes: First, sexual behaviour is equated majorly to mean vaginal sexual intercourse and aids in easy delivery which is preceded by feeling loved and happiness by the woman. Secondly, it increases marital bond and thirdly it increases the chances of giving birth to a healthy baby. Evidence of each theme is presented below.

Sexual behaviour during pregnancy majorly means vaginal intercourse and aids in easy delivery

Several women reported that engaging regularly in sexual activity during pregnancy especially around the birth week makes delivery easy by opening up the cervix. This is illustrated, for example, in the narration by respondent G (names have been changed for privacy), a 28 year old woman who has had two children and was pregnant with the third, respondent G engages in sexual activity at least twice a week:

My name is respondent G, Yes I have engage in sexual intercourse with my husband, we do sex between husband and wife... that is mostly the normal sex between husband and wife.. we kiss too, we hold ourselves... the normal sex naw.
The benefit of it , sexual intercourse during pregnancy is that it will make the mother give birth safely by opening up the part where the baby comes out(cervix) very well because as the couple are constantly having sex they are exercising in preparing the vagina for delivery when the time comes and the woman will also not be lazy to push
There is great benefit of sex in it for the mother it keeps the body of the child in good condition, it gives the mother peace of mind that she is fulfilling her marital obligations because if the couple are still having husband and wife sex it won't give him the opportunity to look outside to the extent that he will have extra-marital affairs.

A similar narrative by respondent H, a 24 year old woman with one child and pregnant with the second.

Yes me and my husband enjoy sex all the time we majorly have the sex between husband and wife the one using the right way, the vagina type.

Sex is very beneficial during pregnancy, the benefit is that it makes our body come alive with love, makes the cervix widen very well, the fat in the body will come down because it is like you are also doing exercise when having sex you will sweat and also be enjoying our body.

The benefit of sex during pregnancy to the mother is that it makes the body healthy, the body is active and it stretches well, it will help the child to be in a good state, the child's body will form very well it will not be stressed because the mother is happy so the child will also be happy.

Sexual behaviour during pregnancy as an enhancement for marital harmony

Various narratives suggest that sexual activities during pregnancy strengthen marital harmony, insinuating that it prevents their spouses from having extramarital affairs thereby strengthening spousal bond.

The affirmation of respondent F, a 29 year old pregnant mother of two highlighted as thus;

Our culture does not prevent our husband from having sex with us and our religion also supports couples bonding through sex. It is good for a woman to have sex during pregnancy because it will make our body come alive and feel love, our cervix will open very well during delivery and our husbands will not be looking outside let alone have extra-marital affairs.

Pregnancy does not prevent me and my husband from enjoying ourselves anytime we feel like because it is not a disease naw so we do it. It is only when the pregnancy has become very big that I feel uncomfortable. like my first pregnancy was twins so it was very big but we were still enjoying ourselves once in a while

Women should continue to have sex even when pregnant because there is no harm in it and if there is harm they will tell us in the hospital.. so that is my take on it.

The narrative of respondent D, also illustrates that

We can't prevent a man from looking outside because we will not always be there but it is good for us to have sex during pregnancy as it will make our body to come alive with the

feeling of happiness and love. my husband too will be happy and will not feel like he is missing anything and so he will not go and be looking outside for pleasure. So our cervix can open up well when delivering. We have sex when we feel like but sometimes when I am too tired we just play with ourselves and feel happy.

Practice of sexual activity during pregnancy increases the chances of giving birth to a healthy child

Several views from respondents suggest that sexual activity during pregnancy increases the chances of giving birth to a healthy child, speculating that when a mother is happy during pregnancy, chances are that she will give birth to a mentally healthy baby. This is seen in the illustrations below.

Respondent A; *A woman that is pregnant and happy looks good, she will be shining she will be happy with everybody and will not have any problem, you will see that by the time she give birth, her baby will be fine and strong because the mother have giving her optimal strength and peace in the pregnancy because as she is happy she is eating good food, she is not thinking of problems so her baby is also healthy, all my children also have weight gan! Because when i am pregnant I do not allow anything to disturb me at all.*

In another highlight, respondent J, a 20 year old woman who is carrying her first pregnancy narrates thus;

When i go for antenatal they tell us to continue to be with our husband (have sex) and they also say we should eat good food and exercise for the health of the baby and so if the husband and wife are at peace in the house, the child will also grow well because if the mother is worrying, it will affect the child also but if my husband is happy in that aspect it gives the child strength and peace during pregnancy because the mother will be at peace too.

4.9.2 Attitude towards sexual behaviour

On exploring the attitude of respondents towards sexual behaviour during pregnancy, it was deduced that respondents see sexual activity as gratifying and beneficial to their psychological health, thereby having a positive attitude.

There is great benefit in having sex during pregnancy, I enjoy vagina sex between husband and wife and when ever we are chanced, we usually do it because the benefit of sex during pregnancy for the mother is so much, it helps the woman to deliver without complications

Some narrated the various problems associated with engaging in sexual intercourse during pregnancy as inconvenient and uncomfortable mostly at the advanced stage of pregnancy.
There is no problem associated with it but some people say it is not convenient especially when the pregnancy is advancing and becoming big it will become uncomfortable to have.. continue enjoying sex.

Others think culture has a role to play in restricting couples from having sexual intercourse during pregnancy as narrated.
Some cultures do not allow a man come close to his wife when she is pregnant, culture is the cause for some people. For religion, there is no religion that says that couple should not have sex during pregnancy. It is necessary for women to have sex when pregnant

4.9.3 **Practice of sexual activities during pregnancy**

Some of the respondents agreed that they participate often in sexual activity with their partners; practicing vaginal intercourse, however, disorders of sexual functioning such as painful intercourse, lack of vaginal lubrication, vaginal tightness and bleeding after intercourse were experienced as major challenges for couples. Some participants attributed these difficulties to their own health as narrated by some of the respondents;
I enjoy sex very well even as I am pregnant although sometimes I will be very dry and the sex will be painful but my husband is very understanding and he buys one liquid like that that we use to make the place wet so it is easy now.
Some of the women however affirmed that culture and religion does not prevent sexual activity during pregnancy and therefore this should be practiced

CHAPTER FIVE

DISCUSSION, CONCLUSION AND RECOMMENDATION

5.1 Discussion

5.1.1 Socio-demographic profile

This is perhaps the first study on sexual behaviour during pregnancy that has been conducted within a community and not in a hospital setting. The mean age of the respondent was 32.1 years with majority (41.8%) between the ages of 26 and 35 years, this is slightly above Shojaa *et al,*s (2009)Iranian study on sexual activity during pregnancy among a group of Iranian women with a mean age of 22 this could be as a result of the difference in study setting. This may also be due to the fact that the area of study, although an urban slum has a higher percentage of women who are at least educated to the level of secondary education(62%), delaying early marriage and hence extending the child bearing age with 54.5% of respondents in gravid 2-3.

The study group was a heterogeneous one covering a range of reproductive age with the least age been 18 and the highest age been 46. Different ethnic groups with the predominant been Yoruba (75.9%) could be attributed to the location of study area as it is located in the South-western part of Nigeria where the predominant ethnic group is Yoruba (Arowojolu *et al.,* 2002). Majority of the respondents were married (93%), and graduates of secondary school with occupations ranging from professional nurses, laboratory technicians, artisans, civil servants with the predominant occupation being the business of petty trading.

The greater number of the respondents were reported to be the only wife to their partner with a substantial number been multiparous although 31.4% were recorded to be carrying their first pregnancy and in their second trimester with the vast majority receiving education on sexual activity during pregnancy at the hospital, this is rather expected as the study area is located in close proximity with a major state owed public health facility which has been noted to be highly patronised by the residents especially those of low socio-economic status and serves as a referral for many primary healthcare facilities and

private clinics within Ibadan and its environs, making it very accessible to the residents of Yemetu. Other sources of information were mission houses, friends and relatives as noted by this study.

