



UNIVERSITY of  
RWANDA

**UNIVERSITY OF RWANDA**

**COLLÈGE OF MEDICINE AND HEALTH SCIENCES**

**SCHOOL OF PUBLIC HEALTH**

**SEXUAL ACTIVITY AND ITS ASSOCIATED FACTORS  
AMONG ADVANCED LEVEL STUDENTS  
A CASE STUDY OF COLLÈGE SAINT ANDRÉ**

A Dissertation submitted in Partial Fulfillment of Requirements for the Master's  
of science epidemiology

By

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**Kigali September, 2019**

## DECLARATION

I declare that this dissertation contains my own work except where specifically acknowledged, and it has been passed through the anti-plagiarism system and found to be complaint and this is the approved final version of the thesis.

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Signed \_\_\_\_\_

Date \_\_\_\_\_

Main supervisor: **Associate professor Manassé NZAYIRAMBAHO, PhD**

Signed \_\_\_\_\_

Date \_\_\_\_\_

## **DEDICATION**

To my family

To my classmates

To all friends and relatives

## **ACKNOWLEDGEMENT**

The achievement of this final research project was due to the combined efforts from different individuals who directly or indirectly rendered their supports. I firstly thank the Almighty God, for it is not because of my might that I have completed this study, but because of His Power. May His Name be glorified forever.

I would like to outspread my appreciations to the University of Rwanda, Collège of Medicine and Health Sciences, school of public health authorities and lecturers who hosted research project with their everlasting efforts and upkeep towards the realization of this study. I would like to straight inmost gratitude to my supervisor Associate professor Manassé NZAYIRAMBAHO, PhD, whose untiring exertion has made this daydream representativeness. Lyrics cannot express my forthright thankfulness for your endless support during the research period. May the Lord reward your exertion!

Essentially thanks to the Principal of Collège Saint André, Dean of Studies, Teachers and Students of Collège Saint André for their information offered in the all process of this work. Your motivations are incomparable for me, thank you.

An exact huge notes of appreciations goes to my beloved wife NATUMWE Louise and our blessed children NDAGIJIMANA SHEMA Christian and ISHIMWE Ange Ornella. Special thanks to our father KAYOBERA Juvénal and all relatives. Yours treasured inspiration and advices, moral and financial support, your special contributions will never be disremembered. Without your support, this work would have been a dream. Vital credit goes to my closest friends and all my mates forever you are my brainwave.

God bless you all.

**NDAGIJIMANA Emmanuel**

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## **LIST OF ACRONYMS AND ABBREVIATIONS**

<b>BSS</b>	: Behavioral Surveillance Survey
<b>CC</b>	: Cervical Cancer
<b>DVD</b>	: Digital Versatile Disc
<b>HIV/AIDS</b>	: Human immune Virus/Acquired Immune Deficiency Syndrome
<b>HPV</b>	: Human Papilloma Virus
<b>IARC</b>	: International Agency for Research on Cancer
<b>ICO</b>	: Institut Catala ` d'Oncologia
<b>SCT</b>	: Social Cognitive Theory
<b>STDs</b>	: Sexual Transmitted Diseases
<b>STIs</b>	: Sexual Transmitted Infections
<b>UNAIDS</b>	: United Nations for Acquired Immune Deficiency Syndrome
<b>UNICEF</b>	: United Nations International Children's Emergency Fun
<b>USA</b>	: United State of America

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## **ABSTRACT**

**Introduction:** Rwanda, like many other countries, is trying to cope with the problem of sexual behavior especially in young population on the same scale as drug abuse or alcohol. In Rwanda, especially in Collège Saint André, no study has been conducted to explore the magnitude of early sexuality among advanced (A) level students.

This study aimed to establish the level of sexual activity among A level students and to identify the factors associated with sexual activity

**Methods:** This study was descriptive and analytic, cross-sectional, targeting A level students at Collège Saint André (Senior4 – Senior 6). Data were collected by means of questionnaires from 263 students randomly selected. **Results:** 41.1% of respondents have ever had at least one sex intercourse. Also 47% of male students have had sexual activity compared to 30% of female. The logistic regression analysis showed that the factors associated with sexual activity are the following: religion of students (catholic and Protestants), class performance and education of parents.

56.9 % of those who had sex intercourse were pushed by the curiosity, desire to know, and the discovery purposes followed by 13.8% of those who motivated to have sexual intercourse by gift. 47.7% of all students involved in sexual activities reported that they have used contracteptive method, mainly condom, for avoiding unwanted pregnancies.

**Conclusion:** students have engaged in sexual activities within their adolecence at a relative high rate. There is a need to promote specific intervention programmes built upon the identified factors which are associated with an increased likelihood for early sexual introduction and risky sexual behaviour.

## CHAPTER ONE : INTRODUCTION

### 1.1. DEFINITION OF KEY TERMS

- **Sex behavior:** The action that lead to reproduction and stimulation of sex organs for satisfaction without conception.It can oriente one it courting, sex positions and genital reflexes (Papaharitou S., 2011).
- **Sexual activity/sexual intercourse:** Act in which the male reproductive organ ‘penis’ is made to penetrate the female reproductive organ ‘vagina’.Various sexual activities lead to psychological/ physiological changes that progress to orgasm and resolution as sex response.If it is completed; semem passes from the male into the female’s body (Wepukhulu, 2012).
- **Adolescents:** This term refers to the school going age category from 13 to 19 years or those who are currently studying. According to the American Heritage Medical Dictionary an adolescent is a young person who has undergone puberty but has not reached full maturity (Adler, 2012). Adolescence is defined as the period from the onset of puberty to the termination of physical growth and attainment of final adult height and characteristics that occurs during the second decade of life. It is characterized by rapid physical growth, significant physical and psy- chological changes, and evolving personal relationships (Laddunuri, 2013). Adolescence and the great and rapid changes associated with it may have major effects on the health of individuals, and, conversely, variations in health May significantly affect the transitions of adolescence. Thus, data on how young people move through adolescence, and factors that influence the success of and difficulty with this transition should include measures and indicators of health (Cooney, 2010).
- **Early sex intercourse:** Any sexual intercourse / action had before the age of 18 years. Sometimes this attitude is seen associated with the consumption of alcoholic beverages, tobacco and various other kinds of drugs or socio-economic status, other cases occur by rape. According to some studies, early sexual debut commonly defined as having had first sexual intercourse at or before age 14. Young people today are too exposed to the practice of early sexual intercourse for several reasons including increased development that challenges the most. (Watching TV, movies dissatisfaction in standard life and so one.) This term refers to the final step for adolescents in expressing their sexual desire with their opposite sex without any binding rules such as by law and religion (Bliss Kaneshiro, 2017).

## **1.2. Background**

Adolescence, between 13 and 19 years, is marked by the maturation of physical and psychological characteristics. According to the United Nations International Children's Emergency Fund (UNICEF), adolescence can be categorized by three stages such as 10-13 years old as early adolescents, 14-16 years old as middle adolescents, and 17-19 years old as late adolescents (Cooney, 2010). During this period of transition from childhood to adulthood, physical maturity precedes psychological and social maturity. Adolescents consequently begin to indulge in risky sexual behavior, often with adverse consequences for the individual as well as the family and the community (Laddunuri, 2013).

Empirical evidence indicates that sexually active young people experienced their first sexual encounter at the average age of 17 years. The results of the study conducted in Botswana show that 90% of the girls between 10 to 14 years old stated that their first sexual experience was unplanned where as 50% of the boys indicated that they had planned the sex in advance (Dewaele, 2017). More than 50% of older girls between 15 and 24 years stated that their first sexual experience had been unplanned. Condom use at first intercourse was observed to be higher as the level of education increased. Unfortunately 50% of all sexually active teenage girls became pregnant. This figure was generally attributed to significant peer pressure to engage in sex. Adolescent pregnancy was found to be the major problem and responsible of school dropping-outs each year (Laddunuri, 2013).

According to the same study, one of the main causes for unwanted pregnancies is poverty among little girls who become an easy prey for those who entice them with gifts in order to sexually abuse them. The lack of basic needs lead girls to accept gifts from anyone who may involve them into sexual abuse. In fact, 78.2% of study participants did not get money to satisfy schooling needs. It also indicated that 30.6% received money from old people who are likely to lure them into sex abuse (Twa-Twa, 1997).

An important reason why adolescents have sexual relations with older men is because they see them as financial providers of their basic needs and social status symbols like cell phones and cash, or others diverse gifts. They do not however realize that they make themselves very vulnerable to these men. This group of population is at high risk and is exposed to many sort of sexual transmissible diseases as HIV which is estimated at 10% among sexually active adolescents (Adler, 2012).

The survey conducted in Brazzaville included 900 children (389 boys and 511 girls) from 10 to 19 years, belonging to the seven districts of this country shown that the early reports (before age 14) was found in 73 boys and 39 girls ( $p < 0.001$ ). Multiple partners proved

almost constant among boys (81.3%), whereas this practice was observed in 51.1 % of girls. Among the risk factors for pregnancy and multiple partners, were the lack of employment for the mother, schooling, early menarche and lack of sex education recent sero-prevalence data indicate that infection rates are higher among female youth than among their male counterparts. In addition, 102 girls (36.8 %) had contacted a pregnancy at an average age of  $16.1 \pm 1.2$  years, and in case of an unwanted pregnancy (93.1%), an abortion had been performed in 64.7 % of cases. Finally, the dropout rate recorded during a pregnancy was 82.4 % (Babela, 2008).

For example, as other consequences of early sex intercourse, UNAIDS estimates for 1999 show that between 9% and 12% of female youth aged 15–24 years are seropositive while 3.5% to 7% of male youth are seropositive. With an estimated 70% of the population under 25 years of age, the potential impact of HIV/AIDS on the future of Rwanda is staggering. In Uganda the cross sectional study was conducted in 1997 among aged 15-17years olds 34% of girls and 27% of boys had sex and shown that the median age at first sexual intercourse for young girls aged 15-19 years is 17.1 years when for young men is 18.3 years (Twa-Twa, 1997).

Social and demographic factors other than education connected to a risk of pregnancy among adolescents are family structures, satisfying relations within the family, peer influence, traditional early marriages and economic factors. The proportion of sexually experienced adolescents aged 15-19 who were currently sexually active was 76% for females and 57% for males. This indicated the possible use of sex to fulfill economic needs. From this found we can confirm that economic pressures can also have a bearing on early sexual activity (Bliss Kaneshiro, 2017).

