

**THE EFFECTS OF SEX EDUCATION ON ADOLESCENTS'  
SEXUAL BEHAVIOR IN SECONDARY SCHOOLS IN  
THIKA DISTRICT, KENYA**

**BY**

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**DECLARATION**

This Thesis is my original work and has not been presented for a degree in any other University.

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**DEDICATION**

To my dear husband the late Engineer Samuel Caesar Mwanza

To our two children Jed Mumo and Renata Ndanu

Thank you for your love and great support

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**ABBREVIATIONS & ACRONYMS**

<b>AIDS</b>	-	Acquired Immune Deficiency Syndrome
<b>ANOVA</b>	-	Analysis of Variance
<b>HIV</b>	-	Human Immunodeficiency Virus
<b>STD</b>	-	Sexually Transmitted Disease
<b>STI</b>	-	Sexually Transmitted Infections
<b>TV</b>	-	Television
<b>USA</b>	-	United States of America

## ABSTRACT

With the achievement of puberty, the adolescent becomes sexually active and competent. This maturity involves the whole process of physical development, emotional feelings and social conditioning. It may well be for the adolescent a period of turmoil and awkward adjustment, of mystery and exchange of wrong information with other adolescents. Adolescents, therefore, need the best possible preparation to enable them to cope well with their sexual development and avoid the most obvious pitfalls. Proper sex education can correct misconceptions and help achieve the desired sexual behaviour among the adolescents. Most studies in Kenya have generally concentrated on identifying the major sources of sex education for adolescents. It is less clear, however, which sexuality outcomes are influenced by different sources, and which sources have greater general influences on adolescents in Kenya. The purpose of this study was to determine the contribution of various sources of education about sexual topics (family, peers, media, school and religion) on teens' sexual knowledge and behaviour among public secondary school students in Thika District. The study used ex-post facto design to determine sources of sex education and its influence on secondary school adolescents' sexual behaviour. Data analysis was both qualitative and quantitative. Qualitative analysis considered the inferences that were made from the opinions of the respondents. This analysis was then thematically presented in narrative form and where possible tabular form. Quantitative data was analyzed using descriptive statistics including frequency counts and percentages. These data were further subjected to significance tests using Chi-square test. The study established that the main sources of sex education were peers and the mass media. Parents and school were rated among the lowest with sources of sex education. Based on the findings of the study, the researcher concludes that adolescents in secondary schools in Thika District do not have adequate information about sex. This can be attributed to over-reliance on peers for information about sex, and, because information from peers can be unreliable, most of the information that the adolescents have is often misleading. Consequently, most of the sexually active students do not use any form of protection during sexual intercourse, and this exposes them to the risk of contracting HIV/AIDS, sexually transmitted diseases, or getting unwanted pregnancies, which can result to school dropout or health complications as young girls attempt abortion. Other adolescents practice unreliable protection methods such as the withdrawal method due to lack of information. Therefore, the researcher recommends that parents should be sensitized about the whole question of adolescents' sexuality so that they can be more involved in teaching them about the same; the education system should put into consideration the idea of incorporating sex education into the school curriculum; the community should work hand in hand with community-based organisations and NGOs to educate the adolescents on responsible sex behaviour; the church should play a more active role in educating the adolescents/youth on sex education; and, since most peers prefer getting their information concerning sex from their fellow peers, all the parties should make effort to train the adolescents in order to ensure that they give right information to each other.

## **CHAPTER ONE**

### **INTRODUCTION**

#### **1.1 Background to the Study**

Sex education is instruction in the various physiological, psychological and sociological aspects of sexual responses and reproduction. According to Lerner and Spanier (1980), it is the process of teaching an individual to understand and accept himself or herself as a person with sexual feelings and reproductive capacities. Sex education includes learning to interact with individuals in a healthy constructive and meaningful manner. It also involves learning to fit sexuality into a pattern of behaviour which allows the person to function as a responsible member of the society. Sex education, according to Husen and Neville (1985), is the continuous influence exerted through a guided learning process on the development of human sexuality, whereby sexual attitudes and manners stand at the centre of education interests.

Unlike most subjects, sex education is concerned with an especially sensitive and highly personal part of human life. Sex education courses vary widely but most involve two basic types of instruction; the teaching of human biology (the “facts of life”) and discussions of such controversial sexual topics as contraception, promiscuity, masturbation, prostitution, abortion, homosexuality, rape and responsible decision making about sex.

Melgosa (1997) suggests that sex education must be started from early childhood. He says that at home, sexuality must be talked about in a natural way, after hearing something on the news, when giving an opinion about the attitudes of a real person or a fictitious character (television, literature), or on any occasion when it comes up.

Newman and Newman (1986) suggest that before rapid physical growth and sexual maturation catch adolescents by surprise, it makes sense to begin to advise them about what to expect. Adolescents need an opportunity to ask questions and share their concerns about their sexuality. Sex is problematic for most adolescents and it is highly interpersonal. Many adolescents feel pressured into sexual encounters that they would otherwise avoid or postpone if they felt comfortable stating how they felt. Sex education programmes can correct the misconceptions.

Previous research suggests that most adolescents obtain sexual information from home (Fox, 1980) and peers (Garbarino, 1985). But since many children are not given thorough and reliable sexual information in the home (Simanski, 1998), and peers are shown to be unreliable sources (Garbarino, 1985), strides have been taken to provide quality sex education through the schools. Nevertheless, a small but vocal segment of the population - referring to themselves as “the moral majority” - opposes sex education in the schools (Nielsen, 1987). They argue that there are not enough qualified teachers of sex education and a poorly qualified teacher may cause more harm and problems than good for the students. The second concern is over what should be taught and how. Third, parents worry about the teacher’s values. Even the context for presenting factual information is probably affected by the teacher’s own attitudes. This is especially problematic in schools where students come from a wide variety of backgrounds. The fourth problem involves the sex educator’s age. Some parents fear that a young teacher may not be mature enough to teach sexuality responsibly. The educator’s personal characteristics are clearly important to parents of adolescents (Public School Parent's Network, 2005).

From the above, it is clear that there is a wide range of sources of sex education for Kenyan adolescents, and these varied sources are likely to have varied influence on

the adolescent sex behaviour. On the basis of this therefore, the researcher is interested in finding out where adolescents in secondary schools in Thika District get information about sex from and its effects on their sexual behaviour. The big question here is where can they really go to find out what feelings are normal, what their own reproductive capacities are, how sexual expressions relates to other feelings, what issues surround sexual intimacy and associated hazards and how does all these influence their sexual behaviour. The intention was to come up with the key sources of sex information that can be used to positively influence the desired behaviour change among adolescents.

## **1.2 Statement of the Problem**

Adolescence is a stage of self discovery characterized by physical, sexual and emotional development (Lerner & Spanier, 1980). For many adolescents it is a period of turmoil and awkward adjustment, of mystery and exchange of ignorance with other adolescents. Many adolescents feel pressured into sexual encounters that they would otherwise avoid or postpone if they felt comfortable stating how they felt. Sex education can correct misconceptions and help achieve the desired sexual behaviour among the adolescent.

Most studies in Kenya have generally concentrated on identifying the major sources of sex education for adolescents. It is less clear, however, which sexuality outcomes are influenced by different sources, and which sources have greater general influences on adolescents in Kenya. The major problem addressed by this study, therefore, was that of lack of research-based literature showing how different sources of sex education influenced adolescents' sexual behaviour.

### **1.2.1 Purpose of the Study**

The purpose of this study was to determine the effects of sex education on adolescents' sexual behaviour in secondary schools in Thika District. The study investigated the contribution that different sources of education about sexual topics (family, peers, media, school, and religion) make on adolescents' sexual knowledge and behaviour among secondary school students in Thika District. This was aimed at coming up with the key sources of sex education that could be positively utilized to influence desired sexual behaviour among adolescents.

### **1.3 Objectives of the Study**

The study specifically set out:

1. To assess the level of sexual knowledge among adolescents in secondary schools in Thika.
2. To investigate the major sources of sex education among adolescent secondary school students in Thika.
3. To analyze if sources of sex education for sexually active students differ with sources for those who are not sexually active.

### **1.4 Research Questions**

The study attempted to answer the following research questions:

1. What is the level of sexual knowledge among adolescents in secondary schools in Thika?
2. What are the major sources of sex education among adolescent secondary school students in Thika?

3. Is there a difference in sources of sex education among sexually active students and those who are not sexually active?

### **1.5 Research Hypotheses**

H<sub>1</sub> There is a significant relationship between the sources of sex education and students sexual knowledge.

H<sub>2</sub> Sexually active students and students who are not sexually active have different sources of sex education.

H<sub>3</sub> There is a significant difference in sources of sex education across students' gender.

### **1.6 Significance of the Study**

The study could be significant to parents, educationists and the society in general in that; it might provide understanding of the influence of the various sources of adolescent sex education on their sexual behaviour. This could reveal certain important issues that need to be addressed by policy makers, curriculum designers and the wider society in their efforts to assist the adolescents make the best decisions on their sexual relationship.

The study was also expected to serve as a justification for an evaluation of the Sex Education Programme in secondary schools by education stakeholders. It attempted to give the effect of such education among others. It would be expected that students reflect the knowledge acquired in their daily lives. The study could contribute to the existing body of knowledge on adolescents and their sexuality, as well as prompt further studies.

### **1.7 Limitation and Delimitation of the Study**



This study was confined to 12 randomly selected secondary schools in Thika District. It covered only 196 students in the selected schools. This was because of shortage of time and inadequate resources, which could enable the covering of all the secondary schools in Thika District. Since the sample respondents were drawn from selected secondary schools in Thika District, the sources and effects found mainly reflected the situation in the district.

## **1.8 Assumptions**

The study was based on the following assumptions:

- a) That the selected students and teachers co-operated in providing the relevant information.
- b) That the selected sample of students for the study provided the required evidence to sufficiently address the study problem.
- c) That the selected students were exposed to various sources of sex education

## **1.9 Theoretical Framework**

This study was guided by three theories, that is, the Social Learning Theory, the Expectancy Value Theory and the Theory of Reasoned Action.

### **1.9.1 Bandura's (1977) Social Learning Theory**

The social learning theory by Bandura (1977) emphasizes the importance of observing and modelling the behaviours, attitudes, and emotional reactions of others. Social learning theory explains human behaviour in terms of continuous reciprocal interaction between cognitive, behavioural, and environmental influences. The component processes underlying observational learning are: (1) Attention, including modelled events (distinctiveness, affective valence, complexity, prevalence,

functional value) and observer characteristics (sensory capacities, arousal level, perceptual set, past reinforcement), (2) Retention, including symbolic coding, cognitive organization, symbolic rehearsal, motor rehearsal), (3) Motor Reproduction, including physical capabilities, self-observation of reproduction, accuracy of feedback, and (4) Motivation, including external, vicarious and self reinforcement. In this study, the researcher sought to find out whether adolescents learn about sex through modelling from adults around them, including parents, relatives, and role models. The theory sets the wider social learning framework upon which the research problem is based to establish the sources of sex education for students in secondary schools and their influence on sexual behaviour.