5.1.2 Knowledge of Sexual Behaviour during Pregnancy

The knowledge of Sexual behaviour in this study featured various aspects such as modes/methods of information received on sexual activity during pregnancy, consequences of engaging in sexual activities during pregnancy and the various benefits of sexual activity during pregnancy to the mother. The overall knowledge revealed that majority (69.9%) of the respondents had a good knowledge of Sexual behaviour during pregnancy, this result however disagrees with a study conducted in the Philippines on the sexual behaviour of women recording a level of knowledge below average with a mean score of 11.9 this could be attributed to the available systematic discussions on sexuality during pregnancy as majority of the respondents had their source of information on sexual activities during pregnancy from the antenatal clinic (91.9%) during such visits.

The respondents for this study attributed easy delivery (99.7%) and closeness among couple (91.6%) as the benefits of engaging in sexual activity during pregnancy, this corresponds with similar works of other researchers who in their report stated that sexual intercourse during pregnancy increases the emotional attachment between couple and brings about satisfaction of sexual desires and also prevents spousal infidelity (Paulete *et al.,* 2010). Sex during pregnancy has been reported to release endorphins that reduce stress levels thereby giving a healthy environment to the baby and mother (Fok *et al.,* 2005) as noted in the respondents' report of producing a healthy baby (97.7%) as a possible outcome of sex during pregnancy. Apart from this, sex also has been noted to increase production of oxytocin, a hormone responsible for attachment and love as reported by Bartellass *et al.,* 2000. This stimulates better bonding and intimacy between partners, cementing a strong bond during the pregnancy phase and helping in a complication-free progression of pregnancy and labour (Shojaa *et al.,* 2009).

Other benefits of sexual activities during pregnancy reported in this study include widening of the vagina (97%), relief of sexual tension between couples (80.7%) and sexual intercourse as a form of exercise for physical fitness (81.1%) as blood supply doubles up during pregnancy to meet the requirements of the mother and child. A slow circulation could hinder the process; therefore, an increased blood circulation has been reported to be one of the importance of sex during pregnancy period (Sacomori and Cadaso, 2010). With the release of these hormones, sex restores the adequate supply of oxygen and nutrition to the foetus to aid growth and development. This report corresponds with similar researches of Anzaku *et al.,* (2015) and Atputharajah, (1987).

Similarly, the possible consequences of engaging in sexual intercourse during pregnancy was recorded as miscarriage (69.6%), preterm delivery (72.3%), vaginal bleeding (72.6%) and black spots on baby's skin after birth(58.8%), although these claims remain unproven, they are in line with the works of Gokyildiz and Beji., (2015) who reported that Many women usually experience some vaginal bleeding or spotting after vaginal intercourse, especially during the first trimester of pregnancy, but will nonetheless continue to have a successful pregnancy. They however maintained that medical attention is needed when bleeding continues for several days or is accompanied by clots and abdominal cramping, Speculating that deep penile thrusting may cause bleeding in the later stages of pregnancy. Thereby recommending that prolonged bleeding should be reported to the clinic and also suggesting that Health practitioners should educate couples on the normal aspects of bleeding as well as bleeding requiring medical attention. The level of education of respondents significantly determined their level of knowledge of sexual behaviour during pregnancy as recorded in this study.

5.1.3 Sources of knowledge on Sexual Activity during Pregnancy

The study revealed that 91.9% of respondents receive information on sexual activity during pregnancy at the antenatal clinic during antenatal visits, followed closely by respondents having discussions concerning sexual activity during pregnancy with women who have given birth before (70.3%), the mother in-law (67.2%), sisters (60.5), pregnancy manuals and husband (60.1%) these are the predominant subjective norms that has

influenced the ability to indulge in sexual behaviour during pregnancy, this study has registered that only 29.7% of the respondents discuss sexual activities during pregnancy with their physicians, contradicting Sydow, (1998) study which stated that physicians are the first persons many patients talk to about sexual problems. Other contributing factors that may have motivated the respondents in this study to engage in sexual activities during pregnancy include the internet, friends, radio, television, books, newspapers and teachers in that order. This is similar to Uwapusitanon and Choobun Taiwan (2004) study in which it was stated that sexual information was obtained from the postpartum women (41.9%), books (40.3%), friends (35.5%), and the Internet (38.7%). However, a higher percentage of respondents for this study got their sexual information from the antenatal clinic and from family relatives, further more disagreeing with Uwapusitanon and Choobun who reported in their study that a larger percentage of pregnant women consult the Internet and mass media for the larger amount of information from public media which may be too abundant or too complex for pregnant woman to absorb easily. This may be due to the setting of this study which is an urban slum with very close accessibility to public health facilities for antenatal visits and also the socio demographic characteristics of the respondents could also be a pertinent factor as majority of the respondents whose highest level of education was secondary school and their occupation mostly petty trading and artisans.

5.1.4 Attitude towards sexual activities during pregnancy

Respondents for this study were recorded to having a positive attitude towards sexual behaviours during pregnancy (83%) with a mean of 12.5±3.0. although majority of the respondents think that sexual intercourse during pregnancy is good, safe, gratifying and should be allowed anytime during pregnancy, adding that it is also a form of exercise as regular sex during pregnancy as been said to help contract the pelvic muscles and open the cervix, helping in a normal delivery as the process of labour becomes easier and does not need any external help to bring the baby out, there was a conflict of interest as 38.8% felt that sex should be allowed only during the last month of pregnancy to allow for easy delivery. In a review study, Tenore (2003) reported that sexual activity usually stimulates the breast and nipple, which can promote the release of oxytocin. With vagina penetration,

the lower uterine segment is stimulated, resulting in a local release of prostaglandins. Female orgasms have been shown to include uterine contractions sexually active would have a significantly shorter active phase and a normal pattern of labour, with a higher rate of spontaneous deliveries (Foumane *et al.,* 2014) as cited by Mahboobeh *et al.,* 2014. In contrast, Kavanagh *et al., 2001* in a review on clinical trial studies mentioned that the role of sexual intercourse as a method of induction of labour is uncertain. Sufficient power to detect clinically relevant differences in standard outcomes is needed to investigate intercourse as a method of induction (Mahboobeh *et al.,* 2014).

Meanwhile, in a Nigerian study, Adinma (1995) reported that the attitude toward sexuality among African women during pregnancy and after childbirth is positive, recommending a positive attitude in the overall management of sexuality in the pregnant African woman. Still in Nigeria, Bello *et al.,* (2011) equally pointed out that their respondents had a positive attitude towards sexuality during pregnancy and often indicated an interest in discussing sexual issues with their caregivers, this has also reflected in the high percentage of respondents for this study who have had discussions with family, friends and spouse in regards sexual intercourse during pregnancy, this in turn has significantly had an influence in the practice of sexual activities during pregnancy. In Asia, Bustan, *et al.,* (1995) in the same light, demonstrated that a positive attitude toward sexuality in pregnancy has a positive impact on sexual behaviour during pregnancy this cannot be overemphasized as a positive attitude equally improves self esteem producing a better relationship with self and others.

The positive attitude could be attributed to the fact that women in this study had a great support from their significant other, their mother in-law, female relatives, teachers, health care physicians and postpartum women, who had educated them on sexual activities during pregnancy, this finding could reflect the social and cultural, influences and transmission of norms across generations as reported by Pauleta *et al.,* in their Taiwan study as women elicited sexual behaviour to maintain physical and emotional harmony during pregnancy.

About 17% of the respondents recorded a relatively poor attitude towards sexual activity during pregnancy, speculating that sex during pregnancy may lead to pre-mature labour and are worried that sexual intercourse may harm the baby as stated in some of the studies conducted by other researchers (Zahraee *et al.,* 2002), Bartellas *et al.,* 2000) and Robson *et al.,*1981). This fear and uncertainty is however expected especially during the first few months of pregnancy and the last months of pregnancy as stated by Isajeva *et al.,* 2012. Respondents' also expressed similar misconceptions of fear of miscarriage, vaginal bleeding and black spots on baby's skin after birth. Respondents also felt that the baby may be infected if they engage in sexual activity during pregnancy, some felt that the baby can feel them as a couple having sexual intercourse and so, having sex while pregnant was not necessary. Brown *et al.,(*2008) however stated in their study that sexual activity does not result in uterine contractions and that there seems to be little evidence to advise against intercourse unless there are strong contraindications like multiple pregnancies, history of placenta peruvia and an already established case of threatened abortion. The pregnant woman has to be in constant communication with her healthcare provider to monitor pregnancy period and also be able to fully open up to their healthcare providers on matters of sexual activities during pregnancy.