Actually many Rwandan youth engage in sexual behaviors that exposes them to the risk of HIV infection and all sort of sexual transmitted diseases such as Gonorrhoea, Syphilis, Papillomavirus which is the main cause of Cervix cancer ect.....the list is not exhaustive. Existing literature shows evidence of early sexual experimentation coupled with limited condom use among both boys and girls. Through the finds of the 2000 Behavioral Surveillance Survey (BSS), about 29% of male youth aged 15–19 years and more than 12% of their female counterparts have had sex when data have shown that among the sexually active, 7 out of 10 boys and 4 out of 5 girls are already sexually initiated before 15 years of age. Other study revealed that only about 16% of sexually active male youth aged 15–19 years and 12% of their female counterparts have ever used a condom (Papaharitou S., 2011).

Researchers have identified factors that predispose young people to early onset of sexual intercourse, including biological factors (e.g., gender, age pubertal timing, testosterone levels) social factors (e.g., poverty, violence, family marital disruption, lack of family connectedness, parents' lack of education, lack of parental supervision, lack of religious affiliation, substance use, peer pressure, sexual abuse, poor academic performance, low educational expectations), and factors associated with attitudes and beliefs including personal values, perceived norms and intentions. Additional factors that have been identified include the influence of the media, low self-esteem and self-efficacy, hopelessness, mother's early sexual intercourse, teens' perceptions of parents' rules and attitudes, and single mother-headed households. However, little is known as to the factors associated with early sex intercourse among youth in Rwanda (Williams T, 2012).

### **1.3. Problem statement**

Rwanda, like many other countries, is trying to cope with the problem of sexual behavior especially in young population on the same scale as drug abuse or alcohol. This is because young people engage too early in sexual activities which has a negative impact on the population in general and specifically on reproductive health (Gibbs A, 2012). Moreover, young people will be colonized by sexually transmitted diseases while girls will have unwanted pregnancies in addition, with psychosocial and economic problems that will rise in their families. Therefore it remains a challenge for the country to manage the current situation as it can cause under development of the country (Williams T, 2012).

A number of conflicts have been observed between children and parents whereby children accuse parents for not providing them with education about reproductive health. In Rwanda, especially in Collège Saint André, no study has been conducted to explore the magnitude of early sexuality among advanced (A) level students. And the successful fight against this issue need the identification of associated factors in order to focus interventional strategies. The study was conducted to identify factors associated with early sexual engagements and so fill the existing gaps about the topic.

### **1.4. Research questions**

1. What is the level of sexual activity among A level students at Collège Saint André?
2. What are the main factors associated to sexual activity in A level students at Collège Saint André?
3. What are the contraceptive methods used and reasons of engaging in sexual activity among A level students at Collège Saint André?

## **1.5. Objectives of the study**

### **1.5.1. General Objective**

The main objective of this study was to assess the magnitude of sexual activity among A level students at Collège Saint André

### **1.5.2. Specific objectives:**

1. To establish the level of sexual activity among A level students at Collège Saint André
2. To identify the factors associated with sexual activity among A level students at Collège Saint André
3. To identify the contraceptive methods used and reasons of engaging in sexual activity among A level students at Collège Saint André

## **1.6. Rationale of the study**

In the light of the results of our study, abled to have information on the precocity and frequency of sexual intercourse among A level students and their knowledge about reproductive health.

This study was conducted in A level students meaning 4<sup>th</sup> , 5<sup>th</sup> and 6<sup>th</sup> years of secondary school because at this level the majority is exposed to many risks, so that after we can suggest the effective way to intervene before our children are involved in sexuality with all its risks and consequences. we belief this study will contribute to the development of our country because many advantages are associated to the prevention of early sexuality given that this group of students is among the most active population the country can rely on for the development.



## **CHAPTER TWO: LITERATURE REVIEW**

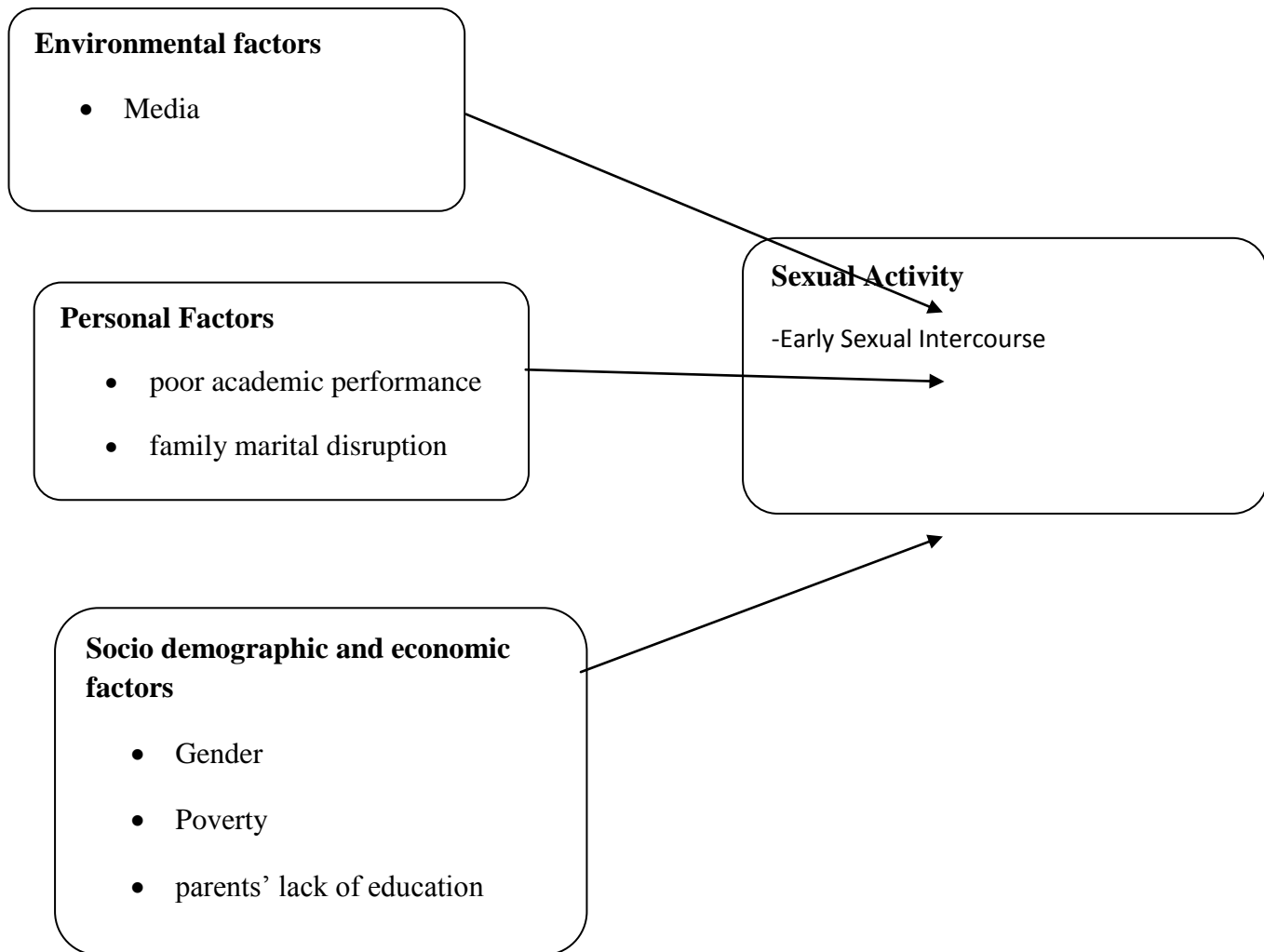
### **2.1. General Review**

Researchers have identified factors that predispose young people to early onset of sexual intercourse, including biological factors (e.g., gender, age pubertal timing, testosterone levels), social factors (e.g., poverty, violence, family marital disruption, lack of family connectedness, parents' lack of education, lack of parental supervision, lack of religious affiliation, substance use, peer pressure, sexual abuse, poor academic performance, low educational expectations), and factors associated with attitudes and beliefs including personal values and perceived norms and intentions (M'lurhe ABELA, 2015).

Additional factors that have been identified include the influence of the media, low self-esteem and self-efficacy, hopelessness, mother's early sexual intercourse, teens' perceptions of parents' rules and attitudes, and single mother-headed households. Furthermore, Jessor found that psychological variables or values such as value of independence, tolerance for deviance, and lower value on academic achievement were associated with early onset of sex intercourse. There is growing concern internationally regarding early sexual intercourse among adolescents (Sieving RE, 2006).

In this, the major concern is based on the impact occasioned by early sexual practices, in its risks we encounter a whole series of diseases and other consequences as unwanted pregnancy, STIs, school dropout. Others data show clearly the adverse impact of early sexual intercourse to include sexually transmitted diseases, increased risk of cervical cancer, pelvic inflammatory disease, compromised future fertility, once again unwanted pregnancy, low educational attainment, greater social isolation, and compromised economic future (Gibbs A, 2012).

On Social Cognitive Theory (SCT,) there is a framework with three components, personal factors, environments, and behavior, which can affect one to another. In addition, personal factors that have been influenced by environments will affect someone's behavior or vice versa (Adler, 2012).



**Figure 1: Social Cognitive Theory**

The interventions of personal factors of cognitive, affective and biological events in behavior influence someone thinking and practicing. The stage of self- control, observational learning, reinforcement, self-efficacy and emotional coping responses of person lead them to outcomes of behavior. Environmental factors, such as family members, friends and mass media, can affect individual behavior and create person perceptions (Bandura, 1999).

## **2.2. Extent of sexual activities among students**

A human being sexual activity is a diverse occurrence. It happens in different physical setting and community background which consists of a wide range of specific activities and is apparent differently by different individuals. In secondary school, a student engages in sexual activity on the basis of a multifaceted set of motivations and organizes that activity on the basis of frequent external issues and influences (Laddunuri, 2013).

A sexual curiosity occurs roughly in puberty and continues through adolescence. Sensitive adolescent sexuality may be caused by a number of factors including bodily changes, sexual hormones, social forces, and preparation for adult gender role.

This heightened adolescent sexuality may be caused by a number of factors, including bodily changes, sexual hormones, social forces, and rehearsal for adult gender roles (Papaharitou S., 2011). A study done by Olaseha I.O., (2004) demonstrated that more than one third of the students had sexual intercourse in their late adolescence with mean age  $17.2 \pm 1.8$  and in this study, 17.6% of the students had multiple sexual partners. Adolescents who begin sexual activity early are more likely to have more sexual partners, and exposed more to the risk of sexually transmitted diseases.

In his study on the sexual behaviour of secondary school adolescent students in Tanzania: patterns and trends, Laddunuri, (2013) found that more than one third (40.2%) of the participant students had experienced intercourse with mean age  $17.2 \pm 1.8$  years and one sixth (17.6%) of the participants had multiple sexual partners. The mean age for hugging, kissing and breast fondling was significantly younger when compared to the sexual intercourse. Thus, students were engaged in sexual activities within their adolescence at a relatively high rate. Hence, there is a need to promote specific intervention programmes built upon those factors which are associated with an increased likelihood for early sexual debut and risky sexual behaviour (Laddunuri, 2013).