This theory was linked to the study on sources of sex education because it emphasizes the importance of observing and modelling the behaviours, attitudes, and emotional reactions of others. Since adolescents learn by observing others, there are likely to be different groups of people who model their sexual behaviour, including adults and peers.

### **1.9.2 Expectancy Value Theory by Kurt Lewin (1932)**

The Expectancy Value Theory was proposed by psychologists Kurt Lewin and Edward Tolman in 1932. This theory has been used to understand motivations underlying individual's behaviour. It focuses on intent as the immediate precursor to a particular behaviour. This theory proposes that if one can determine the elements that impact intention, then one can more accurately predict whether an individual will engage in a particular behaviour. In view of this argument therefore, the current study on the effects of sex education on adolescents' sexual behaviour, the theory forms the basis of comparing the sources of sex information and their effects on adolescents'

sexual behaviour. This sets a wider framework on which sources of sexual information would be used to predict adolescents' sexual behaviour.

Likewise, the theory proposes that by changing an individual's perception of potential outcomes, one can alter the individual's intent. In this study, therefore, the theory provides a basis for identifying the positive aspects of each source of sexual information and recommending how they can be utilized to achieve the desired sexual behaviour among adolescents. The more attractive a particular outcome is to the individuals, the more likely the person will engage in the behaviour. This then means that the more attractive aspects of positive influences of these sexual information sources if identified can bring about the desired outcomes.

### **1.9.3 Theory of Reasoned Action by Fishbein and Ajzen (1972)**

The Theory of Reasoned Action Fishbein & Ajzen, (1972) enhances the predictive and explanatory nature of the basic Expectancy Value Theory by including attitude and normative beliefs that can affect intention. Attitude beliefs related to how the individual views the behaviour itself and are weighted by perceived importance. In determining whether to engage in a particular behaviour, individuals also weigh a number of factors including the beliefs of their family members, friends and teachers. The current study therefore builds upon this theory by relating how the various sources of sexual information that include family members, peers, teachers, religious leaders and the media impact on the adolescents' sexual knowledge, attitude and behaviour.

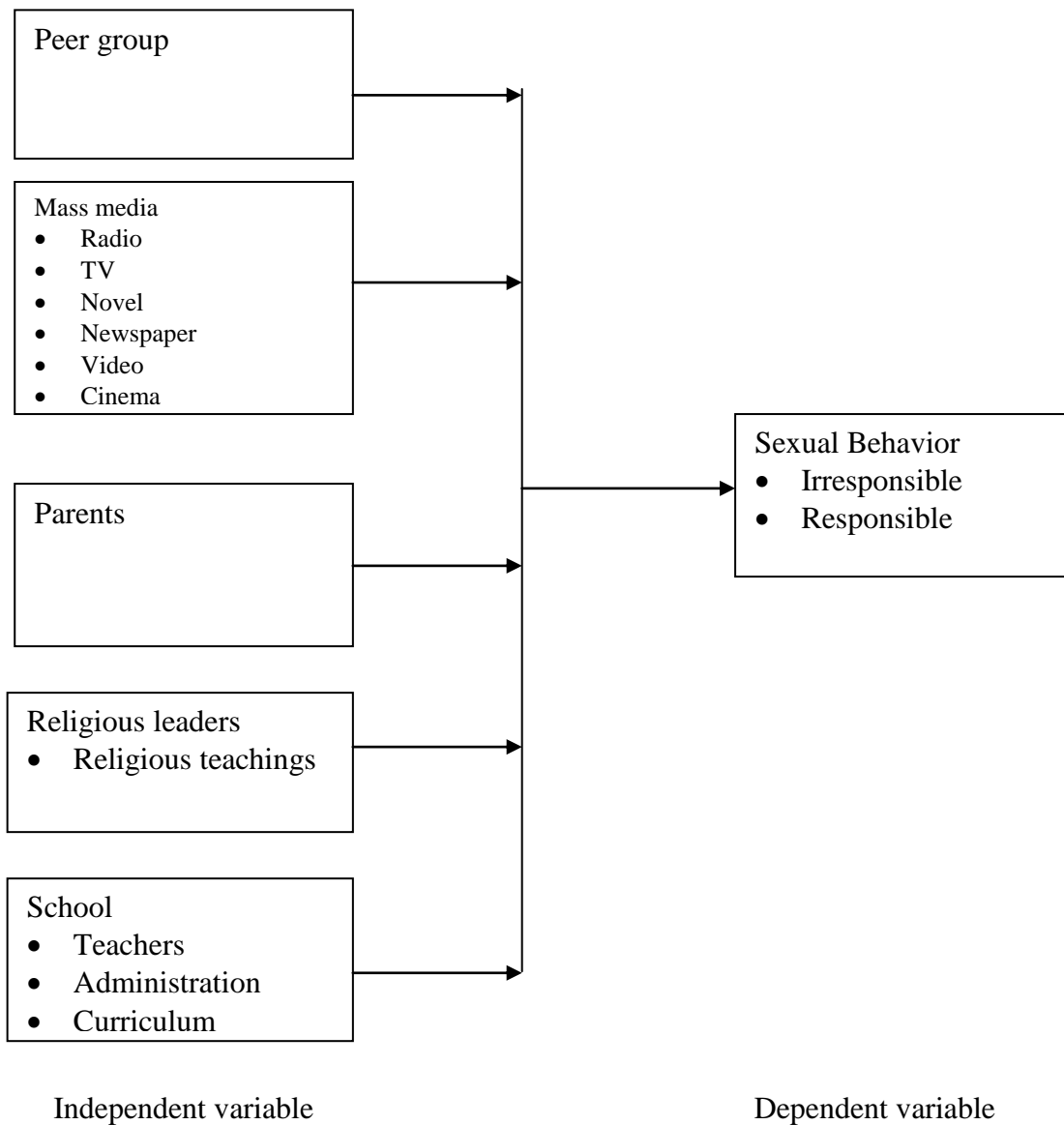
In the recent past, the Theory of Reasoned Action has proved useful in predicting a wide spectrum of behavioural intention (Ajzen, 1980). Studies have focused on a number of regular strategy choices to questions of personal or social significances

including having an abortion, using condoms, and voting in elections. In this study, the theory was used to predict adolescent sexual behaviour using the various sources of sexual information.

### 1.10 Conceptual Framework

Figure 1.1 presents the conceptual framework of the study.

**Figure 1.1 Conceptual Framework**





Adolescents' sexual perception and behaviour are influenced by different sources of sex education, which include the school, mass media, religion, parents/family and peers. These various sources are assumed to have different effects on the desired sexual behaviour on adolescents. Critical to this is the objectivity and guidance that accompany such sources. As shown in Figure 1.1, unguided exposure to sources of sexual education such as peer, mass media, among others leads to irresponsible sexual behaviour such as pre-marital sex and multiple sex partners, which consequently lead to Sexually Transmitted Infections (STIs) and unwanted pregnancies. Well-guided and directed education, on the other hand, is expected to lead to desired sexual perception and behaviour such as responsible friendship, avoiding premarital sex, abstinence among others. It is therefore critical that adolescents get guided exposure to sources of sexual education if the desired behaviour is to be achieved.

### 1.11 Operational Definition of Terms

**Abortion:** An operation or other intervention to end a pregnancy by removing an embryo or foetus from the womb.

**Abstinence:** Voluntarily Staying away from sexual practices until when one is ready or willing to do it.

**Adolescent:** A person who is in transition from childhood to adulthood.

**Attitude:** An opinion or general feeling about something.

**Behavioural Changes:** These are the sexual behaviour changes or outcomes that are depicted by adolescents who are exposed to various sources of education on sexual matters.

**Explicit:** Portraying nudity or sexual activity in an open and direct way.

**Masturbation:** Self stimulation that arouses a person, one can reach orgasm or not.

**Media:** The various means of mass communication considered as a whole, including television, radio, magazines and newspapers, together with the people involved in their production.

**Peer:** Somebody who is the equal of somebody else, like in age or social class

**Rape:** Illegal sexual behaviors which involve sexual penetration without consent to a younger child or incompetent person who is unable to give consent.

**Sex Education:** This is education that is available to adolescents on sexual matters through various sources. These include parents, relatives, peer, school and mass media.

**Sex:** Gender (male or female)

**Sources of Sex Education:** These are the various channels through which adolescent acquire information on sexual matters.

## **CHAPTER TWO**

### **LITERATURE REVIEW**

#### **2.0 Introduction**

This chapter gives a summary of relevant literature used to conceptualize the research theme. The review first gives an overview of sexual behaviour, followed by sex education, sources of sex education and finally presents a summary of the literature review.

#### **2.1 Sexual Behaviour**

Sexual behaviour is the outward expressions of sexual feelings and attitudes. Sexual behaviour is associated with a multitude of worries and anxieties. It is a matter of pre-occupation to most teenagers since it is certainly an extremely emotive topic, and most important, for many it represents a standard of evaluation against which to judge success or failure (Garbarino, 1985). In adolescent, sexual feelings and behaviours are a product of not only biological factors, but also a result of cultural teaching that specify appropriate sexual behaviour, appropriate targets of sexual feelings and appropriate settings for expressing sexual impulses (Newman & Newman, 1986).

Adolescents, like adults, may be prone to engaging in risky sexual behavior due to perceptions of personal invulnerability and their tendency to focus on the immediate, rather than long-term, consequences of their behavior. Not only do young people have to cope with their own maturational changes, but they also have to come to terms with a confusing inconsistency among adult views and a lack of any clear standard or moral code of conduct (Garbarino, 1985). Teenagers need the best possible preparation to enable them to cope well with their sexual development and to avoid the most obvious pitfalls. It is in view of this that the researcher has set out to



investigate the effects of sex education on adolescent sexual behaviour in Secondary schools in Thika District because sex education is viewed as a means of promoting more responsible sexual behaviour and as an important step in preventing the dangers of making wrong decisions.

## **2.2 Sex Education**

Sex education, which is sometimes called sexuality education or sex and relationships education, is the process of acquiring information and forming attitudes and beliefs about sex, sexual identity, relationships and intimacy (Forrest, 2002). It is also about developing young people's skills so that they make informed choices about their behaviour and feel confident and competent about acting on these choices.

According to Garbarino (1985), sex education involves much more than reproductive instruction, rather, sex education should seek to teach adolescents to understand and accept themselves as people with sexual feelings and reproductive capacities. It should include learning how to interact with others in a competent, responsible, healthy, and meaningful way. Its goal should be to achieve a balance between social responsibility on the one hand, and personal freedom and growth on the other.