This study recorded no significant association between the parity and the attitude of reproductive aged women towards sexual behaviour during pregnancy; it however recorded a significant relationship between level of knowledge of respondents and attitude towards sexual activities during pregnancy.

5.1.5 Practice of Sexual Activities during Pregnancy

The study revealed that 95.7% of the respondents had engaged in sexual activity during their last pregnancy and had been involved in kissing, body fondling, and masturbation with majority of the respondents participating sexual intercourse (98.3%). About a third 29% of the respondents currently pregnant at the time of study and have had sex at least once a week and 2-3 times within the month with preference of engaging in sexual intercourse during the second trimester (86.2%).

Majority of women in this study reported a decreased interest in sexual activity during pregnancy at the first trimester (25.3%) and it was found to have increased during the second trimester (55.4%) and declined during the birth week. This reduction in frequency of sexual intercourse in pregnancy may be attributed to the physiological, psychological and emotional changes that occur in pregnancy leading to reduction in sexual desire (Shojaa, 2009 and Fok, 2005), a sense of decreased attractiveness as well as usual aches and pains of pregnancy, nausea and vomiting may contribute to reduced frequency as expressed by the respondents in this study. The fears of harming the baby at the first trimester leading to reduction in sexual desire were reported by the respondents. Several studies had earlier documented low libido and varying degrees of reduced frequency of sexual intercourse throughout pregnancy (Bartellas *et al.,* 2000; Pauls *et al.,* 2008 and Shojaa *et al.,* 2009 ;) In some other studies, sexuality and sexual frequency remained unchanged until pregnancy entered the third trimester (Bogren, 1991; Haines *et al.,* 1996; Orji *et al.,* 2002; Robson *et al.,* 2005).

Although majority of the respondents in this study have experience 2 or more forms of sexual activity during pregnancy, 4.3% had not engage in any form of sexual activity in their last pregnancy due to reasons ranging from spousal unavailability, sexual discomfort, feeling of no sexual desire and been pregnant out of wedlock.

The respondents for this study who had engaged in sexual activity during pregnancy reported a 100% frequency in vaginal intercourse with less kissing, fondling, masturbation and oral sex. Anal sex was not a popular mode of sexual behaviour during pregnancy which probably reflects the cultural view against such practices. The study recorded a significant association between the sources of information on sexual behaviour, level of knowledge as the influencers of the practice of sexual behaviour during pregnancy. The content analysis of the interview transcripts provided a detailed insight into respondent's attitudes and practice regarding sexual behaviour during pregnancy and demonstrated a high individual variability among the women. While majority had expressed delight in having sex during pregnancy for the benefit and health of their baby, their health, placing emphasizes on spousal satisfaction and marital peace and harmony.

Most of the respondents relayed that culture and religion equally encourages the practice of sex during pregnancy in order not to disrupt the marital bond among couple A few had experienced some sexual dysfunctions such as pains during sexual activity resulting from dryness of the vagina, pregnancy discomfort resulting from the bulging stomach in the later part of the pregnancy with many of the women suggesting spousal understanding. Most of the respondents have had discussions with their midwife and nurse during antenatal visits but very few had discussed with their physicians about sexual activities during pregnancy. Although majority of the women in this study engaged in sexual activity for various reasons ranging from the pleasure of feeling loved and for the health of their babies, the fact still remains that one of the obvious reasons is partner satisfaction, marital harmony and spousal fidelity in marriage. The study however, found no significant association between the level of knowledge and the practice of sexual activity during pregnancy although it recorded a significant association between the source of knowledge and the practice of sexual behaviour during pregnancy.

5.1.6 Implication of findings for Population and reproductive health education/ Health promotion and education

This study has laid a platform for developing appropriate and effective interventions to address the knowledge, attitude and practice of sexual behaviour during pregnancy among women and men inclusive as it was observed that sexual behaviours involve not just women but men as well involving psychological, physiological and social context that may affect the reproductive health of individuals including; acquiring physical injury, infringement on the emotional health of couple and sexual misconceptions.

Health education programs

Health education intervention will be more effective in educating couple on safe, painless sexual behaviours, dispelling inherent conceptions of women who have poor knowledge and negative attitude towards sexual behaviours to enhance a fulfilling sexual activity, providing alternatives for non penetrative sexual activity such as kissing, hugging, curdling as a form of couple bonding as the specific areas to focus on have been observed

and established through the assessment of the knowledge, attitude and practice regarding sexual behaviour during pregnancy.

Counselling

Pregnant women need to be adequately counselled on healthy and good partner communication, health care provider communication on the need not to shy away from sexual issues that may be a bother to them. This will further go a long way in curbing postnatal depression. Healthcare providers should also provide an enabling and safe environment and attitude to encourage pregnant women communicate freely with them.

5.2 Conclusion

From the study, it is interesting to note women of reproductive age within Yemetu perceive sexual behaviours during pregnancy to relatively entail vaginal intercourse as this was noted to be predominantly practiced as a major form of sexual behaviour during pregnancy. However, other forms of sexual behaviour such as kissing, body fondling, masturbation and oral sex were also noted to be practiced but on a minimal level, these sexual practices should be encouraged as a woman's sexual behaviour is better looked at as a form of expression, projecting feelings of trust, endearment and affection. Many women find it difficult communicating these feelings amidst the irritation that comes with pregnancy; as a result sexual behaviours play a fundamental role in the formation and maintenance of interpersonal relationships and marital functioning. Social influences play a major role in shaping the sexual behaviour of women. Result from the regression analysis suggests that, sources of information such as reading pregnant manual, education level associated with improvement in knowledge about sexual behaviour.

6.3 Recommendations

The following recommendations have, therefore, been made based on the results of the study:

1. Physicians are encouraged to give detailed factual information to pregnant women relating to sexual activities during antenatal visits.

2. Training on the use of water-soluble lubricants for alleviating pains experienced during sexual intercourse should be conducted among pregnant women.
3. Women should be encouraged through health education approaches to engage in other forms of sexual behaviours such as kissing and body fondling other than sexual intercourse.
4. Couple should engage more in adequate foreplay in order to stimulate psychological readiness for the actual sexual act.
5. Further studies are needed to determine how couples cope without sexual intercourse during pregnancy.

REFERENCES

Adinma, J.I. and Aust, N.Z.J. 1995. Sexuality in Nigerian pregnant women: Perceptions and practice. Obstet Gynaecol. ; 3:290–293.

Alder, E.M. 1989. Sexual behaviour in pregnancy, after childbirth and during breast feeding. Baillieres Clin Obstet Gynaecol.

Allen, L and Fountain, L. 2007b. Sexuality in women of childbearing age. Journal of Perinatal Education, 15(2). Doi 10.1624/105812406X10779. Retrieved from http://www.ncbi.nlm.nih.gov/pmc/articles/PMC1595293.

American College of Obstetricians and Gynaecologists, (ACOG). 2015. Guidance on Pregnancy in Women with Genetic Conditions.

Andrews, G. 2005. Women's sexual health. Edinburg Scotland. Elsevier

Anzaku, A., Ajen, S., Ngozi, O F., Dabu, B A. and Edet, B.E. 2015 Frequency, perceptions and complications of sexual activity during pregnancy among a group of Nigerian women.

Araoye, M.O. 2004. Research Methodology with Statistics for Health and Social Sciences (Subject Section) NATHADEX Publishers, Ilorin: PP 117-118

Arowojolu, A.O., Ilesanmi, A.O., Roberts, O.A. and Okunola, M.A. 2002. Sexuality, contraceptive choice and AIDS awareness among Nigerian undergraduates. *African Journal of Reproductive Health*, 6(2): 60-70.

Aslan, G., Aslan D., Kizilyar A., Ispahi C. and Esen A.2005. A prospective analysis of sexual functions during pregnancy. Int J Impot Res; 17:154–157.