In his study Louis Odeigah, (2019) on high risk sexual behavior among adolescent senior secondary school students in Nigeria found that majority, 305 (69.5%) of the students who had sexual intercourse were between 16 and 20 years. Among these results and 46.7% were male while 22.8% were female. The study showed that males are more prone to high risk sexual behavior than females. This is since their sexual desire is generally greater than that of females and continues even to old age while that of females diminishes as they get old.

### **2.3. About associated factors**

There are several factors influencing student's behavioral intentions through altering their perceptions of the personal and social consequences of becoming pregnant and their self-efficacy in sexual related decision process. Poor knowledge on sexual health as well as contraceptive methods poses a risk to teen pregnancy. Because appropriate knowledge is a key to good beliefs and attitudes, lack of knowledge leads to poor attitudes towards contraceptives and condoms, increasing the chances of pregnancy (Kanku et al, 2010).

The results from a study conducted by Yi Song, (2010) on sexual intercourse and high-risk sexual behaviours among a national sample of urban adolescents in china showed that in 18 provinces, 4.8% of grade 10 – 12 students reported had had sexual intercourse, of these, 32.8% reported had ever had forced sex. The prevalence of having had sexual intercourse was higher among male than female students ( $\chi^2 = 1345.2, P < 0.001$ ). lower among students who lived in developing cities or districts than students who lived in highly developed or middle-developed cities or districts (4.3 versus 5.1 and 5.0%,  $\chi^2 = 29.2, P < 0.001$ )

Some students join peer groups that encourage promiscuity rather than academics. From this, they can think it's important to have a boyfriend and or a girl friend. With all of the misconceptions about sex, they end up experimenting. Moreover, a girl is at risk of pregnancy if she is living with a single parent compared to girls from families with both parents. It has been considered as a parent's task talking to girls about sexual education however, studies have shown that parents do not talk to their children about these matters because they feel confused, ill-informed or embarrassed about the topics (Hughes & McCauley, 2008) however, its important that young girls receive information about sexual issues before they themselves get involved in sexual activity.

In the USA, sexual behaviour differed by ethnicity, age, gender and urban/rural location Unlike Thailand and Philippines, where family structure was associated with premarital sex; youths living with one parent have higher rate of sexual activity than those living with both parents (Bandura, 1999). Regarding to this issue, a study conducted in Jakarta has showed that parents tend to refuse talking about sexual matters to their children (Gibbs A, 2012)

Other factors influencing many adolescents are mostly with use of tobacco, alcohol, sex, and drugs. Associations between sexual activity and substance use have been a consistent research finding. Studies from the USA reported similar findings as Kenya where the single most important predictor of sexual activity among adolescent women was the use of alcohol, drugs, or tobacco. Studies have revealed that led sexual practice is not only common for men and women but also men-men and women-women, and it was found that the average age of first intercourse is around 10-12 years, where 40% of them do not know anything at all on condoms (Cooney, 2010).

A study which was conducted in Botswana in February 2012 show that most of the girls (90%) between 10 to 14 years declare that their first sexual experience was unplanned when 50% of the boys indicated that they had planned the sex intercourse in advance. Condom use at first intercourse was observed to be higher as the level of education increased. A research

which was conducted in Indonesia shows that adolescents who have had sex claimed, beside from friends, that they get the idea of having sexual intercourse from the porn DVD, the internet, and magazine or newspaper (Gibbs A, 2012).

The cross sectional study done in 1997 in Uganda has found that females students were more likely to have sexual relationships with their responsible or with well-off men in the community. This indicated the possible use of sex to fulfill economic needs. From this found we can confirm that economic pressures can also have a bearing on sexual activity. The proportion of sexually experienced adolescents aged 15-19 who were currently sexually active was 76% for female and 57% for males (Twa-Twa, 1997). Poverty or economic depravity in particular, has also been strongly linked to premarital sexual activity among young people especially among girls. In several studies, it has been speculated that girls who are inadequately provided for in terms of basic needs are often exposed to the temptation of seeking financial rewards from young and older men for sexual favours in return (Wepukhulu, 2012).

A study conducted by Renee E. Sieving in March 2006 show that 34% of young schooling reported ever having had sexual intercourse, and 7% of high school students say they first had intercourse before age 13. Approximately 900,000 females aged 15–19 become pregnant every year, and three million adolescents (one in four sexually active teenagers) acquire an STD. Adolescents who initiate sexual activity at young ages tend to have more sexual partners and to use condoms less than those who initiate sex later, and are at increased risk for STDs ;Cervical Cancer and Pregnancy during the teenage years (Adler, 2012).

A study conducted in Tanzania among adolescent girls who were admitted to a hospital in Dar es Salaam due to illegal abortion revealed that girls were sexually active at early age, having sex mainly with men older than themselves. Most of the girls considered themselves to be in love with and actually enjoyed sex with their older partners. Among the reasons for establishing relationships were to obtain money or gifts exchanged for sex. Condoms and contraceptive use was very low resulting into pregnancy (Rasch et al., 2000).

#### **2.4. Contraceptive methods used and reasons of engaging in sexual activity**

A study done by Manlove, (2003) showed that teenagers who had waited a longer time between the start of a connection and first sex with that associate, discussed contraception before first having sex or used dual contraceptive methods had significantly increased odds of ever or always using contraceptives.

Adolescents who had taken a virginity pledge, had an older partner, had a greater number of close friends who knew their first partner, or reported having a relationship that was not romantic but that involved holding hands, kissing and telling their partners they liked or loved them had decreased odds of contraceptive use or consistency. As relationship length increased, teenagers were more likely to ever have used a method, but less likely to always have used a method (Jennifer Manlove, 2003).

Adolescents face unique barriers in accessing contraceptive services, including concerns about confidentiality and cost. Adolescents' legal rights to confidential contraceptive services vary by state and change over time. Where allowed, obstetrician gynecologists should provide adolescents the opportunity to discuss their reproductive goals and contraceptive needs without a parent or guardian present for at least part of the visit (Bliss Kaneshiro, 2017).

As explained above, misinformation, lack of accurate information, and poor access to contraception increases vulnerability of teenage girls to early pregnancy and in most cases these girls often take risks, to some extent knowing that they can become pregnant and in many cases wanting to get pregnant in order to get married (Wepukhulu, 2012). In another scenario, other girls get pregnant expecting their boyfriends to marry them, or because they did not think they could become pregnant, or failed to use contraception correctly. Without access to contraceptive methods, many rely on access to induced abortion when the pregnancy is unwanted, safe or unsafe (Laddunuri, 2013).

Most of girls are not aware of policy that gives them the right to seek family-planning services. Abortion is illegal, thus the use of family planning services would protect the girl from facing legal actions towards abortion, however, these the laws that illegalize abortion are not always enacted. Failure to enact laws of illegal abortion may make girls feels like they can simply abort without legal consequences once they become pregnant (Rasch et al 2000).

### **2.3. Consequences and risks of early sex intercourse**

Unfortunately 50% of all sexually active teenage girls became pregnan. Adolescent pregnancy is a major problem in Botswana and responsible for a large number of school drop-outs annually. Social and demographic factors other than education connected to a risk of pregnancy among adolescents are family structures, satisfying relations within the family, peer influence, traditional early marriages and economic factors (Bliss Kaneshiro, 2017).

As elsewhere in the world early sexual activities, with increasing trend in the world, also put adolescents in Indonesia with an unwanted pregnancy and sexually transmitted infections. A

study done previously show that 34% of schooling children report ever having had sexual intercourse, and 7% of high school students say they first had intercourse before age 13. Approximately 900,000 females aged 15–19 become pregnant every year, and three million adolescents (one in four sexually active teenagers) acquire an STD. Adolescents who initiate sexual activity at young ages tend to have more sexual partners and to use condoms less than those who initiate sex later, and are at increased risk for CC, STDs and pregnancy during the teenage years (Renee E. Sieving, 2006).

In analyses controlling for gender, family structure and romantic relationships, the higher the proportion of a youth's friends who were sexually experienced, the greater the odds of sexual debut (odds ratio, 1.01); the odds also were elevated among youth who believed that they would gain their friends' respect by having sex (1.2). Relationships between friend variables and sexual initiation did not vary by level of involvement with friends (Bandura, 1999).

#### **2.4. Possible solutions to reduce risks**

Understanding influences on early initiation of intercourse and identifying possible strategies for delaying first sex have important implications for adolescent health. While sex education is vitally important to preparation for adulthood, it seems all the more critical that youth have opportunities to be involved in prosocial relationships and learn skills for managing the social relationships in which sexual behavior occurs. As young people progress through adolescence, sexual intercourse becomes a normative behavior (Adler, 2012).

To foster overall development and reduce the risk of unhealthy sexual behaviors, adolescents need sustained, high-quality relationships with friends, parents, siblings, mentors and other adults. Within these relationships, both formal and informal, adolescents can learn skills of negotiating trust, seeking support, managing conflict and expressing empathy skills that are critical to the development of healthy romantic and sexual relationships (Dewaele, 2017).

To increase the likelihood of success, interventions focused on delaying sexual intercourse among adolescents should address group norms for sexual behavior as well as the perceptions, skills and behaviors of individuals. To impact group norms, interventions must target cohorts rather than exclusively focusing on individual teenagers. As perceived respect from friends for having sex appears to be a risk factor for sexual debut, programs can emphasize an array of prosocial behaviors (i.e., healthy alternatives to sexual intercourse) as ways to gain respect from friends, a desired goal (Babela, 2008).