Sex education seeks both to reduce the risks of potentially negative outcomes from sexual behaviour like unwanted or unplanned pregnancies and infection with sexually transmitted diseases, and to enhance the quality of relationships. It is also about developing people's ability to make decisions over their entire lifetime. Sex education that works, that is sex education that is effective, is sex education that contributes to this overall aim (Forrest, 2002).

According to Kirby, Short, Collins, Rugg, Kolbe, and Horward (1991), effective sex education develops young people's skills in negotiation, decision-making, assertion and listening. Other important skills include being able to recognize pressure from other people and to resist them, deal with and challenge prejudice, seek help from adults, community and health and welfare services. Sex education that works also helps equip young people with skills to be able to differentiate between accurate and inaccurate information, discuss a range of moral and social issues and perspective on sex and sexuality.

It is in view of the above that the researcher sought to explore the effects that sex education has on adolescents' sexual behaviour in secondary schools in Thika District since it is believed that effective sex education provides young people with an opportunity to explore the reasons why people have sex and to think about how it involves emotions, respect for oneself and other people and their feelings, decisions and bodies.

### **2.3 Effects of Sex Education on Adolescents' Sexual Behaviour**

Adolescents get information about sex and sexuality from a wide range of sources including each other (peer), through the media including advertising, television and magazines as well as leaflets, books, websites, through parents and the community, through the church and school. Some of these are discussed below.

#### **2.3.1 Home Environment as a source of Sex Education and its effects on sex behaviour**

In the wider sense, the home seems to be a natural setting for instructing children about sex. At home, young people can easily have a one-to-one discussion with parents focusing on specific issues, questions or concerns. They can have a dialogue

about their attitudes and views (Forrest, 2002). Sex education at home also tends to take place over a long time and involve lots of short interactions between parents and children. The benefits of ongoing, in-depth discussions between parents and adolescents regarding sexuality are apparent. First, adolescents become more aware of the steps they must take to prevent sexually transmitted diseases and pregnancy. Furthermore, adolescents' well-being may be enhanced if they feel more comfortable with their own sexuality. The family may also benefit from open communication, adjusting more successfully to the adolescent's developing sexuality.

However, many surveys (Fox & Inazu, 1980; Simanski, 1998) have reported that adolescents receive relatively little sex instruction from their parents. In fact, some surveys tell us that young people are dissatisfied with sex information available at home, but would really prefer their parents to be the primary source (Simanski, 1998). Some parents are too embarrassed to discuss the subject, or deal with it in negative ways (Rice, 1984.). Many parents have been brought up to feel that all sex is wrong and dirty and become intensely uncomfortable any time the subject is mentioned. If they do discuss sex the messages they give their children are negative ones which interfere with sexual satisfaction (Darling & Hicks, 1982; Simanski, 1998). Not only are parents reluctant to communicate verbally with adolescents about sex, but they may also send nonverbal messages that discourage open communication. Darling and Hicks (1982) found that women recalled negative nonverbal messages in discussions with their mothers about sexuality. As one woman stated about her mother, "I don't want to say that her idea was that sex was dirty, but that's the impression I got at the time." Thus, parents may find it difficult to provide open and positive communication. Unfortunately, even in families where there has been some communication about sex with young children, research has found that this communication drops as the children

approach adolescence (Simanski, 1998). Apparently, the parent's rejection of child's sexual maturation and the adolescent's desire for independence and privacy make communication difficult. The sexual "coming of age" of a child may be perceived as a family developmental crisis. If the family is unable to deal with the crisis, high levels of anxiety may cause communication to be blocked (Forrest, 2002). Because of parental reluctance, discussion of certain sexual issues may be delayed until early adolescence. The timing is typically too late, as many adolescents have already turned to peers for information. Hence, the effectiveness of sex education by parents is limited (Forrest, 2002).

According to Kelly (1983), American parents are likely to model negative sexual attitudes and behaviour. For example, parents may discourage expressions of sexuality and, with respect to modesty taboos, communicate negative affect to children. By inhibiting discussion of sexuality or hiding sexual expression between marital partners, parents may lead adolescents to interpret sexuality as something bad (Kelly, 1983).

Worse still, some parents are unprepared and do not know how to explain to their children. According to Nielsen (1987), many well-intentioned parents are poorly informed about reproduction, contraception and venereal diseases. Therefore, parents need more than background knowledge and subject matter. They also have to have practice in putting ideas together in words in ways meaningful to their children (Rice, 1984).

Studies have indicated that few parents adequately educate their children about sex. Despite their reticence, most parents express the desire to openly communicate about sex with their children. Moreover, parents feel they should be the primary providers of sexual information. However, in USA for example, only about 15% of adolescents

cite their parents as a major source of sexual information. Parents often feel inhibited and embarrassed when talking about sex and have also indicated that they lack accurate information (Collins, 2003). In fact, the average person is still poorly informed and unable to communicate fully about sexuality. Parents feel especially inadequate discussing the issue of sex and AIDS (Darling Hicks 1992). In light of the foregoing, the study established whether parents are a source of sex education to adolescents in Thika and how this source influences on the sexual behaviour of the adolescents.

### **2.3.2 Role of the School in Sex Education**

Sexual education programs in schools have generally had positive effects on adolescent sexual knowledge (Finkel & Finkel, 1985; Melchert & Burnett, 1990), but have also been found not to influence adolescents' sexual attitudes (Finkel & Finkel, 1985) or behaviours (Maslach & Kerr, 1983). One study reported that neither the presence nor absence of contraceptive education in a sample of high school students was correlated with the students' contraceptive behaviours (Taylor, Wang, Jack & Adame, 1989), whereas another reported that a school-based sex education program seemed to have a positive effect on the students' condom use (Kvalem, Sundet, Rivo, Eilertsen & Bakketeig, 1996).

In USA according to the Public School Parent's Network (2005), the public controversy centred on sex education in public schools has shifted. Where the question was once whether or not sexual education should be taught in public schools, the fray now questions the methodology of what is being taught. Many parents find themselves more concerned about the environment their children find themselves exposed to when sex-education in classes are being taught. Many a times, teachers find themselves out of control when facing a room full of adolescent students. With

classes full of immature children titillated by the subject matter, giggles, whoops and hollers echo into the halls as middle school children are exposed to the deadly serious aspect of approaching their sexual development responsibility. Their teachers constantly struggling to keep the children focused on the gravity of what is being discussed. Consequently, because of the loose and casual atmosphere of sexual classrooms, thousands of parents in USA question the validity and the effectiveness of sex education being delivered in public education. To them, if the message can't be delivered responsibly, then should it be delivered at all? (Public School Parent's Network, 2005).

A few case studies in Argentina, Kenya, Peru and the Philippines explored young people's impressions of sex education in schools. The majority of respondents (over 50% in most cases) rated the information provided by schools as inadequate. Several expressed the view that, where sex education was imparted, teachers focused on discouraging students from sexual activity without pointing out dangers or explaining and teaching safe sex behaviour. One student made the complaint:

"The Ministry of Education is afraid to face the fact...students are engaging in sex. They are not advising the students on the dangers of sex. They leave the whole issue to parents, who in most cases shy off." (Nyamongo, 1995).

School-based sex education can be an important and effective way of enhancing young people's knowledge, attitudes and behaviour. There is widespread agreement that formal education should include sex education (Forrest, 2005). Effective school programmes should include the following elements: A focus on reducing specific risky behaviours; A basis in theories which explain what influences people's sexual choices and behaviour; A clear, and continuously reinforced message about sexual behaviour and risk reduction; Providing accurate information about, the risks associated with sexual activity, about contraception and birth control, and about

methods of avoiding or deferring intercourse; Dealing with peer and other social pressures on young people; Providing opportunities to practice communication, negotiation and assertion skills; Uses a variety of approaches to teaching and learning that involve and engage young people and help them to personalize the information; Uses approaches to teaching and learning which are appropriate to young people's age, experience and cultural background; Is provided by people who believe in what they are saying and have access to support in the form of training or consultation with other sex educators.

Formal programmes with these elements can increase young people's levels of knowledge about sex and sexuality, put back the average age at which they first have sexual intercourse and decrease risk when they do have sex (Forrest, 2005).

In view of the controversies surrounding formal sex education in schools, the current study attempted to establish whether school is a major source of sex education to adolescents in Thika District and how this source influences their sexual behaviour.

### **2.3.3 Influence of Peers on Sex Education**

Case studies in several settings suggest that peers remain the main source of information on sexuality for adolescents. Among secondary school students in Homa Bay, Kenya, 35% of females and 51% of males reported frequent discussions of sexual matters with their peers (Nyamongo, 1995).

Among college students in Hanoi and Ho Chi Minh City, Viet Nam, over 90% of adolescents report that they are most comfortable discussing sexual and reproductive health with peers of their own sex, while far fewer report discussion with their parents (Vu Quy Nhan, 1996). In a case study in 13 provinces of Indonesia (Wirakartakusumah, 1997), peers outrank parents as the main source of information

on sexual matters for both females and males: 74% of males and 65% of females obtain their information from their peers, compared to 13% and 23% of males and females, respectively, who report parents as their source of information. Also, 47% of males and 44% of females name teachers as their main source of information.

Peers are less threatening than adults as a source of information about a topic that is widely treated in many cultures as having elements of shame and guilt associated with it (Swan et al, 2003). Unfortunately, the difficulty with learning from peers is that adolescents in general are so poorly informed about sex that they are scarcely competent teachers for one another. Generally, adolescents report greater sexual activity when they believe that their friends are also sexually active, whether or not they really are (BrooksGunn & Furstenberg, 1989). For example, in a study of adolescents in USA, Kaiser Family Foundation (1998) reported that when asked why they had sex for the first time, 13 percent of the adolescents ages 13 to 18 cited pressure from their friends. Bearman and Brückner (1999) also reported that American Adolescents whose friendship network included mostly low-risk friends were half as likely to experience first intercourse as were adolescents whose close friend network was composed mostly of high-risk friends. However, the strong influence of peers can be positively harnessed through guided peer counselling to achieve desired sexual behaviour in adolescents. This study sought to explore whether peers are a main sources of sex education for adolescents in Thika District and how it influences their sexual knowledge and behaviour.

#### **2.3.4 Influence of the Media on Sex Education**

Adolescents are active consumers of messages broadcast on radio and television, printed in magazines, distributed on the Internet, and presented in video games. As technology has advanced, access to these varying types of media has become common



all over the world.(Werner, Fitzharris, Morrissey, 2004). Further, adolescents appear to be using media in an isolated manner: more adolescents seem to have media available in their private bedrooms (Larson, 1995).

Both children and adults have been reported to believe the media is a central source of information on sex and sexuality for young people (Malamuth & Impett, 2001) considering few programs (from the daily news, to "reality-based" programs, to talk shows, to family-centred programming) appear immune to stories of a sexual nature. Content analysis performed on print media, television and movies, music, and computerized media to determine the types of messages delivered through these sources have shown that adolescents are being exposed to both implicit and explicit sexual content (Ward & Wyatt, 1994).