Atputharajah, V. 1987. Some aspects of sexual knowledge and sexual behaviour of local women-results of a survey: XI sex and pregnancy. *Singapore Medical Journal, Vol.28*

Bartellas, E., Crane, J.M., Daley, M.., Bennett, K.A, and Hutchens, D. 2000. Sexuality and sexual activity in pregnancy.

Basson, R. 2001. Human sex-response cycles. *Journal of Sex Marital Therapy*.

Basson, R. 2005. Women sexual dysfunctions: Revised and expanded definitions. Can Med Assoc J.

Bello F.A., Olayemi O., Aimakhu C.O,, Adekunle A.O. 2011. Effect of Pregnancy and Childbirth on Sexuality of Women in Ibadan, Nigeria. ISRN Obstet Gynecol. Doi:10.5402/2011/856586

Berghella, V., Klebanoff M., and McPherson C. 2002. Sexual intercourse association with asymptomatic bacterial vaginosis and Trichomonas vaginalis treatment in relationship to preterm birth. *American Journal of Obstetrics and Gynaecology. 187(5):1277-82.*

Bitzer, J., and Alder J. 2015. Sexuality during Pregnancy and the Postpartum Period. *Journal of sex education and therapy. Vol 25. Issue 1*

Bitzer, J. and Alder, T. 2000. Sexuality during pregnancy and the postpartum period. *Journal of Sex Education and Therapy, 25(1), 49-58*

Bogren, L.Y.1991. Changes in sexuality in women and men during pregnancy. Arch Sex Behav.

Brown, C., Bradford J. and Ling F. 2008. Sex and Sexuality in Pregnancy. Glob. Libr. Women's Med: ISSN:1756.228 Doi 10.3843/GLOWM.10111

Brtnicka, H., Weiss P., and Zverina J., 2009. Human sexuality during pregnancy and the postpartum period. Bratisl Lek Listy. 110(7):427-31.

Bustan, A.L., Tomi, E.I., Faiwalla, M.F., Manav, V. 1995. Maternal sexuality during pregnancy and after childbirth in Muslim Kuwaiti Women. Arch. Sex Behav.

Chang, S.R., Chang, T.C., Chen, K.H. and Lin, H.H. 2009. Developing and validating a Taiwan version of the Female Sexual Function Index for pregnant women. *Journal of Sex Med*.

DeJudicibus, M.A., and McCabe M.P.2002. Psychological factors and the sexuality of pregnant and postpartum women. *J Sex Res.39:94–103*. Retrieved July 7, 2018.

Elliott, S.A. and Watson, J.P. 1985. Sex during pregnancy and the first postnatal year. *Journal of Psychosomatic Research. 29(5):541-548.*

Erol, B., Sanli O., Korkmaz, D., Seyhan, A., Akman, T. and Kadioglu, A. 2007 A cross sectional study of female sexual function and dysfunction during pregnancy. *Journal of Sex Med*.

Eryilmaz, G., Ege E. and Zincir, H. 2004. Factors affecting sexual life during pregnancy in eastern Turkey. Gynecol Obstet Invest. 2004; 57:103–108

Fok, W.Y., Chan, L.Y., and Yuen, P.M. 2005. Sexual behaviour and activity in Chinese pregnant women. Acta Obstet Gynecol Scand.; 84:934–938.

Folasade, A. B., Oladepo O., Christopher O. A. and Adeyemi O. 2011. Effect of Pregnancy and Childbirth on Sexuality of Women in Ibadan, Nigeria, ISRN Obstetrics and Gynaecology. Vol.1

Foumane, P., Mboudou, E.T., Sama, J.D., Baba, S., Enama, M.B.A. and Ngwana, L. 2014. Sexual activity during pregnancy and prognosis of labour in Cameroonian women: a cohort study. *J Maternal Fetal Neonatal Med.*

Gokyildiz, S. and Beji, N.K. 2005. The effects of pregnancy on sexual life. *Journal of sex and marital therapy; 31(11): 201–215.*

Gurevich, R. 2018. The clinical signs of Pregnancy and when they occur.

Haines, Y.O., Shan C.L., Kuen, D.H.Y., Leung, T.K.H., Chung and Chin R. 1996. Sexual Behaviour in Pregnancy among Hong Kong Chinese Women. *Journal of Psychosomatic Research, Vol. 40. No 3*

Isajeva, J., Silkunas, M., Drasutiene, G.S and Bartkeviciene, D. 2012. Features of the sexual Life during Pregnancy. Acta Medica Lituanica Vol 19. No 2 p 67-74

Johnson, C. 2010. Sexual Health during Pregnancy and the Postpartum. *J Sex Med.*

Kavanagh, J., Kelly A.J. and Thomas, J. 2001. Sexual intercourse for cervical ripening and induction of labour. Cochrane Database Syst Rev.

Kennedy, C.M., Turcea A.M., and Bradley, C.S. 2009. Prevalence of vulvar and vaginal symptoms during pregnancy and puerperium. *Int J Gynecol Obstet.*

Kong, Y.C. and Liang, S. 2005. The cultural fabric of Chinese medicine: How to know your body through Chinese medicine. Hong Kong: The Commercial Press

Kurki, T. and Ylikorkala, O. 1993. Coitus during pregnancy is not related to bacterial vaginosis or preterm birth. *American Journal of Obstetrics and Gynecology; 169(5):1130-4.*

Laurisse, S. 2014. Sexual Behaviour during Pregnancy: A Descriptive Correlational Study among Pregnant women. *European Journal of Research in Medical Sciences* Vol. 2 No. 1, 2014 ISSN 2056-600X

Leifer, M. 1980. Psychological effects of motherhood: a study of first pregnancy. ISBN 003055781X. 1178155. New York.

Leite, A., Campos, A., Cardoso, D.A.R, Amed A.M, and De Souza E. 2009. Prevalence of sexual dysfunction during pregnancy. Rev Assoc Med Bras.

Lewis, J.A. and Black J.J. 2006. Sexuality in women of childbearing age. *Journal of Perinatal Education, 15(2), 29-35.*

Liu, H.L., Hsu, P. and Chen, K.H., 2013. Sexual activity during pregnancy in Taiwan: A qualitative study. Sex Med

Ludovici, A.M.1953. Sexual behaviour in the human female: A critical study. *The International Journal of Sexology, 7,150-158.*

Mahboobeh, K.A., Zohre, S., Mahbobeh, R. B., Fatemeh, A. and Mohammed A.J. 2015. Association of Sexual Intercourse with onset of Labour. Iran Red Crescent Med. J 17(1) Doi 10.5812/ircmj.16465

Main, D.M., Grisso J.A., Snyder E.S., Chiu G.Y., and Holmes J.H. 1993. The effect of sexual activity on uterine contraction. *Journal of Women's Health, 2(2), 141-144. Doi: 10.1089/jwh*

Murkoff, H. and Mazel, L. 2008. What to Expect when you are expecting. 4th Edition

Murlagh, J. 2010. Female sexual function, dysfunction and pregnancy: Sexual function in pregnancy. *Journal of Midwifery, Women's Health, 55(5), 438-445*. Retrieved from http:www.medscape.com/viewarticle/732989_5

Naeye, R.L. 1981. Seasonal variations in coitus and other risk factors, and the outcome of pregnancy. Early Human Development; 4(1):61-68.

Naim, M. and Bhutto E. 2000 Sexuality during pregnancy in Pakistani women. *Journal of Pakistan Med Assoc. 50:38–44.*

Nassar, A., Usta I., Finianos A., and Kaspar H. 2004. Spontaneous uterine rupture following intercourse. Acta Obstetrica et Gynaecologica Scandinavica; 83(1):1145.

National Population Commission and Inner City Fund International 2015

Newton, P.E. and Reddy, V. 1995. The basis for Understanding Belief. *Journal for the Theory of Social Behaviour. Vol.25. 4*

Olusegun, F.A. and Ireti A.O. 2011. Sexuality and sexual experience among women with uncomplicated pregnancies in Ikeja, Nigeria. *Journal of Medical Science, 2(6), 894-899.*

Orji, E.O., Ogunlola, I.O. and Fasubaa, O.B. 2009. Sexuality among pregnant women in South West Nigeria. *Journal of Obstetrics and Gynaecology. Vol. 22. Issue 2*

Orshan, S.A.2008. Maternal, Newborn and women's health: Comprehensive care across the lifespan. Philadelphia, Lippincott Williams and Wilkins.