## 2.5. Conceptual formwork

Dependent variable for this study is sexual activity which is associated with the following independent variables: economic factors, demographic factors, individual factors community factors and groups and family factors. The association of these variables is presented in the figure 1 below:

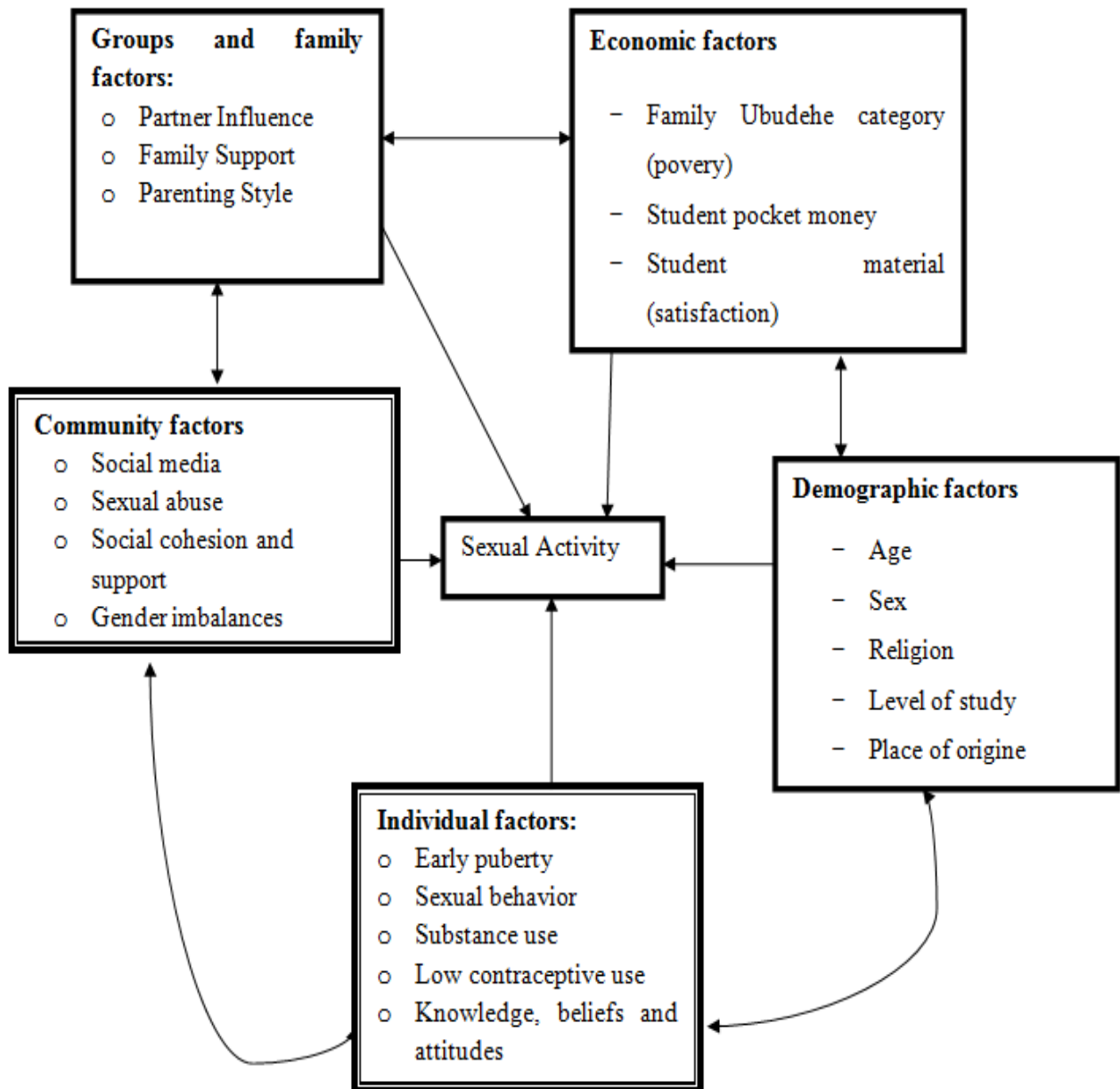


Figure 2: Conceptual frmawork



## CHAPTER THREE: MATERIELS AND METHODS

### 3.1. Methods

This study used the quantitative approach to assess the level of sexual activity among A level students. The study explored factors associated with the sexual activity among this same target population using individual self administered questionnaire where every respondent provided his / her response to asked questions.

### 3.2 Study design

The study is cross-sectional, targeting A level students at Collège Saint André (S4 - S6).

### 3.3 Inclusion criteria:

The population included all students in secondary school in classes four; five and six both males and females that were available on the day of interviews in all schools sampled and accept voluntarily to participate in the study.

### 3.4 Exclusion criteria:

The study excluded all students from other classes than S4 and S5 and S6 (O'level), those who were not available the day of administering questionnaire or those who did not accept voluntarily to participate to the study.

### 3.5. Sample size and sampling technique

According to the information got from Dean of studies of Collège Saint André, the total number of all students in S4 – S6 this year 2019 is 596, we calculated the sample size using the following formula of Slovin:

$$n = \frac{N}{1 + Ne^2}$$

With

n: sample size

N: total population

E: margin error (0.05%)

$$\text{Therefore, } n = \frac{596}{1 + 596(0.05)^2}$$

Using this above information, the calculated sample size is n=239

Considering the possible non- responses, we added 10% of the calculated sample size, which gives the following final sample size: 239+ 24=263

In each selected class, the sample was drawn proportionally to the size of the class (total number of sample size divide by the number of available students in each class). Therefore, the class with more students produced a larger number of sample population and vice versa.

**Table 1. Sample distribution according to combinations and classes**

Combination	Class(year level)	Enrollees	%	Sample
MCB	S4	40	7	18
	S5	40	7	18
	S6	39	6.5	17
MPC	S4	41	7	18
	S5	37	6	16
	S6	43	7	18
MPG	S4	41	7	18
	S5	39	6.5	17
	S6	45	7.5	20
PCB	S4	42	7	18
	S5	38	6	16
	S6	39	6.5	17
PCM	S4	38	6	16
	S5	28	5	14
	S6	46	8	22
Total	All Class	N=596	100	N=263

### 3.6. Data collection

A questionnaire was given to respondents / students from selected classes. This questionnaire was self administered, meaning that each student received it and sit in private place, alone, and fill in him/her self the questionnaire.

To reach the participants, the lists of all students in each class were used. Each student on the list of the class was given a number. Then all numbers were written on pieces of papers put into a basket. The researcher was picked randomly, from the basket, one by one, the numbers until the calculated sample size for each class was reached.

### **3.7. Variables**

This study has two types of variables:

#### **3.7.1. Dependent variable:**

Sexual activity in A level students.

#### **3.7.2. Independent variables:**

Age, sex, sector of provenance, class, religion, day or boarding student, living with parents or other kins, education level of parents or kins, social economic status of parents, etc....

### **3.8. Data analysis**

Data entry was done with Microsoft excel 2010, by the researcher. After cleaning, data were exported into SPSS 16.0 for analysis. Descriptive statistics summarized the data into frequencies and percentages. Bivariate and multivariate analysis was performed to identify the associated factors.

Logistic regression was used, and full and reduced models were used to highlight the statistically significant factors of sexual activity among A level student at Collège Saint André which was measured by the dichotomous variable, having ever had sex coded 1 as “yes” and 2 as “No” the reference category was the last category in ascending order for each variable used in both models, where for example the reference category for the dependent variable was No “students never exposed to sex”. All variables used in the analysis were used in the full model and only the statistically significant ones were included in the reduced model.

### **3.9. Ethical consideration**

The Collège of Medicine and Health Sciences Institutional Review Board (IRB) approved the study protocol before starting data collection. We got the permission to work with the students from the principal of the Collège Saint André. A written informed consent was obtained from subjects before data collection. In order to ensure confidentiality to participants, names were not included in questionnaires and coded questionnaires were stored in a cupboard where none has access.

## **CHAPTER IV: RESULTS**

### **4.2. Socio Demographic characteristics and profile of respondents**

#### **4.2.1. Description of Respondents by age, sex, study subject, current class level, religion, and study method**

Table 2 shows the frequencies and percentages related to socio demographic characteristics of respondents. Results show that 31.9% of respondents were female while 68.1% were males.

By Religion, Protestant represents 49% which is the highest representation compared to the other religions, while Catholic and Adventist represent 35.5% and 12.5% respectively. Muslim represents only 4.2% and other religions not specified were 0.8% of all respondents. The study was focused on A level students, and 35.7% were in senior 6, 30.8% in senior five, and 33.5% were in senior four. While the majority (82.1%) of students participated in the survey were boarding and the remaining 17.9% are not boarding (day students). About 57.0% of all respondents live in Kigali city and the least represented is 6.1% who live in western province.

**Table 2. Description of Respondents by age, sex, study subject, current class level, religion, and study method**

<b>Variable</b>	<b>Categories</b>	<b>Frequency</b>	<b>Percentage</b>
Age of respondent	15	1	0.4
	16	66	25.1
	17	75	28.5
	18	82	31.2
	19	28	10.6
	20	10	3.8
	21	0.4	0.4
Sex of student	Male	179	68.1
	Female	84	31.9
Option of study	PCM	52	19.8
	PCB	51	19.4
	MPG	55	20.9
	MPC	52	19.8
	MCB	53	20.2
Current class	S4	88	33.5
	S5	81	30.8
	S6	94	35.7
Religion	Catholic	88	35.5
	Protestant	129	49.0
	Adventist	33	12.5
	Islam	11	4.2
	Other	2	.8
Studying mode	Boarding	216	82.1
	Day	47	17.9
Province	Kigali	150	57.0
	West	16	6.1
	South	36	13.7
	North	25	9.5
	East	35	13.7

### 4.3. The level of sexuality among A levels students

#### 4.3.1. The level of sexual activity among A level students

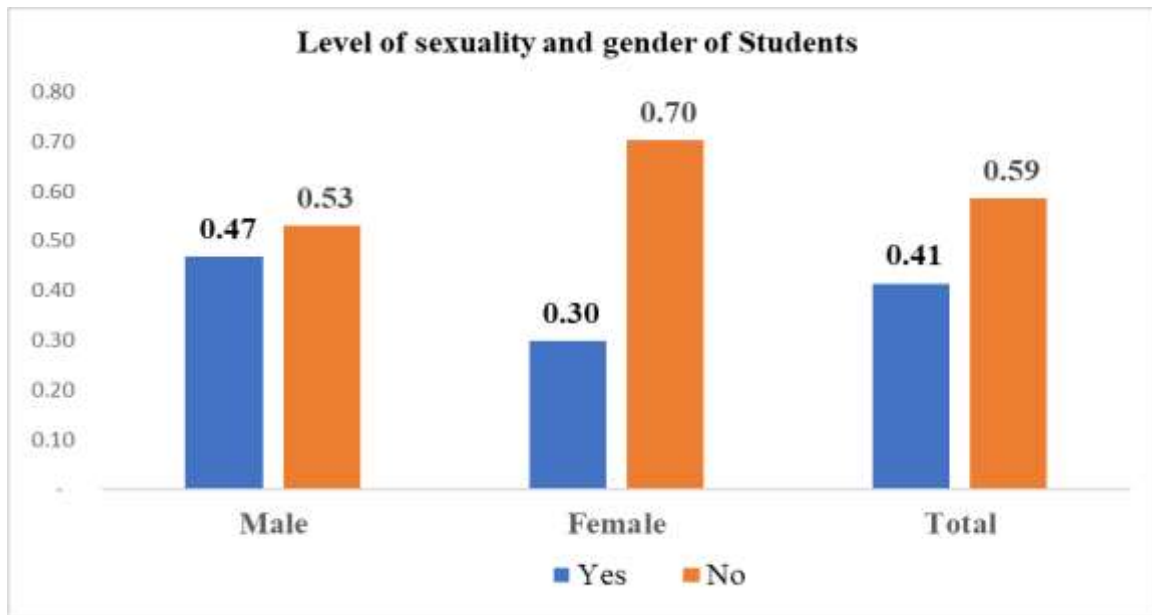
The first objective of this study was to establish the level of sexual activity among A level students at Collège Saint André. The following table summarizes the responses on the question “have you ever had sexual intercourse?” The findings of the table 4 indicate that 41.1% of all A level students who participated in this study have had at least one sex intercourse, while 58.6% of respondents reported that they did not had sex intercourse. The table 3 indicates also that the behavior of male students and female students about the sexual activity is statistically different P value <0.05.