Depending on their rate of development, some adolescents may succumb to media influences, while others may not. Based on an extensive literature review regarding the influences of sexual content in the media, Malamuth and Impett (2001) state that individual personality factors may also be important, as research suggests that the type of media people select and find gratifying is predictably related to their personalities and other individual differences.

Roberts (1993) has also examined adolescents and determined that they vary greatly regarding their development in areas such as identity formation and the development of formal problem solving and moral reasoning. Roberts suggests that not only do these affect the impact media has on adolescents, but so do the individual abilities, interests, social relationships, and short- and long-term needs of the adolescent. Some adolescents may not be cognitively equipped to interpret the media images they encounter (Brown, Childers, & Waszak, 1990) leading to differences in how messages are processed and utilized by the adolescents. Brown et al (1990) also suggested that

media influences may be greater among adolescents who have not had normal personality development.

Along with the examination of media usage, several researchers have attempted to explain the relationship between adolescent sexuality and media. Correlational studies indicate that exposure to sexually suggestive materials is associated with premarital sex, although whether sexually active adolescents seek out sexual content or whether sexual content increases sexual activity remains uncertain (Brown et al., 1990; Brown & Newcomer, 1991; Donnerstein & Smith, 2001; Lackey & Moberg, 1998; Malamuth & Impett, 2001; Strouse & Buerkel-Rothfuss, 1987).

It is widely believed that TV plays a role in hastening the initiation of sexual activity in adolescents. A study by Collins et al (2004), funded by the National Institute of Child Health and Human Development, examined this issue. Analysts surveyed a national sample of households containing an adolescent from 12 to 17 years old. A total of 1,762 adolescents were asked about their sexual experiences and also their television viewing habits and, one year later, were surveyed again.

The researchers measured levels of exposure to three kinds of sexual content on television: (1) sexual behaviour, such as kissing, intimate touching, and implied or depicted intercourse, (2) talk about sexual plans or desires or about sex that has occurred, and expert advice, and (3) talk about or behaviour showing the risks of or the need for safety in regard to sexual activity: abstinence, waiting to have sex, portrayals mentioning or showing contraceptives, and portrayals related to consequences, such as AIDS, STDs, pregnancy, and abortion.

The results showed that heavy exposure to sexual content on television related strongly to adolescents' initiation of intercourse or their progression to more advanced

sexual activities (such as “making out” or oral sex) apart from intercourse in the following year. Adolescents who viewed the greatest amounts of sexual content were two times more likely than those who viewed the smallest amount to initiate sexual intercourse during the following year or to progress to more-advanced levels of other sexual activity. In effect, adolescents who watched the most sexual content “acted older”: a 12-year-old at the highest levels of exposure behaved like a 14- or 15-year-old at the lowest levels.

Although the majority of research regarding the impact of the media on sexuality has focused on harmful effects, the media do appear to have some positive effect on the education of adolescents regarding sexuality, sexual behaviour, and safe sex. While media campaigns that specifically target the sexual behaviour of adolescents can be effective (Huberman, 2000; Strasburger, 1995), learning also takes place indirectly.

Kehily (1999), through participant observation, discovered that young girls read magazines to learn about sex. He conducted a study with a middle-school aged male peer group and concluded that in this group, movies were the source of learning and sharing about male sexuality. In addition to television, print media, and music, the Internet has now become a viable way for adolescents to gain information about sexuality (Flowers-Coulson, Kushner, & Bankowski, 2000).

Two recent studies by Collins (2003) examined the impact of TV sex on teenagers’ sexual beliefs and activities. The results supported the view that watching shows with sexual content may influence teen sexual behaviour, but also found that some viewing effects can be positive. Watching TV shows with sexual content apparently hastens the initiation of teen sexual activity. Sexual talk on TV has the same effect on adolescents as depictions of sex. Shows with content about contraception and

pregnancy can help to educate adolescents about the risks and consequences of sex—and can also foster beneficial dialogue between adolescents and parents.

The effects of media consumption on young people's attitudes and behaviour regarding sex are varied and therefore of increasing interest to parents, educators, policy makers and program planners. The current study was designed to investigate whether media is one of the major sources of sex education to adolescents in Thika District and to establish its influences on the adolescent sex behaviour.

### **2.3.5 Influence of Religion on Sex Education**

The opponents of sex education in the school curriculum have tended to favour sex education by parents and religious leaders. They argue that religious leaders are better placed to provide sex education to adolescents due to their social background and moral status in the society. However, the effectiveness of religious leaders is as varied as the other sources of sex education to the adolescents.

In a study of adolescents ages 11 to 25, Holder et al (2000) observed that respondents who were not sexually active scored significantly higher than sexually active adolescents on the importance of religion in their lives and reported more connections to friends whom they considered to be religious or spiritual.

One study of adolescents ages 12 to 17 by National Campaign to Prevent Teen Pregnancy (2001) found that 26 percent of adolescents who said they attended religious services only "a few times a year" or "almost never" still identified "morals, values and/or religious beliefs" as the factor that most affected their decisions about whether to have sex.

Conversely, a study of first-year college students by Zaleski (2000) found that sexually active adolescents with high levels of religious identification were less likely to use a condom than those with less religious involvement.

The controversy surrounding some of the church leaders on sexual allegations have raised great concern on their appropriateness as providers of sex education to the adolescents. Many parents no longer trust church leaders with their adolescents; they would rather leave only spiritual matters and not sexual development to be handled by these religious leaders. This controversy centred around religious leaders as a source of sexual education for adolescents invites many questions, some among them are; can they be trusted?, do they confront sexual issues explicitly and are they able to influence adolescents' sexual behaviour? It is in view of these that the current study set to establish whether religion is one of the sources of sex education for the adolescents in Thika District and the influence of this source on their sex behaviour.

#### **2.4 Summary of Literature Review**

The literature review has shown that many sources of sex education have been found to affect teen sexual knowledge, attitudes, and behaviours. But generally, there is a lack of comparison of sex education sources and their influence on adolescent sex behaviour that motivated the current study. Most studies evaluated only one source at a time. Stemming from the debate about who should be responsible for sex education (for example, parents, schools, among others), the researcher was interested in whether or not differing influences exist among these sources.

The purpose of this study was therefore to explore the individual and the combined contribution that sources of education about sexual topics (Parent/family, peers, media, school, and religion) make on adolescents' sexual knowledge and behaviour.

The literature reviewed in this section prompted the researcher to generate the following research hypotheses.

H<sub>1</sub> There is a significant relationship between the sources of sex education and students sexual knowledge.

H<sub>2</sub> Sexually active students and students who are not sexually active have different sources of sex education.

H<sub>3</sub> There is a significant difference in sources of sex education across students' gender.

## **CHAPTER THREE**

### **RESEARCH METHODOLOGY**

#### **3.1 Introduction**

The chapter discusses the procedures and strategies used in the study. Research design, locale, target population, the sample and sampling procedures, data collection, data analysis and presentation are also discussed.

#### **3.2 Research Design**

This study was carried out within the ex-post facto design. Ex-post facto research is systematic and empirical inquiry in which the independent variables have already occurred and are not manipulated by the researcher. Borg and Gall (1989) define Ex-post facto research as a systematic empirical inquiry in which the scientist does not have any control of independent variables because their manifestations have already occurred or because they are inherently non-manipulable. Inferences about relations are made without direct intervention from concomitant variation of independent and dependent variables. The investigator does not have direct control of independent variables because their manifestations have already occurred and inferences about relations among variables are made without direct intervention.

#### **3.3 Research Variables**

The dependent variables in the study were knowledge and sexual behaviour, while the independent variables were the sources of sex education information (home, peers, school, religion and the media). The study therefore sought to establish how these independent variables (sources of sex information) influenced the dependent variables (knowledge and sexual behaviour).

### **3.4 Location of the Study**

The study was conducted in some selected secondary schools in Thika. Thika District was chosen because previous research conducted in the area shows that Thika is ranked as one of the leading Districts in prostitution among adolescents, hence rising cases of HIV-AIDS. The area was also chosen because it is accessible to the researcher. Singleton (1993) argues that the ideal setting for any study should be easily accessible to the researcher.

### **3.5 Target Population**

The target population is defined as all the members of a real or hypothetical set of people, events or objects, which a researcher wishes to generalize the research study (Borg & Gall 1989). The target population for this study consisted of all the students and their teachers in secondary schools in Thika District.

### **3.6 Sample and Sampling Procedure**

The respondents comprised students and teachers in schools in Thika District. Thika District is comprised of 120 public secondary schools which have a total population of 41,573 students and 1561 teachers. The selection of the schools was done through stratified random sampling. Twelve secondary schools in Thika out of 120, which represents 10% of the total number of secondary schools in the district, were selected for the purpose of the study.

The schools were first divided into three strata; that is, boys, girls and mixed schools. Four schools from each stratum were then selected using simple random technique (Table 3.1). Each school was assigned a number. The numbers were written down on small pieces of paper, which were then folded and placed in three containers



representing each stratum. The researcher then picked at random four schools from each category. In this regard, the names of students in each class register were written down on pieces of paper and put in a basket.

From each school, 16 students were randomly selected for the study, from form two and three classes in which were eight students from each class. Form ones were too new in high school that they could not give honest answers. Form fours were too busy preparing for exams that they could not co-operate.

At least 4 teachers from each school were randomly sampled, giving a total of 48 teachers. The sampling grid is shown in Table 3.1.

**Table 3.1      Distribution of Samples**

<b>School Type</b>	<b>Total number of schools</b>	<b>Schools' sample size</b>	<b>Students' sample size</b>	<b>Teachers' sample size</b>
Boys	4	4	64	16
Girls	10	4	64	16
Mixed	106	4	64	16
<b>Total</b>	<b>120</b>	<b>12</b>	<b>192</b>	<b>48</b>

### **3.7      Research Instruments**

The following instruments were used to collect data.

#### **3.7.1      Questionnaire for Students**

The questionnaires were administered to the students, they contained five sections, A, B, C, D and E. Section A sought to collect demographic data of the respondents. Section B contained questions seeking to establish the major sources of sex education for the students, while section C, D and E sought information on the sexual

knowledge and sexual behaviour respectively. The students were assured that any information given would be used for the purpose of this research only and nothing else.

### **3.7.2 Interview Schedule for the Teachers**

An interview schedule was used to gather information from the teachers on the kind of sexual education they provide to the students, the influence of such education and their suggestion on the best way forward on influencing the desired sexual behaviour change among the adolescents.

### **3.8 Pilot Study**

Pilot study was done to determine the reliability and validity of the instruments. Pilot study helped in modifying and removing any ambiguous items in the instrument. Piloting was done in Broadway secondary schools in Thika District. Thirty students were randomly selected to pilot the students' questionnaire. In addition, one teacher was used to pilot the teachers' interview schedule. The piloted groups were selected from Broadway secondary school within Thika but were not included in the final sample.