Pauleta, J.R., Pereira N.M. and Graca L.M. 2010. Sexuality during pregnancy. *Journal of Sex Med.; 7*

Pauls, R.N., Occhino J.A., Dryfhout V.L. 2008. Effects of Pregnancy on Female Sexual Function and body image: A prospective study. *J Sex Med; 5:1915–1922.*

Rados, S.N., Vranes, H.S. and Martinovic, M.S.2014. Sexuality during pregnancy: what is important for sexual satisfaction in expectant fathers? *Journal of Sex and Marital Therapy 41(3)*

Rados, S.N., Vranes, H.S. and Sunjic, M. 2014. Limited role of body satisfaction and body image self-consciousness in sexual frequency and satisfaction in pregnant women. *Journal of Sex Research. Doi 10.1080/00224499.2012.744954.*

Read, J.S., Klebanoff, M.A. 1993. Sexual intercourse during pregnancy and preterm delivery: effects of vaginal microorganisms. The Vaginal Infections and Prematurity Study Group. *American Journal of Obstetrics and Gynaecology; 168(2):514-9.*

Reamy, K., White, S.E. 1985. Sexuality in pregnancy and the puerperium: a review. Obstetrical and Gynaecological Survey. 40(1):1-13.

Reamy, K., White S.E., Danielle W.C., Le Vine E.S. 1982. "Sexuality and pregnancy. A prospective study*". J Reprod Med. 27 (6):*

Robson K.M., Brant, H.A., Kumar R. 1981. Maternal sexuality during first pregnancy and after childbirth. British Journal of Obstet Gynaecology. 1981; 88:882–889.

Roemer, A.T. 2005. Medical Acupuncture in Pregnancy: A textbook. New York: Thieme.

Runeborg, A. 2008. Sexuality: a missing dimension in development. Stockholm, Sweden: Edita Communication.

Sacomori, C. and Cardoso, F. 2010. Sexual initiative and intercourse behaviour during pregnancy among Brazilian women: A Retrospective Study. *Journal of sex and marital therapy. 36(2):124–136.*

Sayle, A.E., and Savitz, D.A. 2001. Sexual intercourse during late pregnancy and risk of preterm delivery. Obstetrics and Gynecology.; 97(2): 283-288

Schaffir, J. 2006. Sexual intercourse at term and onset of labour. *Journal of Obstetrics and Gynaecology. 107(6):1310-4.*

Senkumwong, N., Chaovisitsaree S., Rugpao S., Chandrawongse W. and Yanunto S. 2006. The changes of sexuality in Thai women during pregnancy. *J Med Assoc Thai.89 (4 suppl):S124–129.*

Serati, M., Salvatore S., Siesto G., Cattoni E., Zanirato M., Khullar V., Cromi A., Ghezzi F., Bolis P. 2010. Female sexual function during pregnancy and after childbirth. *J Sex Med.; 7:2782–2790*

Shojaa, M., Jouybari, L and Sanagoo, A. 2009. The sexual activity during pregnancy among a group of Iranian Women. Arch. Gynecol Obstet: 279(3):353-356

Still, H. 1986. Sexuality during and after pregnancy Can. Fam. Physician, 32, 2177-2179.

Thorpe, E.M. and Ling, F.W. 1992. Sex and sexuality in pregnancy. Gynecology and Obstetrics, 2, 1-7.

Stuckey, B.G.A. 2008. Female sexual function and dysfunction in the reproductive years: The influence of endogenous and exogenous sex hormones. *Journal of Sex Med*.

Sydow, K.V. 1999. Sexuality during pregnancy and after childbirth: a metacontent analysis of 59 studies. Journal of Psychosom Res. 47:27–29.

Tan, P.C., Andi A., Azmi N. and Noraihan M.N. 2006. Effect of coitus at term on length of gestation, induction of labour, and mode of delivery. *Obstetrics and Gynaecology.; 108(1):134-40.*

Tan, P.C., Yow, C.M. and Omar, S.Z. 2007. Effect of coital activity on onset of labour in womenscheduled for labour induction: a randomized controlled trial. Obstetrics and Gynaecology. 110(4):820-6.

Tan, P.C., Yow C.M. and Omar S.Z. 2009. Coitus and orgasm at term: effect on spontaneous labour and pregnancy outcome. Singapore Medical Journal; 50(11):10627

Tenore, J.L. 2003. Methods for cervical ripening and induction of labour. American Family Physician.Thai; 67(10):2123–8

Timor-Tritsch, I.E. and Yunis, R.A. 1993. Confirming the safety of trans-vaginal sonography in patients suspected of placenta praevia. Obstetrics & Gynaecology; 81(1): 742

Tomlinson, A.J. and Colliver D. 1999. Does sexual intercourse at term influence the onset of labour? A survey of attitudes of patients and their partners. Journal of Obstetrics and Gynaecology;19(5): 466-468.

Toth, M., Rehnstrom J. And Fuchs A.R. 1989. Prostaglandins E and F in cervical mucus of pregnant women. American Journal Perinatology; 6(2):142-4

Truhlar, A., Cerny V., Dostal P., Solar M., Parizkova R., Hruba I. and Zabka L. 2007. Out of hospital cardiac arrest from air embolism during sexual intercourse: case report and review of the literature. Resuscitation. 73(3):475-84.

United Nations Human Settlements Program (UN HABITAT) 2005. Urban indicators programme

Uwapusitanon, W. and Choobun, T. 2004. Sexuality and sexual activity in pregnancy. *Journal of Med Assoc*

Wong, D.L., Perry, S.E., Hockenberry, M.J., Lowdermilk D.L. and Wilson, D. 2009. Maternal and Child Nursing Care. 3rd Edition. Singapore: Elservier.

Xuan, W. Traditional Chinese Medicine. In: Yuan C.S, Bieber E.J, Bauer B.A. 2006. Textbook of complementary and alternative medicine. 2nd edition. London: Informa Healthcare pp. 211–224.

Yeh, H.Y., Chen, Y.C., Chen, F.P., Chou, L.F., Chen, T.J and Hwang, S.J. 2009. Using of traditional Chinese medicine among pregnant women in Taiwan. Int J Gynecol Obstet.

Zahraee, H., Shafiee, K., Bashardoost, N. and Jabery, O. 2002. Study of the related factors in couple's sexual relationship during pregnancy. Univ. Med Sci.

Appendix 1

INFORMED CONSENT FORM

IRB Research approval number: AD/13/479/893

This approval will lapse on:

Title of research: Sexual Behaviour during Pregnancy among Women of Reproductive Age in Yemetu Communities in Ibadan North Local Government, Oyo State

Name of researcher: This study is being conducted by IGBANA, Erdoo Abigail of the Department of Health Promotion and Education, University of Ibadan.

Purpose of research: The purpose of this research is to investigate knowledge, attitude and practices of women of reproductive age during pregnancy in Yemetu communities, Ibadan North Local Government area, Oyo State

Procedure of research: The study will use a quantitative method (Questionnaire) and qualitative method (In-depth interview) to elicit information from study participants. A total of 300 participants will be recruited into study. Selection of study participants will be done by multistage sampling techniques. Only those who meet the inclusion criteria will be considered.

Expected duration of research and participants' involvement: Each research participants is expected to fill the questionnaire within fifteen to twenty minutes of administration and will be collected back immediately after completion. Data collection is expected to last within a maximum of two months.

Risk: This research will not cause any harm. It will not involve utilization of any invasive material or collection of biological samples

Cost to the participants: Participation will not have any financial cost but will require about twenty minutes (20) of participants' time.

Benefit: There is no direct benefit from this study but the findings would be of great value in the design of interventions at promoting the sexual and reproductive health of women.

Confidentiality: All identifiers will be removed from the questionnaire and confidentiality will be ensured through protection of data collected from participants.