**Table 3. Proportion of students who have ever had sex intercourse**

		Gender of student					
		Male		Female		Total	
		Frequency	Percent	Frequency	Percent	Frequency	Percent
<b>Had sex intercourse</b>	Yes	84	47	25	30	109	41
	No	95	53	59	70	154	59
	<b>P-Value</b>	0.008					

The figure 3 below, clearly shows that male at Collège saint André are more involved in sexual activities than female. The results shows that 47% of male students in A level have had sexual activity while 30% of female had sexual activities.

**Figure 3. Level of sexuality among A level student by gender**



#### **4.3.3. The factors associated with sexual activity**

##### **Bivariate analysis**

Bivariate analysis was performed to assess the association between independent variables and the outcome variable among A level students.

Table 4 shows factors associated with being involved in sexual activity. As it can be seen, having ever had sex is associated with gender , study mode , Religion , class performance , Ubudehe category , having parents , Living with parents , Education of the parent or another guardian.

**Table 4. Cross tabulation between sexual activity and independent variables**

Independent Variables	Categories	Had sex intercourse			
		Yes		No	
<b>Age of Respondent</b>	<=16	28	41.79%	39	58.2%
	17-19	77	41.62%	108	58.37%
	20+	4	36.36%	7	63.63%
<b>P value</b>		0.940			
<b>Gender</b>		Frequency	Percentage	Frequency	Percentage
	Male	84	46.90%	95	53.10%
	Female	25	29.80%	59	70.20%
	<b>P value</b>	0.008			
<b>Study mode</b>	Boarding	81	37.5	135	62.5
	Day	28	59.6	19	40.4
	<b>P value</b>	0.005			
<b>Residence</b>	Kigali	70	46.7	80	53.3
	South	14	38.9	22	61.1
	North	7	28.0	18	72.0
	West	4	25.0	12	75.0
	Est	14	38.9	22	61.1
	<b>P value</b>	0.238			
<b>Option Major</b>		Frequency	Percentage	Frequency	Percentage
	PCM	21	40.4	31	59.6
	PCB	19	37.3	32	62.7
	MPG	32	58.2	23	41.8
	MPC	20	38.5	32	61.5
	MCB	17	32.1	36	67.9
	<b>P value</b>	0.065			
<b>Religion</b>		Frequency	Percentage	Frequency	Percentage
	Catholic	40	45.5	50	54.5
	Protestant	51	39.5	78	60.5
	Adventist	9	27.3	24	72.7
	Islam	9	81.8	2	18.2
	Other	0	0	0	0
	<b>P value</b>	0.014			
<b>Class Rank/Performance</b>		Frequency	Percentage	Frequency	Percentage
	<=5	9	26.5	25	73.5
	6-10	16	27.6	42	72.4
	11-15	27	39.7	41	60.3
	16-19	6	60.0	4	40.0



	>=20	51	54.8	42	45.2
	<b>P value</b>	0.003			
<b>Satisfied with needs</b>		Frequency	Percentage	Frequency	Percentage
	Yes	87	37.7	120	62.3
	No	22	56.0	34	44.0
	<b>P value</b>	0.712			
<b>Ubudehe categories</b>		Frequency	Percentage	Frequency	Percentage
	Second	7	18.9%	30	81.1
	Third	89	43.6	115	56.4
	Fourth	13	59.1	9	40.9
	<b>P value</b>	0.004			
<b>Having Parents</b>		Frequency	Percentage	Frequency	Percentage
	Yes	95	39.6%	145	60.4%
	No	14	60.9	9	39.1%
	<b>P value</b>	0.048			
<b>Living with parent</b>		Frequency	Percentage	Frequency	Percentage
	Yes	80	37.7%	132	62.3%
	No	29	56.9%	22	43.1%
	<b>P value</b>	0.013			
<b>Living with one parent or other family member</b>		Frequency	Percentage	Frequency	Percentage
	Mother only	17	58.6%	12	41.4%
	Father only	9	64.3%	5	35.7%
	other	3	33.3%	6	66.7%
	<b>P value</b>	0.310			
<b>Education of the parent or other people with respondent</b>		Frequency	Percentage	Frequency	Percentage
	Primary	9	19.6%	37	80.4%
	Secondary	48	55.2%	39	44.8%
	University	47	44.3%	59	55.7%
	Not studied	5	20.8%	19	79.2%
	<b>P value</b>	0.000			

<b>Ever heard of sexuality</b>	Frequency	Percentage	Frequency	Percentage
Yes	107	41.3%	152	58.7%
No	2	50.0%	2	50.0%
<b>P value</b>	0.726			
<b>Know possible consequences of early sexual intercourses</b>	Frequency	Percentage	Frequency	Percentage
Yes	99	40.1%	148	59.9%
No	10	62.5%	6	37.5%
<b>P value</b>	0.078			

#### 4.3.3.2 Checking for multicollinearity among the variables to be used in the regression model

If one variable is a perfect linear function of another in the model, standard errors become infinite and the solution to the model becomes indeterminate. To the extent that one independent is a near but not perfect linear function of another independent, the problem of multicollinearity will occur in logistic regression. As the independents increase in correlation with each other, the standard errors of the logit (effect) coefficients will become inflated. Multicollinearity does not change the estimates of the coefficients, only their reliability. To avoid the misleading results, we have used the Variance Inflation Factor (VIF) to check for multicollinearity between the independent variables. According to Kennedy (1992), a VIF greater than 10 indicates harmful collinearity.

**Table 5. Multicollinearity test**

Variable	VIF	1/VIF
Live with both parents	1.84	0.544
Both parents are alive	1.73	0.577
Class level	1.68	0.595
Student's Age	1.63	0.614
Ubudehe category	1.23	0.810
Study mode (Day/boarding)	1.22	0.822
Material satisfaction	1.21	0.823
Parent's education level	1.18	0.849
Student's gender	1.13	0.885
Student's performance	1.12	0.890
Religion	1.06	0.939
Option	1.05	0.954
Sexual education	1.04	0.959
Residence(Kigali/Outside Kigali)	1.19	0.842
Mean VIF	1.31	

When the VIF reaches these threshold levels, researchers may feel compelled to reduce the collinearity by eliminating one or more variables from their analysis; combining two or more independent variables into a single index; resorting to a biased regression technique that can reduce the variance of the estimated regression coefficients; or, in rejecting a paper because VIF exceeds a threshold value (Belsley *et al.*, 1980). The following table shows the results of the checking from SPSS. The tables 8 revealed that there was no problem of multicollinearity among independent variables, since in all cases, the  $VIF < 10$ . Thus the study may proceed with all demographic independent variables to fit our logistic models.

### 4.3.3.3 Checking for non-linearity between the dependent variable and independent variables and for non-normality of errors

The logistic regression does not assume a linear relationship between the dependents and the independents normally distributed error terms are not assumed. The following table is the output of SPSS on the linearity between the dependent variable (had sex activity) and the independent variables: option of study, class level, age, study mode (day/boarding), Residence(Kigali/outside kigali), parent alive, living with parent, ubudehe category, performance in classroom, ever had sexual information, and education level of parent.

**Table 6. Correlations between the variables in the model**

Variables in the model													
Sexual activity	1.00												
Option	0.05	1.00											
			-										
Student's Age	0.04	0.06	1.00										
				-									
Student's gender	0.17	0.10	0.04	1.00									
					-								
Religion	0.01	0.02	0.01	0.13	1.00								
Study mode (Day/boarding)	-0.17	0.08	0.12	0.00	0.01	1.00							
							-						
Student's performance	-0.24	0.08	0.01	0.21	0.10	0.07	1.00						
								-					
Both parents are alive	-0.12	0.02	0.06	0.01	0.04	0.04	0.01	1.00					
									-				
Parent's education level	-0.15	0.03	0.04	0.01	0.12	0.10	0.06	0.02	1.00				
										-			
Ubudehe category	-0.20	0.01	0.11	0.01	0.08	0.18	0.07	0.11	0.32	1.00			
											-		
Material satisfaction	0.02	0.01	0.10	0.04	0.06	0.07	0.07	0.20	0.15	0.26	1.00		
												-	
Sexual education	-0.02	0.09	0.01	0.09	0.06	0.06	0.02	0.04	0.05	0.01	0.06	1.00	
Residence(Kigali/Outside Kigali)													-
	0.12	0.03	0.11	0.02	0.02	0.36	0.14	0.03	0.08	0.08	0.10	0.08	1.00

From the table 6, it was observed that the largest correlation coefficient is 0.26 which is recorded between material satisfaction and the economic category (Ubudehe). This shows that there is no variable which exhibits any stronger linear association with the dependent variable. The correlation coefficients are all different from zero, which implies that all variables used can be valid in logistic model.

#### 4.3.3.4 Binary logistic regression analysis for associated with sexual activity among A level students at Collège staint André

##### 4.5.4.1 Logistic Regression Model Fitting

The Binary logistic regression analysis was used to examine the effect of all independent variables on sexual activity among A level students in Rwanda. The results of table 10, shows the results of Chi-square and Sig. values. This is the chi-square statistic and its significance level. In this case, the statistics for the Step, Model and Block are the same because we have not used stepwise logistic regression or blocking. The value given in the Sig. column is the probability of obtaining the chi-square statistic given that the null hypothesis is true. In other words, this is the probability of obtaining this chi-square statistic (75.995) if there is in fact no effect of the independent variables, taken together, on the dependent variable. The p-value is compared to a critical value .05 or .01 to determine if the overall model is statistically significant. In this case, the model is statistically significant because the p-value is less than .000

**Table 7. Omnibus Tests of Model Coefficients**

		Chi-square	df	Sig.
Step 1	Step	75.995	19	.000
	Block	75.995	19	.000
	Model	75.995	19	.000

The table 8 presents the results of a binary regression coefficient in relation to the sexual behavior of A level students in Collège staint André Rwanda and some variables are used in the model as they are found to be statistically significantly correlated with sexuality while others are not as presented in table 8.