### **3.9 Validity and Reliability of the instruments**

According to Nachimias and Nachimias (1996), validity is concerned with the question, "Am I, measuring what I intend to measure?" It is the degree to which results obtained from the analysis of the data actually represent the phenomenon under study (Mugenda & Mugenda, 1999). Assistance was sought from the supervisor and other professionals in validating the value content of the instrument.

Modifications of the themes were then made where necessary. Any item found to be ambiguous in eliciting relevant information was corrected.

Reliability enhances the dependability, accuracy and adequacy of the instruments through piloting. Mugenda and Mugenda, (1999), argue that reliability is a measure of the degree to which a research instrument yields consistent results or data after repeated trials. Nachmias and Nachmias (1996) state that an instrument is reliable when it can measure a variable accurately and consistently and obtain the same results under the same conditions over a time.

To ensure reliability of the research instruments, the test-retest method was applied. This involved administering the same questionnaire at an interval of one week to the same group and then compare the two scores. This was aimed at finding out if the results would be consistent.

### **3.10 Data Collection Procedures**

Permission to carry out the research was obtained from the Office of the President as required by law. Permission and introductory letter to the heads of the institutions were obtained from the District Education Office, Thika. A preliminary visit was then made to the schools to inform the heads of the intended research. A date to administer the instruments was arranged. The researcher administered the instruments personally to respondents, a fact that helped achieve a good return ratio. It also gave the researcher a chance to seek clarification on items that proved difficult.

### **3.11 Data Analysis and Presentation**

This study generated both qualitative and quantitative data; hence both qualitative and quantitative techniques were used to analyze the data obtained. Qualitative analysis

considered the inferences that were made from the opinions of the respondents. This analysis was then thematically presented in narrative form and where possible tabular form. Quantitative data were analyzed using descriptive statistics. Mugenda and Mugenda (1999) assert that the purpose of descriptive statistics is to enable the researcher to meaningfully describe a distribution of scores or measurement using a few indices or statistics.

Descriptive statistics involved the use of frequencies and percentages. Bell (1993) maintains that when making the results known to a variety of readers, percentages have a considerable advantage over more complex statistics. Similarly, Borg and Gall (1989) hold that the percentage is the most widely used and understood standard proportion. Frequency tables, pie charts and bar graphs were used to enhance data presentation. Chi-square tests were used to test the hypotheses of the study. The Chi-Square test is a non-parametric test used to determine the differences in two categorical variables (Martin & Acuna, 2002). The Chi-Square test fitted in this study because the variables (knowledge, sexual behaviour, and sources of sex education information) were categorical in nature.

The process of data analysis required the use of a computer spreadsheet, and for this reason the Statistical Package for Social Sciences (SPSS) was used. As Martin and Acuna (2002) observe, SPSS is able to handle large amount of data, and given its wide spectrum of statistical procedures purposefully designed for social sciences, it is also quite efficient. The analyzed data were used in providing answers to the research questions that the study sought to answer.

The following statistical hypotheses were tested using the statistical tests indicated:

- H<sub>1</sub> There is no significant relationship between the sources of sex education and students' sexual knowledge. - Chi Square test
- H<sub>2</sub> There is no significant relationship between the source of sex education and students' sexual behaviour. - Chi Square test
- H<sub>3</sub> There is no significant difference in sources of sex education across students' gender. - Chi Square test

### **3.12 Ethical Considerations**

The following issues were considered throughout the study:

1. Only consenting adolescents were involved in the study.
2. All data were treated confidentially. Respondents were instructed not to put their names or those of their schools anywhere in the questionnaires for confidentiality purposes.
3. Responses to the interview schedules and questionnaires were purely voluntary.

## **CHAPTER FOUR**

### **DATA PRESENTATION, ANALYSIS AND DISCUSSION**

#### **4.1 Introduction**

This chapter presents the findings of the study. The purpose of the study was to determine the effects of sex education on adolescents' sexual behaviour in secondary schools in Thika District. This was aimed at coming up with the key sources of sex education that could be positively utilized to influence desired sexual behaviour among adolescents. The study aimed at answering the following research questions:

- (a) What is the level of sexual knowledge among adolescents in secondary schools in Thika District?
- (b) What are the major sources of sex education among adolescent secondary school students in Thika District?
- (c) Is there a difference in sources of sex education among sexually active students and those who are not sexually active?

#### **4.2 Demographic Data of Study Participants**

Data for the study was collected from 192 students and 48 teachers selected from 12 secondary schools in Thika District. The students were selected from forms two and three classes. Among the students were 96 (50%) boys and 96 (50%) girls. Table 4.1 shows the age distribution of the students who took part in the study.

**Table 4.1 Age distribution of students**

<b>Age</b>	<b>Frequency</b>	<b>Percent</b>
Between 13-14 years	14	7.3
Between 15-16 years	101	52.6
Between 17-18 years	72	37.5
Nineteen years and above	5	2.6
<b>Total</b>	<b>192</b>	<b>100.0</b>

Table 4.1 shows that majority (101, 52.6%) of the students were lying in the 15-16 years age bracket, followed by 37.5% who were aged between 17 and 18 years. This is the age within which majority of secondary school students, who are adolescents, fall under. Previous studies, for example by Collins et al (2004), have shown that by the age 12 years children have accumulated a lot of information about sex.

#### **4.3 Level of Sexual Knowledge among Students**

One of the goals of the study was to establish the extent to which students in secondary schools in Thika District were exposed to sex education. Sex knowledge is the inculcation of the moral attitude towards sex instincts. It also dispels many myths and superstitions and clarifies the various terms of sexuality. Acquisition of knowledge about sex is important for adolescents to provide them with positive direction and enable them make the right decisions related to sexuality.

The students were presented with 18 items measuring their level of sexual knowledge. For each of the statements the students were required to indicate whether true, false or do not know. Table 4.2 shows their responses.

**Table 4.2: Students knowledge on sexual topics**

<b>statement</b>	<b>True</b>	<b>False</b>	<b>I Don't Know</b>
(a) The safest time to have an abortion is anytime up to until the baby is born	8.3	71.4	20.3
(b) During sex, using a condom is the best way of avoiding STD	37.0	49.5	13.5
(c) HIV/AIDS is a disease for only those with loose morals	8.3	89.1	2.6
(d) A woman cannot become pregnant on the first sexual encounter	13.0	76.0	10.9
(e) Masturbation is a form of sexual pleasure that does not involve intercourse	64.6	15.1	20.3
(f) Contraceptives are the best way to control pregnancy	40.1	16.7	43.2
(g) A woman is fertile throughout the month	30.2	51.0	18.8
(h) Menstruation is a normal biological process in women	87.5	8.3	4.2
(i) A woman who is menstruating is unclean	34.9	54.7	10.4
(j) One can catch STD through other means other than sexual intercourse	43.2	53.1	3.6
(k) The main method of HIV/AIDS transmission is through blood transfusion	26.0	70.3	3.6
(l) One partner among a married couple can have HIV/AIDS while the other does not yet they have unprotected sex	27.6	60.9	11.5
(m) The only way of confirming ones HIV/AIDS status is through blood test	71.9	21.4	6.8
(n) It is abnormal when adolescent boys' sexual organs enlarge	6.8	88.0	5.2
(o) Wet dreams is abnormal	12.0	84.4	3.6
(p) Only married people can have children	19.8	78.6	1.6
(q) The best way to confirm that a girl is pregnant is by carrying out a test	66.7	29.7	3.6
(r) Only boys who are above 18 years can make a girl pregnant	13.5	83.3	3.1

As shown in Table 4.2, majority (over 50%) of the students indicated that the following statements were true: Masturbation is a form of sexual pleasure that does not involve intercourse (64.6%), menstruation is a normal biological process in women (87.5%), the only way of confirming ones HIV/AIDS status is through blood test (71.9%) and that the best way to confirm that a girl is pregnant is by carrying out a test (66.7%).

On the other hand, majority (over 50%) of the students indicated that following statements were false: The safest time to have an abortion is anytime up to until the baby is born (71.4%), HIV/AIDS is a disease for only those with loose morals (89.1%), a woman cannot become pregnant on the first sexual encounter (76%), a



woman is fertile throughout the month (51%) a woman who is menstruating is unclean (54.7%), one can catch STD through other means other than sexual intercourse (53.1%), the main method of HIV/AIDS transmission is through blood transfusion (70.3%), one partner among a married couple can have HIV/AIDS while the other does not yet they have unprotected sex (60.9%), it is abnormal when adolescent boys' sexual organs enlarge (88%), wet dreams is abnormal (84.4%), only married people can have children (78.6%) and that only boys who are above 18 years can make a girl pregnant (83.3%)

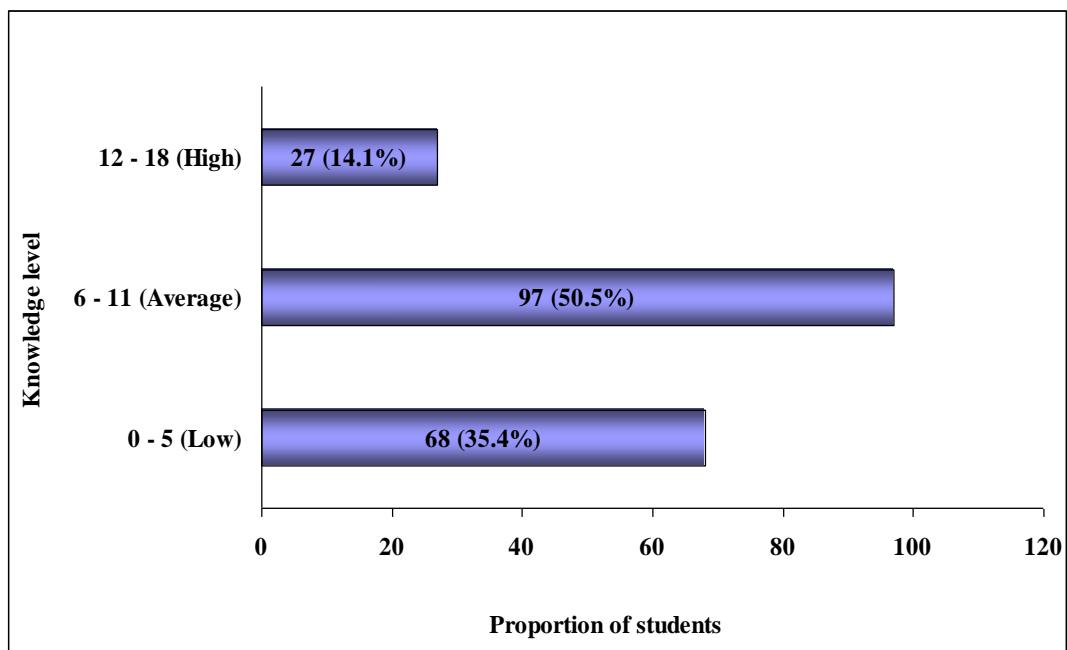
However, a considerable number of students did not know whether the following were true or not: the safest time to have an abortion is anytime up to until the baby is born (20.3%), masturbation is a form of sexual pleasure that does not involve intercourse (20.3%) and that contraceptives are the best way to control pregnancy (43.2%)

Previous studies have shown that adolescents have little knowledge about sex-related issues. For example, Bhan, Mahajan and Sondhi (2004), in a study on awareness regarding sex knowledge among adolescent girls, established that girls had poor level of sex knowledge. They found out that although girls in their study knew about certain topics but were hesitant to talk about them. Literature regarding awareness level of adolescents towards sex related issues indicates that majority of the adolescents are aware of certain aspects of sex education as HIV, AIDS, Menarche, but not much of it, and they also have few misconceptions (Kumar, 1995; Bernard, 1988; Francis, 1997). This could be because they prefer to learn most of sexual issues from peers who are so poorly informed about sexuality that they are scarcely competent teachers for one another. Generally adolescents report greater sexual

activity when they believe that their friends are also sexually active, whether or not they really are.