Voluntariness: Participation is absolutely voluntary.

Alternatives to participation: If you choose not to participate in the study, you will be exempted. However, your utmost cooperation will be exceedingly appreciated.

Consequences of participants' decision to withdraw from research and procedure for orderly termination of participation: You can choose to withdraw from the research at any time. However, please note that some of the information provided by you before withdrawal may be modified or used in reports.

What happens to research participants and communities when the research is over?

The outcome of this research will be disseminated accordingly.

Any apparent potential conflict of interest?

There is no conflict of interest as pertains to this study

Statement of person obtaining informed consent

I have fully explained this research to _____ and have given sufficient information, including about risks and benefits, to make an informed decision.

DATE: _____ SIGNATURE: _____

NAME: _____

Statement of person giving informed consent

I have read the description of the research and I fully understand the processes involved in the research. I understand that my participation is voluntary. I know enough about the purpose, methods, risks, and benefits of the research study to judge that I want to take part in it. I understand that I may freely stop being part of this study at any time. I have received a copy of this consent form and additional information sheet to keep for myself.

DATE: _____ SIGNATURE: _____

NAME: _____

Detailed contact information including contact address, telephone, fax, email and any other contact information of researcher, institution HREC and head of the institution.

This research has been approved by the Oyo State Research Ethical Review Committee and the chairman of this committee can be contacted at Ministry of Health Secretariat, Ibadan.

In addition, if you have any question about your participation in this research, you can contact the principal investigator,

Name _____ Department _____

Phone _____Email _____

PLEASE KEEP A COPY OF THE SIGNED INFORMED CONSENT

Appendix II

Instrument for data collection

In-depth Interview Guide

Knowledge and Attitude in relation to Sexual Behaviour during Pregnancy among Women of Reproductive age in Yemetu Community Ibadan Nigeria.

Good day. I thank you for agreeing to take part in this interview. This interview is a research that intends to find out some vital information on issues relating to the sexual behaviour/ practices of women of reproductive age during pregnancy. During this interview, no views expressed will be judged right or wrong. The interview will remain completely confidential and will only be used for the purpose of this research. Thank you for your time.

Questions

Knowledge of sexual behaviours by women of reproductive age during pregnancy

1. In your opinion, do you think sexual behaviours could mean other than vaginal intercourse?

(a) What do you think are the benefits (if any) of sexual behaviours during pregnancy? *Probe:* Have you engage in any sexual behaviour during pregnancy?(ask the next question if yes, if not move on to (c). (b) What sexual behaviour do you predominantly engage in during pregnancy? (c) Of what benefits i) to the mother ii) to the child iii) to the husband is the issues of SB during pregnancy?

2. What do you think are the problems associated with engaging in sexual activities during pregnancy?

Attitude towards SB during pregnancy

Why do couples not have sex during pregnancy? *Probe for* Health, cultural, religious reasons

Practice of sexual activities during pregnancy

5. Should women engage in sexual practices during pregnancy?

Give reasons for your answer.

Translated version

Nọmba Atẹlera---------

Aṣamọ

Atojọ Ibeere Lati Gba Data

Atọna Itakọrosọ To Jinlẹ

Bi awọn obinrin adelebọ, ni Agbegbe Yemẹtu, Ijọba Ibile Ariwa Ibadan, Ipinle Ọyọ, ṣe ma a n se si ibalopọ ni gba ti won ba wa ninu oyun.

Mo ki yin o! Orukọ mi ni Erdoo Abigail Igbana. Mo dupẹ pupọ pe ẹ yọnda lati kopa ninu itakọrọsọ yii. Itakọrọsọ yii jẹ iwadii ti o dale itọpinpin bi awọn obinrin adelebọ ṣe ma a n ṣe si ibalopọ ni gba ti won ba wa ninu oyun. Ninu itakọrọsọ yii, ko si idahun ti a o ka si eyi ti o dara tabi ti ko dara. Iha rẹ si itakọrọsọ yii ki yoo han gbangba ati wi pe ki yoo kuna lati wa fun iwadii ti a fi gbe e kale. Ẹ ṣe pupọ fun akoko yin.

Atojọ ibeere

Imọ nipa bi awọn obinrin adelebọ ṣe ma a n ṣe si ibalopọ ni gba ti won ba wa ninu oyun

1 Ki ni o ro pe o jẹ anfani (ti o ba wa) ibalopọ nigba iloyun? *Itọpinpin:*

(a) Njẹ o ti ni ibalopọ kankan nigba ti o loyun?(beere ibeere ti o kan bi esi ba jẹ bẹẹni, amọ ti o ba jẹ bẹẹkọ yara lo si ibeere (d)

(b) Iru ibalopọ wo ni o yan laayo?

(b) Anfaani wo ni ibalopọ nigba oyun ni si (i) iya ọmọ (ii) ọmọ (iii) baba ọmọ?

2 Kini o ro pe o jẹ iṣoro ti o rọmọ nini ibalopọ ni gba oyun?

Iwa si ibalopọ nigba iloyun

3 Kini idi ti awọn tọkọtiyawo kii ni ibalopọ nigba ti obinrin ba wa ninu oyun? Tọpinpin awọn idi wọn yii:

Ilera, Aṣa, Ẹsin

Iṣe orişiirişii nigba iloyun

1. Njẹ o yẹ ki awọn obinrin maa ni ibalopọ nigba ti wọn ba loyun?

a). Fi idi gbe idahun rẹ.

QUESTIONAIRE

Serial No---------

Knowledge and attitude in relation to Sexual Behaviour during Pregnancy among Women of Reproductive age in Yemetu Communities in Ibadan, Nigeria

Dear Respondent,

I am a post graduate student of the Department of Health Promotion and Education, Faculty of Public Health, College of Medicine, University of Ibadan. The aim of this study is to investigate Sexual behaviour during pregnancy among women who are currently pregnant or women who have been pregnant within the last one year in Yemetu, Ibadan North. The result will help inform recommendations that will be used in orienting healthcare workers on the best health information, education and counselling to pass across to pregnant women during antenatal visits or other health education interventions. There is no right or wrong answer to the questions, what is desired of you is your truthful and honest responses. All information gathered will be treated with utmost confidentiality and will be used for research purpose only.

The researcher is available to answer any question(s) you may have concerning the study. You can reach the researcher on 07068008650 or erddyabigail@gmail.com

CONSENT;

I acknowledge that the purpose of this study has been explained to me and I understand the implications of partaking in this research and I voluntarily give informed consent to participate.

I also agree to "shared confidentiality" with departmental staff.

I consent to findings from this study being shared on newsletters, journals and health gazette.

Date..... Signature.....

SECTION A: SOCIO-DEMOGRAPHIC DATA

Instruction: Please tick (√) appropriate options in the boxes and fill in appropriate information where necessary.

1. Level of education; 1 primary [ ] 2. Secondary [ ] Tertiary [ ] 4.No education
2. Age as at last birthday (in years) _____
3. Religion: 1. Christianity 2. Islam [ ] 3. Traditional [ ]
4. Ethnic group: 1.Yoruba 2. Hausa [ ] 3. Igbo [ ]. Others (Specify) --------
5. Marital status: 1. Single [ ] 2. Married [ ] 3. Divorced [ ] 4. Widowed [ ]
6. How many wives does your partner have? 1. One wife [ ] Two wives [ ]. Others (specify) _____
7. How many number of children do you have? (Specify) _____
8. Have you been pregnant within the last one year? 1. Yes [ ] 2. No [ ]
9. Are you currently pregnant? 1. Yes [ ] 2. No [ ]
10. If yes to question 9; how many months old is your pregnancy? ----------
11. Occupation (specify) _____
12. Have you ever received any form of education on sexual activities during pregnancy? 1. Yes [ ] 2. No[ ]

If NO to question 12, skip question 13, and section B and C

13. If yes to question 12. Where did you receive the information? ----------

SECTION B: Knowledge of Sexual Behaviour during Pregnancy

Instruction; tick *[√]* as many as applicable.