The variables are re-examined in order to provide a clearer identification of the significant factors associated with sexuality among A level students in Collège saint André. The results are interpreted by comparing different categories of independent variables to the redundant category (reference category), to evaluate the probability of chance of being involved in sexual activity for A level students through the coefficients and the odds ratios given by SPSS output in table 8.

Table 8 shows results of sexual activities factors using binary logistic regression.

Results from the reduced model shows that catholic students of (OR=0.08; 95% C.I = (0.01-0.53)) and protestant students of (O.R= 0.07; C.I= (0.01-0.47)) were 0.07 less likely to be involved in sexual activities than their counterparts of other religious groups respectively.

Both top 8 class performers' students are significantly less likely to be involved in sexual activities than those outside the top ten. Students within the top 5 and students between six and ten with highest marks were 0.29 less likely to be involved in sexual activity than those ranked below the first 20 students in their class respectively percent with (OR=0.24; 95% C.I = (0.09-0.63)) and 71 percent with (O. R= 0.29; C. I= ((0.09-0.63)).

Students whose parents have achieved secondary school 3.77 times more likely to be involved in sexual activities than those with parents not educated at all with (OR=3.77; 95% C.I = (1.2-11.81)).

The results indicate that being religion (catholic and protestant) and good class performance (top five and the rest of top ten) have been identified as protective factors associated with sexual activity. On the hand, the level of parent education seems to be a risk factor as the odds ratio is greater than 1 of the reference category "not studied". The reference category for students' religion was "other religion" The reference category for students' class performance was "students with class rank above 20"

**Table 8. Binary logistic regression model of factors associated with A levels students sexual activity**

Variables		Full model		Reduced Model	
		P-value	O.R (C.I At 95%)	P-value	O.R (C.I At 95%)
<b>Age of Respondents</b>	[16 years or less]	.			
	[17 -19]	0.98	5.083E+166(5.018E+166-5.082E+166)		
	[20+]	.	5.08E+166		
<b>Option of major</b>	[PCM]	1.00	.		
	[PCB]	.	1		
	[MPG]	.	8.61E+21(7.34E+21-1.16E+22)		
	[MPC]	1.00	4.04E+267(2.04E+267-5.24E+267)		
	[MCB]	.	2.84E-18		
<b>Religion</b>	[Catholic]	.	.	0.009	0.08(0.01-0.53)
	[Protestant]	0.99	1.17E-158(1.8E-158-1.17E-149)	0.006	0.07(0.01-0.47)
	[Adventist]	0.98	1.08E-79	0.003	0.04(0.01-0.34)
	[Islam]	.	3.31E-176	.	.
<b>Class rank/Performance for the last trimester</b>	[<=5]	.	.	0.004	0.24(0.09-0.63)
	[6-10]	0.99	8.61E+21(7.34E+21-1.16E+22)	0.002	0.29(0.13-0.65)
	[11-15]	.	9.24E+78	0.084	0.53(0.26-1.09)
	[16-19]	.	7.36E+179(6.34E+179-8.86E+179)		1.37(0.34-5.55)
	[>=20]	.	.	0.655	.
<b>Are Parents Alive</b>	[Yes]	0.98	5.98E-128	0.345	0.53(0.14-1.97)
	[No]	.	.	.	.
<b>Live with Parents</b>	[No]	.	.	0.150	.
<b>Living with only one parent or other family member</b>	[Mother only]	1.00	1.95E-31	.	
	[Father only]	.	1.25E-101	.	
	[Other]	.	.	.	
<b>Parent education</b>	[Primary]	0.99	2.81E+118	0.849	1.14(0.3-4.24)
	[Secondary]	0.99	2.09E+162	0.023	3.77(1.2-11.81)
	[University]	0.99	1.15E+114	0.221	2.04(0.65-6.4)
	[Unknown]	.	.	.	.
	[Not studied]	.	.b	.	.

<b>Ubudehe category</b>	[Second]	0.98	.b	0.018	
	[Third]	0.98	.	0.459	
	[Fourth]	.	.	.	
<b>Satisfaction of needs</b>	[No]	.	3.31E-176	.	
<b>Reasons of satisfaction</b>	[Poverty]	0.99	1.17E-158(1.16E-158-1.17E-135)	.	
	[Parent decision]	.	.	.	
	[Others]	.	.	.	
<b>Sexuality Education</b>	[Yes]	.	.	.	
<b>Knowledge on the consequences of early intercourses</b>	[Yes]	.	1.08E-79	.	
<b>Residence</b>	[Kigali]	0.99	.	.	
	[South]	.		.	
	[North]	.		.	
	[West]	.		.	
	[East]	.		.	

- a. Variable(s) entered on model: Religion, Livingstatus, Perfomance, Parentalive, Livewithparent, Educationparent, Ubudehe, Satisfied, Residence, Age, Consequences, and Sexeducation.

The probability of having sexual intercourse for A level student increases according to the sign of betas, categories having positive coefficients are more likely to increases sexual activity rate for A level students while negative coefficients are less likely to influence sexuality of A level students in Collège Staint André.

The coefficients for the logistic regression equation predicting the dependent variable from the independent variable are expressed in log-odds units. The estimates show the relationship between the independent variables and the dependent variable, where the dependent variable is on the logit form. The estimates tell the amount of increase (or decrease, if the sign of the coefficient is negative) in the predicted log odds of sexuality = 1 that would be predicted by a 1 unit increase (or decrease) in the predictor, holding all other predictors constant. According to the sign values regarding testing whether the coefficients are statistically significant, the independent variables are not significant; the coefficients are not significantly different from 0, which should be taken into account when interpreting the coefficients.



Because the coefficients are in log-odds units, they are often difficult to interpret, so they are often converted into odds ratios. To do this, we interpret variables in the Equation table labeled “Exp(B)” which are the odds ratios(exponential function of coefficients).

**Age of student** – For every one-unit increase in age of student (so, for every additional year), we expect a 0.16 increase in the log-odds of sexuality, holding all other independent variables constant. However, the sign test shows that age coefficient is not statistically significant different from 0. **Ubudehe category-** For every one unit increase in level of weath of the household, we expect a 0.68 increases in the log odds of sexuality keeping all other independent variables constant. The same to other variables, changes in one unit increase in performance of student, residence, consequences of earlier sexual intercourse, and sexual education would increases the log-odds of sexuality by 0.32, 0.10, 0.40, 0.51 respectively by holding all other independent variables constants. **Class level** – This tells us if the overall variable class is statistically significant. There is no coefficient listed as for education levels, because class and education level are not a variable in the model. Rather, categorical variables which code which are displayed in the model (see table 11), and those have coefficients. The results shows that class level have influence on sexuality however, not all categories’ coefficients are statistically significantly differ from zero.

**Education of parents (Educationparent)**–The reference group is level 4 (not studied), so this coefficient represents the difference between level 2 (secondary level of education) and level 4. On class level, the reference group is level 3 (senior 6), so the coefficient represent the difference between level 1 and level 3, and also there is a statistically difference between level 2 and level 3. The results shows that class level, performance in class, study mode, living with parents, education level of parents, and income category (wealth/ubudehe category) have a significant influence on the sexuality of students. On the other side, age, residence type (Kigali/outside), knowledge on sexual activity and consequences of earlier, age of students, religious believes, and other such as material satisfaction, option of study, having both parents showed no statistically significant influence on sexuality. As discussed in literature review, the sexuality among students can be influenced by surrounding environment (such as advanced ICT equipment, internet for accessing online films and sexual videos) which can have an effect on students behavior change regarding sexuality. Having infrastructures for accessing internet, like telephones, computer, having TV at home as the most source of information for sexuality have high impact on sexuality as discussed in table 12.

#### 4.4 Main reasons for getting involved in sexual activity among A level students

Apart from environment and personal factors associated with students' earlier sexual activity, they have suggested reasons or motivation for their sexual intercourse. In general, a big number of students 34.86%, 27.52%, and 20.18% who had their sexual activity was motivated and influenced by their friends (lovers), watching love and sexual films, and others were influenced by colleagues respectively.

In most of the case, 56.9% of those who had sex intercourse said that they were pushed by the curiosity, desire to know, and the discovery purposes followed by 13.8% of those who motivated to have sexual intercourse by gift. Another big number of respondents 11.9% indicated that their sex intercourse was caused by the peer pressure from their colleagues. The results indicate that only 3.7% of respondents had sex intercourse by force and violence. Amongst other reasons not specified includes personal leisure, and desire for having sexual intercourse or body desire.

**Table 9. The main reason for sex intercourse according to sex of respondent**

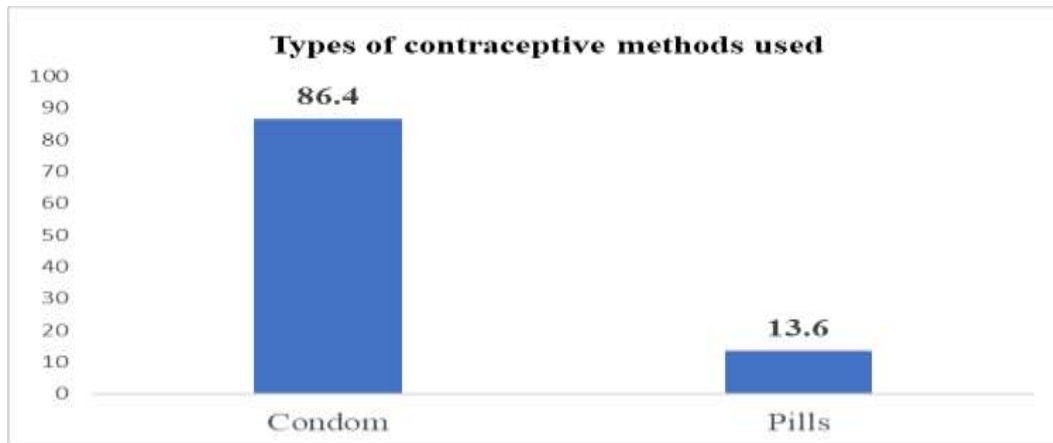
	Sex of student				Both sexes	
	Male	%	Female	%	N	%
TV emissions	2	2.38	1	4.00	3	2.75
Films	27	32.14	3	12.00	30	27.52
Radio emissions	3	3.57	0	0.00	3	2.75
Pressure of my friend	25	29.76	13	52.00	38	34.86
Motivated by colleagues/ and advise of friends	18	21.43	4	16.00	22	20.18
Violence	0	0.00	3	12.00	3	2.75
Others	9	10.71	1	4.00	10	9.17
<b>Total</b>	<b>84</b>	<b>100.00</b>	<b>25</b>	<b>100.00</b>	<b>109</b>	<b>100.00</b>
Discovery					62	56.9
Gift					13	11.9
Alcohol & drugs					5	4.6
Peer pressure					15	13.8
Violence					4	3.7
Other Reasons					10	9.2
<b>Total</b>					<b>109</b>	<b>100.0</b>

#### 4.5 Contraceptive usage among A level students

**Figure 4. Level of contraceptive method usage among A level students engaged in sexual activities**

The findings in figure 5 show that about 86.4% of students who have protected sex against unwanted pregnancy used condom, while 13.6% used Pills.