Based on the responses of the students on the 18 items in table 4.2, an overall knowledge score was computed. The highest score that a student could obtain was 18 (meaning that the student had high knowledge level) while the lowest that one could get was 0 (meaning that the student did not have any information about sex). Figure 4.1 shows how they scored on the sexual knowledge scale.

**Figure 4.1: Students' scores on sexual knowledge scale**



As shown in Figure 4.1, most of the students (50.5%) scored 6-11 on the sexual knowledge scale, indicating that they had average levels of knowledge about sex, 68 (35.4%) scored 0-5 on the scale, indicating that they had low knowledge levels, while 27 (14.1%) scored 12-18 on the scale, indicating that they had high levels of sexual knowledge.

The above findings indicate that quite a large proportion of students did not have adequate knowledge on sexuality. A number of previous studies have shown that

adolescents do not have adequate knowledge on sexuality. Simanski (1998) explains this to result from the fact that many children are not given thorough and reliable sexual information in the home. This could be because parents often feel inhibited and embarrassed when talking about sex and also they lack accurate information. In fact the average person is still poorly informed and unable to communicate fully about sexuality. On the other hand, Garbarino (1985) indicates that most adolescents rely on their peers for information, despite the fact that peers are unreliable sources. Adolescents may have acquired a lot of information about sex, but most of that information is unreliable and wrong.

Table 4.3 shows the responses of teachers on the level of their students' knowledge about sex-related issues.

**Table 4.3: Teachers' views on students' knowledge about sex-related issues**

<b>Level of knowledge</b>	<b>Responses</b>	<b>%</b>
High	14	29.2
Average	24	50.0
Low	10	20.8
<b>Total</b>	<b>48</b>	<b>100.0</b>

Table 4.3 shows that 50% of the teachers rated the level of students' knowledge about sex-related issues to be average, 29.2% rated the level of knowledge high, while 20.8% rated it low. This concurs with the findings from the students that most of them had average levels of sex information. Lack of sex information puts adolescents at risk of teenage pregnancies, contracting STDs and HIV/AIDS. The adolescents' rising interest and curiosity about sex is a motivating factor to acquire information about it. Clashing face to face with the urge to explore sexuality are the preset social norms and taboos. This leads to many conceptions and misinformation resulting in some

daring girls trying to experiment and even become pregnant or bear the brunt of sexually transmitted diseases (STD) (Manju & Renuka, 2006).

#### 4.4 Sources of Sex Education among Students

The reliability and accuracy of the information that adolescents have is dependent on the sources of that information. Garbarino (1985) has shown that although most adolescents get sex information from peers, the information they provide is mostly unreliable, and at times based on myths. It was also important to find out the most prominent sources of sex information for adolescents so that sex education programme developers can know the groups to target for training.

The students were asked to indicate their sources of sex information/education, to which they responded as shown in Table 4.4.

**Table 4.4: Sources of sex information/education: Students' responses**

Source	Responses	%
School	68	35.4
Peer/Friends	125	65.1
Parents	36	18.8
Brother/Sister	49	25.5
Relatives	99	51.6
Church	41	21.4
Media e.g. books, TV, radio, magazine	163	84.9

As shown in Table 4.4, majority (84.9%) of the students indicated that their major sources of sex information/education were the mass media, followed by peers (65.1%), and then relatives (51.6%). Parents were rated the lowest with only 18.8%. The findings are consistent with previous study findings. For example, Fox and Inazu (1980) and Simanski (1998) established that adolescents receive relatively little sex instruction from their parents. Simanski (1998) further indicated that young people are

dissatisfied with sex information available at home, although they would prefer their parents to be the primary source.

The students were provided with a number of issues related to sexuality and asked to indicate the main source of information for each issue. Table 4.5 shows how they responded.

**Table 4.5: Students' major source of information on issues of sexuality**

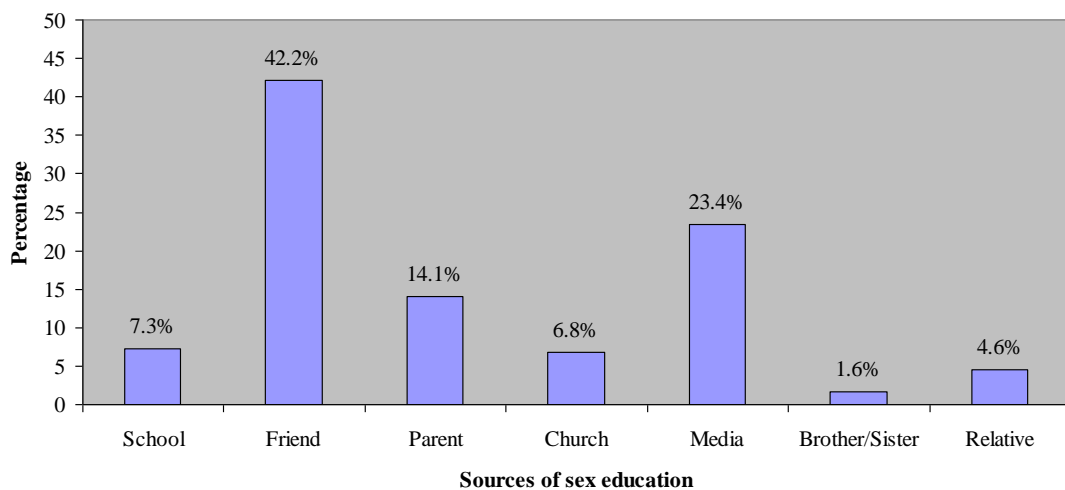
Sexuality issue	School	Friends	Parents	Bro/Sis	Relatives	Church	Media	None
Friendship with opposite sex	22.4	28.1	6.8	0.0	1.6	9.4	26.6	5.2
Sexual intercourse	14.1	20.3	7.8	1.6	0.0	2.6	41.7	12.0
Sexual body changes	40.6	20.3	10.9	2.6	3.6	3.1	13.0	5.7
Virginitv (chastity)	18.2	19.3	17.2	3.6	0.0	17.2	8.9	15.6
Body image (how you look)	13.0	31.8	13.5	1.0	1.0	8.9	6.8	24.0
HIV/AIDS and other STDs	43.2	6.8	5.7	3.1	1.6	5.2	24.5	9.9
Pregnancy and contraception	5.2	39.6	15.1	3.1	0.5	0.5	17.7	18.2
Risks and consequences of sex	41.1	8.3	12.5	2.1	0.0	14.1	17.2	4.7
Kissing	17.7	21.9	6.8	3.1	1.6	2.6	31.8	14.6
Intimate touching	19.8	26.6	5.7	5.7	1.6	3.1	26.6	10.9
Abstinence	27.1	12.5	19.3	1.0	0.5	17.7	15.1	6.8
Dating	9.9	35.4	3.6	4.2	1.0	10.4	16.7	18.8
Abortion	13.5	26.0	5.7	1.6	2.1	2.6	18.2	30.2
Homosexuality/Lesbianism	9.9	28.6	6.8	0.0	0.0	6.3	21.9	26.6

Table 4.5 indicates that for friendship with members of the opposite sex, the students indicated that the main sources of information were friends (28.1%), followed by the mass media (26.6%) and then school (22.4%). For issues related to sexual intercourse, the students indicated that the main sources of information were the mass media (41.7%) followed by friends (20.3%). On sexual body changes, the main sources of information were the school (40.6%) followed by friends (20.3%). There was no single major source of information related to virginitv and chastity, but the leading sources were friends, school, parents and the church.

The main sources of information on body image were friends (31.8%). For HIV/AIDS and other sexually transmitted diseases the main sources of information were the school (43.2%) followed by the mass media (24.5%). The main sources of information for pregnancy and contraception were friends (39.6%) followed by the mass media (17.7%). Similarly for risks and consequences of sex the main sources of information were school (41.1%) and mass media (17.2%). On kissing and intimate touching the main sources were friends and the mass media; while for abstinence the main sources of information were school (27.1%) and parents (19.3%). On issues related to abortion the main sources of information were friends (26%) and mass media (18.2%), while for homosexuality/lesbianism the main sources of information were friends (28.6%) and mass media (21.9%).

Based on the responses of the students, the overall main sources of sex education were computed for all sex-related issues combined. Figure 4.2 shows the main sources.

**Figure 4.2: Main sources of sex education for students**



As shown in Figure 4.2, the main sources of sex education were friends (42.2%), mass media (23.4%) and parents (14.1%). The findings of the study support findings of previous research, which suggests that most adolescents obtain sexual information from media and peers (Garbarino, 1985). Institutions like the school, the church and home should play a major role in provision of sex education for adolescents. Within the home, Rice (1984) indicated that some parents are too embarrassed to discuss the subject, or deal with it in negative ways. This is because many parents have been brought up to feel that all sex is wrong and dirty and they therefore become intensely uncomfortable any time the subject is mentioned. Darling and Hicks (1982) argue that if parents do discuss sex the messages they give their children are negative ones which interfere with sexual satisfaction.

Although school-based sex education can be an important and effective way of enhancing young people's knowledge, attitudes and behaviour, the study established that only 7.3% of the students had obtained sex information from this source. In a review of research, Nyamongo (1995) notes that studies in Argentina, Kenya, Peru and the Philippines, which explored young people's impressions of sex education in schools, showed that majority of students rate the information provided by schools as inadequate. Even where sex education was imparted, teachers focused on discouraging students from sexual activity without pointing out dangers or explaining and teaching safe sex behaviour (Nyamongo, 1995). This could be because sex education has not been incorporated adequately into the school curriculum, that is, it is not done under a guided and organized curriculum.

Chi-square test was used to test the first null hypothesis of the study, which stated:

H<sub>1</sub>: There is no significant relationship between the sources of sex education and sexual knowledge.