14.	What are the possible consequences of engaging in sexual activities during pregnancy?	True	False	Not sure
14a	Easy delivery			
14b	Healthy baby			
14c	Increases closeness among couple			
14d	Miscarriage			
14e	Preterm delivery			
14f	Vaginal bleeding			
14g	Black spot on baby's skin after birth			
15	What do you think are the benefits of sexual activity to the mother?			

15a	It aids easy delivery			
15b	It widens the vagina			
15c	It relieves tension			
15d	for physical fitness			

SECTION C: Sources of Information on Sexual Activity during Pregnancy.

Instruction; ***please tick [√] as many as applicable to you.***

What are your sources of information on sexual intercourse during pregnancy?

	Sources of information	**Yes**	**No**
16	Internet		
17	Friends		
18	Health Facility		
19	Books		
20	Newspapers		
21	Discussion with postpartum women		
22	Listening to Radio		
23	Pregnancy manual		
24	Female relatives		
25	Mother-law		
26	Sisters		
27	Teachers		
28	Classmates		
29	Physicians		
30	Television		
31	Husband		

Section D: Attitude/belief towards sexual activities during pregnancy

Instruction: Please tick (√) as appropriate.

	Statement	Agree	Undecided	Disagree
32	I think having sexual intercourse while I am pregnant is good			
33	I am of the opinion that Sex should be allowed during pregnancy occasionally			
34	I will have sex with my partner while I am pregnant so that my baby can be healthy			
35	I agree to the fact that sexual intercourse should not be allowed during the first 3 month of pregnancy.			
36	Sex should be allowed only during the last month of pregnancy			
37	Sex should be allowed any time during pregnancy			
38a	If I have sex while i am pregnant, I will have abortion			
38b	I am of the opinion that I will bleed if I engage in sexual intercourse during pregnancy			
38c	I am of the belief that if I have sex, I will have pre-mature labour			
38d	It is my belief that my baby will get infected if I engage in any sexual activity during pregnancy			
39	The baby can feel us when we have sex			
40	I am of the opinion that sex during pregnancy is safe			
41	I believe sexual intercourse during pregnancy is gratifying			
42	Sex during pregnancy will bring me and my spouse closer			
43	I do not allow my husband come close to me during pregnancy			

44	Sexual activity during pregnancy is a form of exercise			
45	I only engage in sexual activity during pregnancy to satisfy my own desire			
46	Having sex when i am pregnant is not necessary			

SECTION E: Behaviour/Practice of Sexual activities during pregnancy

47. Have you ever engaged in any sexual activity during your last pregnancy? 1. Yes ( ) 2. No ( )

48. If yes to question 47 above, what type of sexual activities did you engage in while pregnant? 1. A) Kissing ( ) 2. b) Fondling ( ) 3. c) Masturbation ( ) 4. d) Sexual intercourse

49. If NO to question 47 above; what are your reasons for not having any sexual activity during pregnancy----------
---
---

50. Have you ever discussed the topic of sexual behavioural practices during pregnancy with your nurse or social worker during antenatal visits? 1. Yes ( ) 2. No ( )

IF YOU ARE NOT CURRENTLY PREGNANT, STOP AT QUESTION 51. Multiple choices allowed.

		Yes	No	Not sure
51	During the pregnancy period, how many times have you had sex? 1. Once a month			
	2. 2-3 times a month			
	3. 1 time a week			
	4. 2-3 times a week			
	5. 4-7 times a week			
52	At what point do you prefer to engage in sexual intercourse during pregnancy?			

	1.First trimester 2.second trimester 3.Third trimester			
53	Is there a reduction or increase in sexual activity at any of the trimester?			
53b	If yes; at what point is there a reduction or increase? Decrease of sexual activity during first-second trimester			
	Increase of sexual activity within first-second trimester			
	Increase of sexual activity within second-third trimester			
	Decrease in sexual activity within second-third trimester			
	Decrease in sexual activity during birth week			
	Increase in sexual activity during birth week			
54	What are the reasons for this change? 1. Fear of harming the baby			
	2. Reduction in sexual desire			
	3. Feeling less desire from my partner			
	4. Feeling less attractive			
	5. Partner not always around			
	6. Increase in sexual desire			
	7. Difficulty in lubrication			
55	What type of sexual activity do you engage in during pregnancy? Anal intercourse			
	Vaginal intercourse			
	Oral intercourse			
	Masturbation			

Thank you for your participation.

Nọmba Atẹlera---------

Iwe Ibeere

Bi awọn obinrin adelebọ, ni Agbegbe Yemẹtu, Ijọba Ibile Ariwa Ibadan, Ipinle Ọyọ, ṣe ma a n se si ibalopọ ni gba ti won ba wa ninu oyun.

Oludahun mi tooto,

Mo jẹ akẹkọọ gboye keji ni ẹka ẹkọ igbeleke ilera ati eto ẹkọ ni ẹka ilera ara ilu, koleeji iwosan, Ifafiti ti ilu Ibadan. Erongba iṣe iwadii yii ni lati ṣe itọpinpin bi awọn obinrin adelebọ ti o wa ninu oyun tabi ti o ti ni oyun ni bii ọdun kan seyin, ni Agbegbe Yemẹtu, Ijọba Ibile Ariwa Ibadan, ṣe ma a n se si ibalopọ ni gba ti won ba wa ninu oyun. Esi iwadii yoo ran awọn onisẹ ilera lọwọ lati ni oye kikun nipa eto ilera, eto ẹkọ, ati amọran ti yoo ran awọn alaboyun ti wọn wa fun iwosan saaju ibimọ ati eto iranwo fun ilera. Ko si idahun ti o tọna tabi ti ko tọna si atojọ awọn ibeere ti a bere, ohun ti o pọndandan ni lati fun o ni ṣe otitọ ato ododo ninu idahun rẹ. Gbogbo idahun ti a ba gba wole ni a o daabo bo ti a o si lo o fun iṣẹ iwadii yii nikan.

Oluwadii ṣe tan lati dahun oniruuru ibeere lori iṣẹ iwadii yii ni pa fifi ṣọwọ si 07068008650 tabi<u>erddyabigail@gmail.com</u>

Mo gba;

Mo gba pe gbogbo erongba iṣẹ iwadii yii ni oluwadii ti ṣe alaye rẹ fun mi ti mo si ti mọ atunbọtan kikopa ninu rẹ. Mo finu-findo gba lati kopa ninu rẹ.

Mo si tun gba lati se pese ọrọ bonkẹlẹ pẹlu awọn oṣisẹ ẹka ile iwosan.

Mo si fowọ si pe oluwadii le fi abajade iṣẹ iwadii yii si inu iwe iroyin, iwe igba-de-gba ati geseẹti ilera.

Deeti..... ifọwọsi .....

Apa A:Data Ajẹmọ Igbe Aye Ẹni Lawujọ

Ikilọ : Jọwọ, fala si idahun ti o ba tọna ninu akamọ ki o si pese atojọ ọrọ ti o yẹ.

1. Okunrin abi Obinrin: 1.okunrin. ☐ 2. Obinrin ☐
2. ọjọ ori ni ayẹyẹ ọjọ ibi ti o kọja (ni ọdun):

3. Iwe melo loka; 1 oniwe mẹfa ☐ 2. Ile iwe girama ☐ 3. Ile iwe giga ☐ 4. Nko kawe ☐
4. Ẹlesin wo ni o: 1. Kristieni ☐ 2. Musulumi ☐ 3. Ibile ☐

   5. Ẹya wo ni o: 1.Yoruba ☐ 2. Hausa ☐ 3. Igbo ☐ 4. Ti miiran ba tun wa, dakun tọka rẹ ----------

   6. Ipo igbeyawo re:1. Apọn ☐ 2. Ti gbeyawo ☐ 3. Ti kọ ọkọ abi ti kọ aya ☐ 4. Opọ ☐

   7. Iru idile ti e ti jade: 1.Idile oniyawo kan ☐ 2. Idile oniyawo pupọ ☐ 3. Baba abi iya nikan ni o to mi ☐ 4. Ti miiran ba tun wa, dakun tọka rẹ ----------