**Figure 5. Type of contraceptive methods used by A level students**



**Table 10. Reasons of not using Contraceptive methods**

Reasons of not using Contraceptive methods	Frequency	Valid Percent
Lack of access, financial means to buy them (Poverty)	3	7.0
No wanted	28	65.1
Others reasons	12	27.9
<b>Total</b>	<b>68</b>	<b>100.0</b>

The contraceptive use among the students is not high as more than a third (39.4%) did not use any contraceptive method even though they have had sex intercourse. Some of the reasons were provided by the respondents, and they 65.1% revealed that contraceptive method during their sex activity was not necessary for them, while only 7.0% said that it was due to the poverty, lack of financial resources to buy them, and this is reasonable because students do not have enough income to buy materials other than school related materials. Even though in most of cases it is bad for young people to be involved in sexual activities but the results showed it happen at a big scale. Moreover, 27.9% of respondents who did not use protection during their last sex intercourse said that it was because of other reasons including lack of

knowledge; being too young; not planned or Happen accidentally no contraceptive method was available; aothers said it was because of forced sex and Violence ; and religious believes.

#### 4.6 Self reported knowledge on consequences of earlier sexual activities among A level students

The results in table 11 below present the percentage of students who say that they have knowldge on consequences of ealier sex among students. The findings shows that even though the percentage of students who had sex activity is high, the results indicate tha 93.9% of all interviewed students have information on the consequences of premarital sex intercourse.

**Table 11.self reported knowledge on possible consequences of early sex intercourse**

Variable	Frequency	Percent	Cumulative Percent
know consequences of earlier sexual activity	Yes	247	93.9
	No	16	6.1
	Total	263	100.0

**Table 12. Knowledge on major consequences of earlier sex intercourse among A level students**

Major consequences of earlier sex intercourse	Frequency	Percentage
Unwanted and ealier pregnancy, abortion, and early responsibility, leading to poverty and streets children, burdern to families	206	35.03
Poor performance, droup out at schools and Poor Future carrer development	94	15.99
Leading to prostitution/sex addicted and other health plobem	30	5.10
Contamination of sexual transmission deases(HIV/AID,etc..), and Death	236	40.14
Loose of family and society respect, being ashamed	14	2.38
Psychologically problem	8	1.36

In addition, this research explored the understanding of students on the consequences of earlier sex activity and the results are displayed in table 16 below. A big number of respondents (40.14%) said that earlier sex can cause sexual transmission disease and possibly leads to death, while 35.03% said that the premarital sexual intercourse can cause unwanted pregnancy, abortion for young girls, earlier responsibilities, poverty due to unplanned babies, increases children in street etc.

The earlier sex can also lead to many drop out especially for girls, causes poor performance in studies, affecting students' career development. Moreover, some other possible consequences include prostitution, harm in society and loss of respect in the family and society in general.

## **4.7. DISCUSSION**

### **4.7.1. Level of sexual activity among A level students at Collège Saint André**

Results in table 4 indicated that 41.1% of respondents have had at least one sex intercourse. Thus, some A level students at Collège Saint André have sexual interests as this behavior occurs around puberty and continues through adolescence. These findings are similar to what Laddunuri, (2013) found that more than one third (40.2%) of the participant students had experienced intercourse with mean age  $17.2 \pm 1.8$  years and one sixth (17.6%) of the participants had multiple sexual partners.

Results in figure 2 indicate that 47% of male students in A level have had sexual activity compared to 30% of female had sexual activities. These results clearly show that young men have a very strong passion about sex and they try to satisfy themselves quite accidentally. These findings are quite related to what Louis Odeigah, (2019) found that majority, 305 (69.5%) of the students who had sexual intercourse were between 16 and 20 years. Among these results and 46.7% were male while 22.8% were female whether he concluded that males are more prone to high risk sexual behavior than female.

In the cross tabulation 7, the results indicated that 36.4% of students aged twenty years and above did not have sex, while 41.8% and 41.6% of students aged between sixteen and less, and between seventeen and nineteen respectively had sex activity. This indicates that sexual activity is much more among younger students than older students. These findings are consistent to what Olaseha I.O., (2004) demonstrated that more than one third of the students had sexual intercourse in their late adolescent with mean age  $17.2 \pm 1.8$  and in this study,

17.6% of the students had multiple sexual partners. Adolescents who begin sexual activity early are more likely to have more sexual partners, and exposed more to the risk of sexual transmitted diseases.

#### **4.7.2. Factors associated with sexual activity among A level students at Collège Saint André**

From the findings, 46.7 % of students who had sex are those originated in Kigali followed by 28.0% in North and the lowest number was found in the western province where only 25% students from western province have had sexual activity. These finding are consisten with the findings of Yi Song, (2010) who found that sexual intercourse and high-risk sexual behaviours was lower among students who lived in developing cities or districts than students who lived in high developed or middle developed cities or district (4.3 versus 5.1 and 5.0%,  $\chi^2 = 29.2$ ,  $P < 0.001$ ).

The findings of table 7 showed that About 59% of students from rich families (in fourth ubudehe category) have had sexual activity, while only 18.9% of students who came in poor families (second ubudehe category) had sexual intercourse. Thus, material satisfaction and economic class of the family has important contribution of students' behavior about sexual activity. These findings are similar to what Wepukhulu, (2012) found that poverty and economic depravity in particular, has also been strongly linked to premarital sexual activity among young people especially among girls. He stressed that girls who are inadequately provided for in terms of basic needs are often exposed to the temptation of seeking financial rewards from young and older men for sexual favours in return.

The sexuality is higher among students who come from rich families while it lowers for students in poor families. This can be explained by the fact that rich families have televisions, and other facilities which increase the exposure of their children in different activities which increase their desire of sexuality compared to the poor families. However, poverty can also be a major driver especially for girls' children to be involved in sexual activity for the sake for satisfying their primary needs which is fulfilled by parents because of poverty.

This confirms the results from the binary logistic regression where demographic individual variables such as age, area of residence and current level of study has not showed a statistical significance on influencing student's sexual behavior. But it is clear that students are much influenced by earlier loves and friendship, moreover the advancement of technology which exposure students to the internet and have access to sexual films have had an contribution to

accelerate sexuality among students. Students from rich and parents with higher education levels which is also linked indirectly to the family welfare are more involved in earlier (premarital) sexual activity than students coming from moderality and poor households.

From the findings 56.9 % of those who had sex intercourse said that they were pushed by the curiosity, desire to know, and the discovery purposes followed by 13.8% of those who motivated to have sexual intercourse by gift. These findings are similar to what Kanku et al, (2010) found that poor knowledge on sexual health as well as contraceptive methods poses a risk to students and teen to engage in sexual activities and risking to pregnancy. Because appropriate knowledge is a key to good beliefs and attitudes, lack of knowledge leads to poor attitudes towards contraceptives and condoms, increasing the chances of pregnancy.

Another big number of respondents 11.9% indicated that their first sex intercourse was caused by the peer pressure from their colleagues. These result are similar to what Hughes & McCauley, (2008) found that some students join peer groups that encourage promiscuity rather than academics. From this, they can think it's important to have a boyfriend and or a girl friend. With all of the misconceptions about sex, they end up experimenting.

The results indicate that only 3.7% of respondents had sex intercourse by force and violence. Amongst other reasons not specied includes personal leasure, and desire for having sexual intercourse or body desire. These findings are consistent to what Rasch et al., (2000) who found that girls were sexually active at early age, having sex mainly with men older than themselves. Most of the girls considered themselves to be in love with and actually enjoyed sex with their older partners. Among the reasons for establishing relationships were to obtain money or gifts exchanged for sex.

#### **4.7.3. Contraceptive methods used and reasons of engaging in sexual activity among A level students at Collège Saint André**

From the findigs, 47.7% of all students involved in sexual activities reported that they have used contracteptive method for avoiding unwanted pregnancies. These findings are similar to what Manlove, (2003) found that teenagers who had waited a longer time between the start of a connection and first sex with that partner, discussed contraception before first having sex or used dual contraceptive methods had significantly increased odds of ever or always using contraceptives.

The contraceptive use among the students is not high as more than a third (39.4%) did not use any contraceptive method even though they have had sex intercourse. These findings are consistent to what Bliss Kaneshiro, (2017) found that Adolescents face unique barriers in accessing contraceptive services, including concerns about confidentiality and cost. Also some of the reasons were provided by the respondents, and they 65.1% revealed that contraceptive method during their sex activity was not necessary for them, while only 7.0% said that it was due to the poverty, lack of financial resources to buy them, and this is reasonable because students do not have enough income to buy materials other than school related materials. These findings are related to what Wepukhulu, (2012) confirmed that misinformation, lack of accurate information, and poor access to contraception increases vulnerability of teenage girls to early pregnancy and in most cases these girls often take risks, to some extent knowing that they can become pregnant and in many cases wanting to get pregnant in order to get married (Wepukhulu, 2012).

Due to the globalization and the presence of internet, it very easy for young children to access information about sexuality, this study revealed that more than a third of A level students have ever had at least one sexual intercourse. However, the percentage of those who use contraceptive method is quiet moderate. About 61% students who reported that they had sexual intercourse used any method of preventing unwanted and unplanned pregnancy. On the other side, they should not only fear pregnancy but also other sexual transmission disease including HIV which can affect their future life.

#### **4.7.4. Suggestions to Further Researches**

The future researchers are advised to take the findings of this study as reference by considering other elements to show also the result of students involvement in sexual activity participation and accomplish what the researcher did not reach. The study recommends that that similar study should be done in other schools or at a country wide level check if there will be a variance in the results. Further researchers should conduct the given topics like the contribution of parents time and influence of ICT development on sexuality among young people importantly on A level students behavior towards earlier sexual activity.