The chi-square test formula used for the analysis is as shown below.

$$\chi^2 = \sum \frac{(E - O)^2}{E},$$

Where  $E$  is an expected cell frequency and  $O$  is an observed cell frequency. First, the expected ( $E$ ) frequencies in each cell were calculated under the assumption that there is no association between the variables, by multiplying the row total for the cell by the column total and then dividing by the grand total. The degrees of freedom (df) parameter associated with the chi-square is calculated as  $(r - 1)(c - 1)$ , where  $r$  is the number of rows in the data table and  $c$  is the number of columns.

Using this formula, a chi-square test of independence indicated that sources of sex education were not associated with sexual knowledge of the students,  $\chi (12, N=192) = 7.17, p < .846$  (See Table 4.6).



**Table 4.6: Sources of sex education across levels of sexual knowledge**

Sources of sex information	Sexual knowledge levels			Total
	Low	Average	High	
School	3	8	3	14
Friends	31	38	12	81
Parent	11	14	2	27
Brothers/sisters	1	2	0	3
Relative	2	7	0	9
Church	5	6	2	13
Media	15	22	8	45
<b>Total</b>	<b>68</b>	<b>97</b>	<b>27</b>	<b>192</b>

$$\chi^2 \text{ value} = 7.170; \text{ df} = 12; \text{ significance} = .846$$

As shown in Table 4.6, chi-square test results indicated that adolescents' levels of sexual knowledge did not differ across the main sources of sex education. Therefore, the null hypothesis was accepted that there is no significant relationship between the sources of sex education and sexual knowledge.

This shows that among the various sources of sex information, none was superior to the other in terms of giving reliable knowledge to adolescents. Whichever source is used, literature indicates that there are some basic conditions that a source of sex education should meet. According to Kirby, et al. (1991), effective sex education should instil negotiation skills in young people; promote effective decision-making, assertion and listening.

Other important skills include being able to recognize pressure from other people and to resist them, deal with and challenge prejudice, seek help from adults, community and health and welfare services. Effective sex education should also equip young people with skills to be able to differentiate between accurate and inaccurate

information, discuss a range of moral and social issues and perspective on sex and sexuality (Kirby, et al., 1991).

The teachers who participated in the study were asked to indicate how they conducted sex education in their schools, to which they responded as shown in Table 4.7.

**Table 4.7: Ways in which teachers conducted sex education**

<b>Methods of conducting sex education</b>	<b>Frequency</b>	<b>Percent</b>
Through guidance and counselling	42	87.5
Through other subjects, for example, Biology and CRE	32	66.7
Interpersonal interactions with students	27	56.3
By inviting guest speakers during their YCS and CU meetings	16	33.3
By talking to boys and girls separately at selected times	13	27.1
Through life skill lessons	12	25.0
By integrating the subject during the normal teaching	11	22.9
Through participation in drama and music festivals	8	16.7
Use of short assembly speeches	4	8.3

As shown in Table 4.7, the main methods through which teachers conducted sex education were guidance and counselling (87.5%), through other subjects like Biology and CRE (66.7%), and through interpersonal interactions with the students (56.3%). Apart from the methods shown in the table, the teachers indicated that other major sources of sex education for students were: Through peer counselling club, through religious organizations, inviting speakers and facilitators through the counselling department, through magazines and other available literature, arranging for seminars and workshops, church, debates, contests and peers, radio/TV programmes, through societies and chill clubs and through drama and music festivals

Though guidance and counselling is the main method through which teachers conduct sex education, it is clear that it is not done under a guided and organized curriculum and most of the time it is done only when a student has been found engaging in sexual

activities. This trend has to change if this method is expected to yield desirable results.

#### **4.5 Sources of Sex Education among Sexually Active and Non-Sexually Active Students**

The study sought to find out whether there were differences in sources of sex education among sexually active students and those who are not sexually active. If adolescents receive sex information from unreliable sources, they are likely to engage in unsafe sex behaviours. According to Halpern, Kamathi, and Owino (2006), a majority of young people in Africa have woefully inaccurate sexuality knowledge. Similarly, Kelly (2001) indicates that researchers, sexuality educators, and other groups working in the field of adolescent sexual and reproductive health in Africa consider poor sexuality knowledge to be the major reason why the triple tragedy of HIV/AIDS, unwanted teenage pregnancy, and unsafe induced abortion continues to have its highest number of victims among young people from the continent.

One common and oft-given explanation why adolescents in Africa have deficient sexuality knowledge is that they primarily rely on equally uninformed and ignorant peers for their education and information on sexuality (Population Reference Bureau, 2001). To confirm this, the study aimed at establishing whether there were differences in sources of sex education among sexually active students and those who are not sexually active.

A total of 131 (68.2%) reported that they had previously dated with a friend of the opposite sex. Asked what activities they engaged in during the date, they responded as shown in Table 4.8.

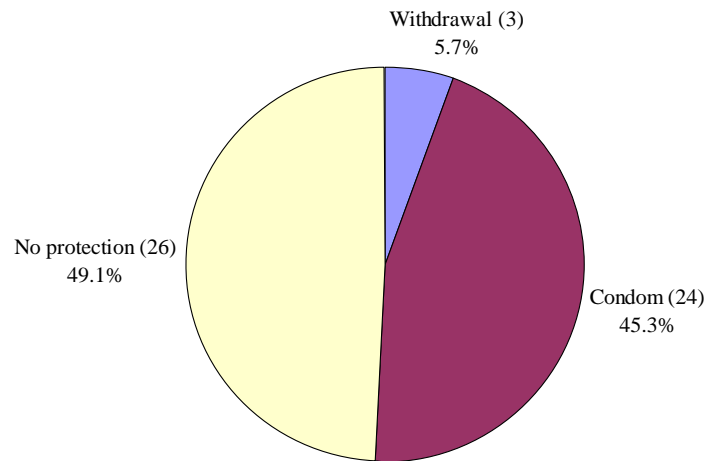
**Table 4.8: Activities students engaged in during their date with opposite sex**

Activity engaged in	Number of students	%
Holding hands	69	35.9
Intimate conversation	47	24.5
Kissing	57	29.7
Sexual intercourse	23	12.0
Sharing personal experiences	87	45.3
Fondling	12	6.3

Table 4.8 shows that the students shared personal experiences (45.3%), held hands (35.9%) and others engaged in kissing (29.7%), intimate conversations (24.5%), sexual intercourse (12.0%) and fondling (6.3%).

Out of 192 students who participated in the study, 53 (27.6%) agreed that they have had sexual intercourse with a partner of the opposite sex. Of these, 16 (30.2%) had the first intercourse when they were below 9 years, 15 (28.3%) were between the ages 10-13 years, while 22 (41.5%) at the age of 15-17 years. These findings are consistent with results from previous studies. Kaaya et al. (2002) found out that the proportion of sexually active adolescents in Kenya is 48% for boys and 17% for girls. Other sources have shown higher findings. For example, Kamaara (1999), quoting data from African Medical Research Foundation (AMREF) and the Centre for the Study of Adolescents (CSA), estimated that over 80% of young people in Kenya are sexually active by the age of 24. Of these, 4% have sexual relations by the age of 10 and about 55% become pregnant by the age of 20. Over 50% of those who are sexually active have multiple sex partners. This shows that the issue of risky sexual behaviours among adolescents is a serious one, considering the rising cases of HIV/AIDS in the country.

Out of the 53 (27.6%) students who had sexual intercourse, 27 (50.9%) reported that they used various forms of protection during the intercourse, as shown in Figure 4.3.

**Figure 4.3: Proportion of sexually active students who used protection**

As shown in Figure 4.3, a significant number of students (49.1%) did not use any form of protection. Twenty four (45.3%) of the students used condoms, while 3 (5.7%) used withdrawal method. This shows that quite a large number (54.7%) of adolescents who are sexually active do not use protection. This includes the 5.7% who reported to use withdrawal method, which does not protect one from contracting HIV/AIDS and STDs, and is not a reliable method to control pregnancy. According to the Centres for Disease Control and Prevention (2003), adolescent students are at high risk of contracting sexually transmitted diseases, including HIV/AIDS, due to the high frequency of unprotected sexual activity. Use of condoms as a protective behaviour has been inconsistent during this stage. This reveals the critical need for a guided and organized curriculum on sex education in public schools.

Chi-square test was used to test the second null hypothesis of the study, which stated:

H<sub>2</sub>: There is no significant relationship between the sources of sex education and students' sexual behaviour.

A chi-square test of independence indicated that sources of sex education were not associated with sexual behavior of the students,  $\chi^2(6, N=192) = 4.050, p < .670$  (See Table 4.9).

**Table 4.9: Sources of sex education for sexually active and non-sexually active adolescents**

Sources of sex education	Sexually active	Not sexually active	Total
School	5	9	14
Friend	23	58	81
Parent	9	18	27
Brother/sister	1	2	3
Relative	2	7	9
Church	5	8	13
Media	8	37	45
<b>Total</b>	<b>53</b>	<b>139</b>	<b>192</b>

$$\chi^2 \text{ value} = 4.050; \text{df} = 6; \text{significance} = .670$$

Chi-square test results presented in Table 4.9 indicate that sexually active and non-sexually active students did not differ significantly in their sources of sex education. Therefore, the null hypothesis was accepted that there is no significant relationship between the sources of sex education and students' sexual behaviour.

This shows that the sources of sex information used by adolescents have not been successful in assisting them make the right decisions regarding sex. The issue of success of sex education programmes in promoting safe sex practices has not been resolved through research. While one study (Taylor, Wang, Jack & Adame, 1989) reported that neither the presence nor absence of contraceptive education in a sample of high school students was correlated with the students' contraceptive behaviours,

another (Kvalem, Sundet, Rivo, Eilertsen & Bakketeig, 1996) reported that a school-based sex education program seemed to have a positive effect on the students' condom use. Further research is needed to reconcile these conflicting study findings. In particular, it would be important to find out the correlates of an effective sex education programme.

Chi-square test was conducted to test the third null hypothesis of the study, which stated:

H<sub>3</sub>: There is no significant difference in sources of sex education across students' gender.

A chi-square test of independence indicated that sources of sex education were not associated with gender of the students,  $\chi^2(6, N=192) = 2.023, p < .918$  (See Table 4.10).

**Table 4.10: Sources of sex education across gender of the adolescents**

Sources of sex education	Boys	Girls	Total
School	5	9	14
Friend	34	47	81
Parent	14	13	27
Brother/sister	1	2	3
Relative	3	6	9
Church	5	8	13
Media	17	28	45
<b>Total</b>	<b>79</b>	<b>113</b>	<b>192</b>

$$\chi^2 \text{ value} = 2.023; \text{df} = 6; \text{significance} = .918$$

As shown in Table 4.10, chi-square test results indicated that there were no significant differences in adolescents' sources of sex education across gender. Therefore, the null

hypothesis was accepted that there is no significant difference in sources of sex education across students' gender.