8. Omọ melo ni o ti bi (sọ ni pato)_____
9. Njẹ o ti loyun ni bii ọdun kan sẹyin? 1.bẹẹni [ ] 2. Bẹẹkọ[ ]
10. Njẹ o wa ninu oyun lọwọ? 1.bẹẹni [ ] 2. Bẹẹkọ[ ]
11. Oyun ọsu meloo ni oyun naa?
12. Iṣẹ wo ni o n ṣe (sọ ni pato)----------

Apa B; Imọ bi awọn obinrin adelebọ ṣe ma a n ṣe si ibalopọ ni gba ti won ba wa ninu oyun

13. Iru ibalopo wo ni o mọ? _____
14. Kini awọn atubotan nini orisiirisii ipalopọ nigba oyun?

1 Ki ọjọ ikunle le rọrun [ ]
2 Ki ọmọ le jafafa [ ]
3 O ma n mu ki awọn lokọlaya sun mọ ra wọn sii [ ]
4 O ma a n fa ki oyun o wale lara eni[ ]
5 O ma a n fa bibimọ aitọjọ[ ]
6 O ma a fa ki oju abẹ maa ṣẹjẹ[ ]
7 7. o ma a n fa ki ami tototo dudu maa wa lara ọmọ ikoko naa [ ]

15. Kini o ro pe o jẹ anfaani nini orişiirişii ibalopọ fun oloyun?

1. O ma a n jẹ ki ọjọ ikunle rọrun [ ]

2. O ma a n jẹ ki oju ara fẹ [ ]

3. o maa n dẹkun igbonara [ ]

16. Kini awọn idi ti o fi n ma a n ni ibalopọ nigba oyun?

1. lati ni igbadun [ ]

2. lati tẹ ololufẹ ẹ mi lọrun [ ]

3. Lati ṣe oju ṣe e mi gẹgẹ bi i iyawo [ ]

4. lati yẹra fun aisododo pẹlu ololufẹẹ mi [ ]

Apa D; Ibo ni o ti gbọ nipa orişiirişii ibalopọ nigba iloyun

Ikilọ: jọwọ mu eyi ti o tọna nibi ti o yẹ

Kini orisun ibi ti o ti gbọ nipa ibalopọ nigba oyun?

	Ibi ti o ti gbọ nipa rẹ	Bẹẹni	Bẹẹkọ
17	Ẹrọ ayara-bii-aṣa		
18	Aarin ọrẹ		
19	Ile iwosan agbẹbi		
20	Inu iwe		
21	Inu iwe iroyin		
22	Ijiroro pelu awọn obinrin ti wọn ti bimọ		
23	Titẹti si ẹrọ redio		
24	Iwe apejuwe nipa iloyun		
25	Ebi mi lobirin		
26	Iya okomi		

27	Egbọn abi aburo mi lobinrin		
28	Lati ọdọ olukọ mi		
29	ọdọ akẹgbẹ ẹ mi ni kilasi		
30	ọdọonisẹgun oyinbo		
31	Ori ẹrọ amo-hun-ma-wo-ran		

Apa E: iwa tabi igbagbọ si ibalopọ nigba oyun

Ikilọ: jọwọ mu eyi o tọna nibi ti o yẹ.

	Atojọ ọrọ	**Mo fara mọ ọ**	**Nko tii ronu**	**Nko fara mọọ**
32	Mo lerope nini ibalopọ nigba oyun dara			
33	Ero temi ni pe ki ibalopọ maa waye nigba iloyun lẹkọọkan.			
34	Ma a ma ni ibalopọ pẹlu ololufẹ mi nigba ti mo ba wa ninu oyun bi ko ba si ewu fun oyun naa.			
35	Mo fara mọ pe ibalopọ ko gbọdọ waye ni ọsu mẹta akọkọ nigba oyun.			
36	Ọsu ti o kẹyin igba ti obinrin ba loyun ni o yẹ ki ibalopọ ma a waye			
37	Ko yẹ ki ibalopọ ma a waye rara nigba ti obinrin ba loyun			
38a	Ti mo ba ni ibalopo nigba ti mo loyun, o maa je ki oyun mi o baje			
38b	Ti mo ba ni ibalopo nigba ti mo loyun, ẹjẹ yoo ma san ni			

38c	Irọbi yoo waye laitọjọ			
38d	ọmọ ikoko naa yoo ko aisan			
39	ọmọ ikoko naa yoo mo nigba ti a ba ni ibalopọ			
40	Ero temi ni pe ko si ewu fun ibalopọ nigba iloyun			
41	Mo nigbagbọ pe ibalopọ nigba oyun nmu adun ọkan wa			
42	Ololufẹẹ mi ni o ma a n daba ibalopọ nigba ti mo ba wa ninu oyun.			
43	Mi o ki n gba ki ọkọ mi sun mọ mi ni gba ti mo ba wa ninu oyun.			
44	Pataki awọn ibalopọ igba oyun ni lati ṣe ojuṣe mi gẹgẹ bi ẹni ti o ti gbeyawo			
45	Mo maa n kopa ninu ibalopọ ni gba ti mo ba wa ninu oyun lati le tẹ ara mi lọrun ni			
46	Nini ibalopọ nigba oyun pọn dandan			
47	Mo maa n kopa ninu ibalopọ nigba ti mo ba wa ninu oyun lati le tẹ ololufẹẹ mi lọrun ni			

Apa Ẹ: iṣẹ ibalopọ orişiirişii nigba oyun

48. Njẹ o loyun ni nnkan bii ọdun kan seyin? 1. Bẹẹni ( ) 2. Bẹẹkọ ( )

49. njẹ o ni ibalopọ nigba oyun ti o ni kẹyin? 1. Bẹẹni ( ) 2. Bẹẹkọ ( )

50. Ti o ba jẹ bẹẹni, iru ibalopọ wo ni o ni nigba ti o loyun? 1. a) ifẹnu-kẹnu ( ) 2. b) erepa laarin ololufẹ meji ( ) 3. c) Fifi oju ara eni sere( ) 4. d) ibalopọ gan-an ni pato

51. O to gba meloo ti o ti ni ibalopọ ni bii os\u kan seyin? ----------

52. Kini idi ẹ? ----------

----------53 Se o ma a n jiroro nipa ohun ti o niise pẹlu ibalopọ nigba oyun laarin awọn nọọsi ati awọn oşişẹ nigba ti o ba wa fun iwosan ninu oyun? 1. Bẹẹni ( ) 2. Bẹẹkọ ( )

E seun ti ekopa

APPENDIX III

TELEGRAMS..... TELEPHONE.....

OYO STATE: THE PACESETTER

MINISTRY OF HEALTH

DEPARTMENT OF PLANNING, RESEARCH & STATISTICS DIVISION

PRIVATE MAIL BAG NO. 5027, OYO STATE OF NIGERIA

Your Ref. No. .....

All communications should be addressed to the Honorable Commissioner quoting

Our Ref. No. AD 13/479/893

28th August, 2018

The Principal Investigator,
College of Medicine,
Department of Health Promotion and Education,
University of Ibadan,
Ibadan.

Attention: Igbana Erdoo

ETHICS APPROVAL FOR THE IMPLEMENTATION
OF YOUR RESEARCH PROPOSAL IN OYO STATE

This is to acknowledge that your Research Proposal titled: "Sexual Behaviour during Pregnancy among Women of Reproductive Age in Yemetu Communities in Ibadan North Local Government, Oyo State" has been reviewed by the Oyo State Ethics Review Committee.

2. The committee has noted your compliance. In the light of this, I am pleased to convey to you the full approval by the committee for the implementation of the Research Proposal in Oyo State, Nigeria.

3. Please note that the National Code for Health Research Ethics requires you to comply with all institutional guidelines, rules and regulations, in line with this, the Committee will monitor closely and follow up the implementation of the research study. However, the Ministry of Health would like to have a copy of the results and conclusions of findings as this will help in policy making in the health sector.

4. Wishing you all the best.

Signature & Date

Dr. Abbas Gbolahan
Director, Planning, Research & Statistics
Secretary, Oyo State, Research Ethics Review Committee

APPENDIX IV

Source; Yemetu Community Urban Project Development Association