A few studies have been conducted on the sources of sex education used by boys and girls. In one study, Kehily (1999), through participant observation, discovered that young girls read magazines to learn about sex. Kehily conducted a study with a middle-school aged male peer group and concluded that in this group, movies were the source of learning and sharing about male sexuality. Similar trends are expected in Kenya, where pornographic literature and films are widely circulated without much control by government authorities.

Thirty-six (75%) teachers reported that sexual activity among students was on the increase while 12 (25%) reported it was on the decrease. When asked the major reasons for increasing/decreasing cases of sexual activity, the teachers gave the reasons indicated in Table 4.11.



**Table 4.11: Teachers views on reasons why sexual activity among students were increasing/decreasing**

<b>Reasons for increase in sexual activity</b>	<b>Responses</b>	<b>%</b>
Exposure to pornography and contraceptives	28	58.3
Influence from mass media	27	56.3
Lack of proper and adequate counselling	21	43.8
Lack of role models to emulate	17	35.4
Peer influence	16	33.3
Irresponsible parenthood	11	22.9
Permissiveness of the society	11	22.9
Too much freedom	9	18.8
Use of drugs	4	8.3
Cultural/social reasons	1	2.1
<b>Reasons for decrease in sexual activity</b>	<b>Responses</b>	<b>%</b>
Fear of contracting HIV/AIDS or getting pregnant	9	18.8
Intensified involvement in co-curricular activities	6	12.5
Students have adequate knowledge on the consequences	4	8.3
Limited opportunity for interaction after classes	4	8.3
Sex education	3	6.3
Consequences are tough on those caught	2	4.2
Students advice and counsel one another	2	4.2

As shown in Table 4.11, teachers were of the view that sexual activity among the students was on the increase due to exposure to pornography and contraceptives (58.3%), influence from mass media (56.3%), lack of proper and adequate counselling (43.8%), and lack of role models (35.4%) among others.

Some of the teachers indicated that sexual activity had been decreasing as a result of fear of contracting HIV/AIDS or getting pregnant (18.8%), involvement in co-

curricular activities (12.5%), and increased knowledge on consequences of engaging in sex (8.3%) among others.

The teachers were asked to indicate how secondary schools could improve delivery of sex education to foster development of positive sexual behaviour and attitudes among students. They suggested the following measures: advice students to avoid bad company, engage students in more occupying activities, teach life skills, inclusion in the syllabus, involve other people other than their teachers, use of audio-visual, set good role models, create monthly talks and questions/answers sessions of at least two hours, school administration to arrange for seminars and workshops in a different set-up for students and have facilitators from outside the school, introduction of discussions and debates, introduce more exposure through reading materials, compliment sex education with movies showing negative impact of sexual activities among the adolescents, demystify sex education, incorporating sex education in the syllabus and all teachers should participate in educating the students. It should not be left to the guidance and counselling department only.

From the findings, it is clear that parents and the schools are not a prominent source of sex education for adolescents. Adolescents prefer using peers as their main source and this brings a lot of problems because they are also equally uninformed about sexuality. Institutions like the school, the church and the home should play a major role in providing sex education for adolescents if the desired positive effects are going to be achieved.

## **CHAPTER FIVE**

### **SUMMARY, CONCLUSION AND RECOMMENDATIONS**

#### **5.1 Introduction**

This chapter presents a summary of the study, conclusions, and recommendations arrived at. The chapter also gives suggestions for further studies that could be carried out in future.

#### **5.2 Summary of the Findings**

The purpose of the study was to determine the effects of sex education on adolescents' sexual behaviour in secondary schools in Thika District. Data for the study was collected from 192 students and 48 teachers selected from 12 secondary schools in Thika District. The students were selected from forms two and three classes. Among the students were 96 (50%) boys and 96 (50%) girls. Given below is a summary of the key study findings.

A large proportion of students did not have adequate knowledge on sexuality. Most of the students (50.5%) had average knowledge about sex, 68 (35.4%) had low knowledge levels, while 27 (14.1%) had high levels of sexual knowledge. Fifty (50%) of the teachers rated the level of students' knowledge about sex-related issues to be average, 29.2% rated the level of knowledge high, while 20.8% rated it low.

Majority (84.9%) of the students indicated that their major sources of sex information/education were the mass media, followed by peers (65.1%), and then relatives (51.6%). Parents were rated the lowest with only 18.8% indicating them as a main source of sex education. Chi-square test results indicated that adolescents' levels of sexual knowledge did not differ across the main sources of sex education. This

shows that among the various sources of sex information, none was superior to the other in terms of giving reliable knowledge to adolescents.

The main methods through which teachers conducted sex education included guidance and counselling (87.5%), through other subjects like Biology and CRE (66.7%), and through interpersonal interactions with the students (56.3%). Other major sources of sex education for students were: through peer counselling club, through religious organizations; inviting speakers and facilitators through the counselling department; through magazines and other available literature; arranging for seminars and workshops; church, debates, contests and peers; Radio/TV programmes; through societies and chill clubs; and drama and music festivals.

A total of 131 (68.2%) reported that they had previously dated with a friend of the opposite sex. Fifty-three (27.6%) of the students agreed that they have had sexual intercourse with a partner of the opposite sex. Of these, 16 (30.2%) had the first intercourse when they were below 9 years, 15 (28.3%) were between the ages 10-13 years, while 22 (41.5%) at the age of 15-17 years. A significant number of students (49.1%) did not use any form of protection. Twenty four (45.3%) of the students used condoms, while 3 (5.7%) used withdrawal method. This shows that quite a large number (54.7%) of adolescents who are sexually active do not use protection. This includes the 5.7% who reported to use withdrawal method, which does not protect one from contracting HIV/AIDS and STDs, and is not a reliable method to control pregnancy.

Chi-square test results indicated that sexually active and non-sexually active students did not differ significantly in their sources of sex education. This shows that the sources of sex information used by adolescents have not been successful in assisting them make the right decisions regarding sex. Further, chi-square test results indicated

that there were no significant gender differences in adolescents' sources of sex education across gender.

Teachers were of the view that sexual activity among the students was on the increase due to exposure to pornography and contraceptives (58.3%), influence from mass media (56.3%), lack of proper and adequate counselling (43.8%), and lack of role models (35.4%) among others. On the other hand, some of the teachers indicated that sexual activity had been decreasing as a result of fear of contracting HIV/AIDS or getting pregnant (18.8%), involvement in co-curricular activities (12.5%), and increased knowledge on consequences of engaging in sex (8.3%) among others.

### **5.3 Conclusion**

The study established that the main sources of sex education were peers and the mass media. Parents and school were rated among the lowest with sources of sex education. Based on the findings of the study, the researcher concludes that adolescents in secondary schools in Thika District do not have adequate information about sex. This can be attributed to over-reliance on peers for information about sex, and, because information from peers can be unreliable, most of the information that the adolescents have is often misleading. Consequently, most of the sexually active students do not use any form of protection during sexual intercourse, and this exposes them to the risk of contracting HIV/AIDS, sexually transmitted diseases, or getting unwanted pregnancies, which can result to school dropout or health complications as young girls attempt abortion. Other adolescents practice unreliable protection methods such as the withdrawal method due to lack of information. Withdrawal method is a method that does not protect one from contracting HIV/AIDS and STDs, and is not a reliable method to control pregnancy, yet some adolescents in the study indicated that it was the method they use. In light of this, it is important that the government, schools, non-

governmental organizations, and the community design effective sex education programmes targeting adolescents.

#### **5.4 Recommendations**

Based on the study findings, the researcher recommends the following: -

1. Parents should be sensitized about the whole question of adolescents' sexuality so that they can be more involved in teaching them about the same.
2. The education system should put into consideration the idea of incorporating sex education into the school curriculum.
3. The community should work hand in hand with community-based organisations and NGOs to educate the adolescents on responsible sex behaviour.
4. The church should play a more active role in educating the adolescents/adolescents on sex education.
5. Since most adolescents prefer getting their information concerning sex from their fellow peers, all the parties should make effort to train the adolescents in order to ensure that they give right information to each other.

#### **5.5 Suggestions for Further Studies**

1. A similar study could be carried out in other parts of the country to find out whether the findings of this study are replicable.
2. This study covered public secondary schools in Thika district. A study needs to be carried out covering private secondary schools to see whether the study findings tally with those ones of public secondary schools.

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and contraception										
Risks and consequences of sex										
Kissing										
Intimate touching										
Abstinence										
Dating										
Abortion										
Homosexualit y/Lesbianism										

### SECTION C: SEXUAL KNOWLEDGE

6. Rate your Knowledge towards the following sexual topics

ITEM	True	False	Don't Know
Dating is a game			
The safest time to have an abortion is anytime up to until the baby is born			
During sex, using a condom is the best way of avoiding STD (Sexually Transmitted Diseases)			
Sperm retain their ability to fertilize (cause pregnancy) for one to two days following ejaculation (release)			
HIV/AIDS is a disease for only those with loose morals			
A woman cannot become pregnant on the first sexual encounter			
Masturbation is a form of sexual pleasure that does not involve intercourse			
Contraceptives control pregnancy			
A woman is fertile throughout the month			
Menstruation is a normal biological process in women			
A woman who is menstruating is unclean			
One can catch STD through other means other than sexual intercourse			
The main method of HIV/AIDS transmission is through blood transfusion			
One partner among a married couple can have HIV/AIDS while the other does not yet they have unprotected sex			
The only way of confirming ones HIV/AIDS status is through blood test			
It is abnormal when adolescent boys' sexual organs enlarge			
Wet dreams is abnormal (ejaculating while dreaming about sexual action)			

Only married people can have children			
The best way to confirm that a girl is pregnant is by carrying out a pregnancy test			
Only boys who are above 18 years can make a girl pregnant			

### SECTION D: SEXUAL BEHAVIOUR

7. Have you dated a member of the opposite sex

Yes	
No	

8. What activity did you engage in during the date

Holding hands	
Intimate conversation	
Kissing	
Sexual intercourse	
Sharing personal experiences	
Fondling	
Others (specify)	

9 What would you be satisfied with?

First sexual encounter	
Virginity	

10. Have you ever had sexual intercourse with a partner of opposite sex

Yes	
No	

11. If yes, what was your age at first sexual encounter?

Below 9 years	
10-13 years	
15-17 years	

12. Did you use any form of protection during the sexual intercourse

Yes	
No	

13. If yes, what kind of protection

Withdrawal	
Condom	

**APPENDIX II****INTERVIEW SCHEDULE FOR TEACHERS**

1. How do teachers in this school conduct sex education?
  
2. Other than through teachers, what are the other major sources of sex education for students in this school?
  
3. What is the level of sexual knowledge among students in this school?
  
4. According to your observations, is sexual activity among students on the increase or decrease? What are the major reasons for rising/decreasing cases of sexual activity among students?
  
5. How can secondary schools improve delivery of sex education to foster development of positive sexual behaviour and attitudes among students?