## **CHAPTER V: CONCLUSION AND RECOMMENDATION**

### **5.1 Summary of Major Findings**

- Results on the Level of sexual activity among students indicated that 41.1% of respondents have had at least one sex intercourse. Also result indicates that 47% of male students in A level have had sexual activity compared to 30% of female had sexual activities. The results indicated that 36.4% of students aged twenty years and above did not have sex, while 41.8% and 41.6% of students aged between sixteen and less, and between seventeen and nineteen respectively had sex activity.
- Most of students who had sex intercourse were pushed by the curiosity, desire to know, and the discovery purposes while others are motivated to have sexual intercourse by gift. Poor knowledge on sexual health as well as contraceptive methods, Peer pressure from their colleagues is also the most factors contributing to student pregnancy.
- Results Contraceptive methods used and reasons of engaging in sexual activity among students showed that 47.7% of all students involved in sexual activities reported that they have used contracteptive method for avoiding unwanted pregnancies. The contraceptive use among the students is not high as more than a third (39.4%) did not used any contracetive method even though they have had sex intercourse

### **5.2 Conclusion**

A large number of students initiate sexual activity at early age. The practice is associated with religion of students (catholic and Protestants), class performance and education of parents. Hence, there is a need to promote specific intervention programmes built upon those factors which are associated with an increased likelihood for early sexual introduction.

### **5.3 Recommendations**

- Due to the high rate of sexual intercourses among students, it is recommended that family life or sexuality education, starting early, through primary, secondary be institutionalised. This is to equip our youths with correct information to enable them make informed choices about responsible sexual life.
- there is a need to promote specific intervention programmes built upon those factors which are associated with an increased likelihood for early sexual introduction and risky sexual behaviour.

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## Appendices

## **Appendix i: Participant information sheet**

**Title of the study:** Sexual activity and its associated factors among A level students. Case study of Collège Saint André.

**Investigator:** Emmanuel Ndagijimana, a Mastes student in Masters of Science in Epidemiology, School of Public Health, Collège of Medicine and Health Sciences, University of Rwanda.

We guaranty the confidentiality and anonymity of your responses. Feel free to answer the questions of this research.

We are doing research because we want to know the level of sexuality and associated factors in this School. Your responses will help us to put in place mechanisms aiming at helping you and your colleagues in reproductive health. Therefore your responses are very important.

We are requesting you to be frank and sincere in your answers. We don't need your names or any other information that can be used to identify you.

- ✓ You will not write your name and we will not ask you that.
- ✓ No one will know you specific answer neither teacher, mates even parents because we are going to be confidential.
- ✓ You have right to participate in this research or not, there isn't a problem with that.
- ✓ You can start and stop your participation when you want.
- ✓ We request you if you agree to participate to be truthful, if you have any doubt on question just ask for clarification.
- ✓ Some questions will be answered by true or false and some others will request you to write an answer you think is collect.

Start by reading, understanding then answering.

## Appendix ii: Consent form: English

**Title of the project:** Sexual activity and its associated factors among A level students. Case study of Collège Saint André.

I have read the Information Sheet for Participants for this study and have had the details of the study explained to me. My questions about the study have been answered to my satisfaction, and I understand that I may ask further questions at any time.

I also understand that I am free to withdraw from the study at any time, or to decline to answer any particular questions in the study. I agree to provide information to the researchers under the conditions of confidentiality set out on the Information Sheet.

I agree to participate in this study under the conditions set out in the Information Sheet / form.

Signed: \_\_\_\_\_

Name : \_\_\_\_\_

Date : \_\_\_\_\_

Researcher's Name and contact information:-

Supervisor's Name and contact information:-

## Numero y'ifishi y'ibibazo:

NB: Turagusaba kuvugisha ukuri kwawe kose ntacyo utinya kuko ibyo usubiza byose ari ibanga ;nta muntu n'umwe uzamenya ibyawwe ndetse nta ngaruka mbi izakubaho kubw'ibisubizo utanga.

## Itsinda A: irangamimerere ry'ubazwa

1. Ishami wigamo .....
2. Umwaka mwigamo .....

Imyaka y'umunyeshuri

3. Igitsina : gabo.....1      gore .....2

4. Idini asengamo :

- Gaturika .....1
- Umuporotestanti.....2
- Umudiventisiti .....3
- Umuyisilamu .....4
- Irindi (rivuge).....5

5. Ucumbitse mu kigo.....1      wiga utaha .....2

6. Uturuka mu kahe karere? Vuga izina ry'ako karere?.....

7. Irangamimerere Marital status: ingaragu.....1      urubatse.....2  
ikindi.....3

8. Imitsindire mu ishuri: mu gihembwe gishize, mu ishuri wigamo, ese wabayeho uwakangahe

- Muri batanu ba mbere 5 top students .....1
- Kuva kuri batanu kugera ku icumi.....2
- Kuva ku icumi kugera kuri cumin a batanu.....3
- Guhera kuri makumyabiri no gusubiza hejuru.....4

9. Ufite xdxcababyeyi bombi (Papa na Mama)? Yego .....1 Oya.....2
10. Niba ari yego, murabana bombi Yego .....1 Oya.....2
11. Niba utabana n'ababyeyi bawe bombi, ubana nande:
- Mama wenyine .....1
  - Papa wenyine .....2
  - Undi muntu wo mu muryango (muvuge urugero Marume, masenge, ndibana.....3
12. Uwo mubana yize amashuri kugeza mu kihe kiciro?
- a. abanza.....1
  - b. ayisumbuye.....2
  - c. kaminuza.....3
  - d. ntago mbizi .....4
  - e. yize ibindi (sobanura).....5
13. umuryango wanyu ubarizwa mu kiciro cy'UBUDEHE cya kangaha?
- Icyiciro 1.....1
  - Icyiciro 2 .....2
  - Icyiciro 3.....3
  - Icyiciro 4 .....4
  - Ntago mbizi.....5
14. ese ubunona ibyo ukeneye byose bya buri muni haba mu rugo cy'ishuri?
- a. Yego
  - b. Oya
15. Niba igisubizo ari oya, ukekako ari iyihe mpamvu ituma utabibona?
- a. Kubera ubukene .....1
  - b. Iwacu ntago baba bashakaga kumpa ibyo ukeneye bya buri muni.....2
  - c. iyindi mpamvu (sobanura) .....3



**itsinda B: ubumenyi ku ubuzima bw'imyororokere mu rubyiruko ruri mu ishuri**

16. ese waba warigeze w'umva ibijyanye nimibonano mpuzabitsina? 1.Yego ... 2.Oya
17. Niba yego ubyumvishe kangahe mu mwaka ushize?.....
18. Ese waba warigeze ukora imibonano mpuzabitsina Yego.....1 Oya.....
19. Niba ari Oya, simbuka usubize ikibazo cya 27 na 28 gusa.
20. Niba ari yego, Ukora imibonano mpuzabitsina bwa mbere wari ufite imyaka ingahe?.....
21. Ese ubwo uheruka gukora imibonano mpuzabitsina waba warakoresheje uburyo bwo kwirinda inda utateganyije cg izindi ndwara zandurira mu mibonano mpuzabitsina ?Yego .....1 Oya.....2
22. Niba ari yego ni ubuhe buryo wakoresheje? 1. Agakingirizo....  
2.ibinini.....3.urushinge....4.agapira ko mukaboko 5.agapira ko mu mura  
6.ntibijyanye
23. Niba ari oya, ni iyihe mpamvu yatumye udakoresha uburyo bwo kwirinda ?
- Ntago twari dufite ubushobozi bwo kubona uburyo bwo kwirinda (ubukene).....1
  - Njye nuwo twakoranye imibonano mpuzabitsina ntitwashakaga kubukoresha.....2
  - Izindi mpamvu.....3
24. Ni iyihe mpamvu yatumye ukora imibonano mpuzabitsina uheruka gukora?
- a. Kubera amatsiko.....1
  - b. Uwo twayikoranye yari yanyemereye impano.....2
  - c. Nari nanyoye ibiyobyabwenge
  - d. Nagendeye mu kigare
  - e. Nayikoze kubera ubukene/ nashakaga amafaranga.....3
  - f. Nafashwe kungufu.....4
  - g. Iyindi mpamvu  
(yisobanure).....5
25. Ese uracyari inshuti nuwo muheruka gukorana imibonano mpuzabitsina?
- a. Yego.....1
  - b. Oya.....2

- 26.** Ese ni iki cyaba cyaraguteye gukora imibonanno mpuzabitsina bwa mbere?
- a. Ikiganiro narebye kuri tvelevision.....1
  - b. Filimi narebye.....2
  - c. Ikiganiro numvise kuri Radiyo.....3
  - d. Nabishishikarijwe nuwo twayikoranye.....4
  - e. Nabyumvanye inshuti zanjye.....5
  - f. Nafashwe ku ngufu.....6
  - g. Ibindi (bisobanure).....7
- 27.** Ese uzi ingaruka ziterwa no gukora imibonano mpuzabitsina ukiri muto? Yego .....1  
Oya.....2
- 28.** Niba ari yego ni izihe ngaruka mbi uzi ziterwa no gukora imibonano mpuzabitsina ukiri muto?  
.....  
.....  
.....

We thanks you for your answers and your honesty. The contribution you give is very important and it will help in making programs that will improve the sexual life of your mates and other teenagers.

If you have any question feels free to ask.

### Appendix iii: Questionnaire

Title of the study: Sexual activity and its associated factors among A level students. Case study of Collège Saint André.

#### No of questionnaire:

**NB**: we request you to be honest and sincere while responding because all your answers are confidential. No one will know your answers and you will not face any consequence because of your answers. Don't put your names.

#### Section A: SOCIO-DEMOGRAPHIC DETAILS OF THE PUPIL

1. Combination .....
2. Class .....
3. Age:
4. Sex : male.....1      female.....2
  
5. Religion :  
  
    Catholic .....1  
    Protestant .....2  
    Adventist .....3  
    Muslim .....4  
    Other (specify).....5
6. Boarding .....1      Day .....2
7. In which District do you come from? Name of the District .....
8. Marital status: Single .....1    Married.....2    Other .....3
9. Performance in class: in last trimester, in your class, you have been among :  
    5 top students .....1  
    10 top students .....2  
    15 top students .....3  
    20 top students or more ...4

10. Do you have 2 Parents (mother and father)? Yes .....1 No .....2

11. If Yes, do you live with your 2 parents? Yes .....1 No .....2

12. If you don't live with your 2 parents, who do you live with:

Mother only .....1

Father only .....2

Other family member (specify. For example uncle, aunt, alone,..... )  
.....3

13. What is the highest educational level of the person you live with?

Primary school.....1

Secondary school.....2

University level.....3

I don't know.....4

Others(explain).....5

14. What is the UBUDEHE category of your family

Category 1.....1

Category 2 .....2

Category 3.....3

Category 4 .....4

Don't know .....5

15. Do you get everything you need in general life and at school?

Yes

No

16. If the answer is "no" what is the reason?

Poverty .....1

They don't want to give me what I need .....2

Other reasons (explain) .....

**Section B: LEVEL OF SEXUALITY AMONG YOUNG SCHOOLING CHILDREN**

17. Have you ever heard sexual intercourse in your life? Yes....1 No .....2
18. If yes, how often during last 12 months? .....
19. Have you ever had a sexual intercourse in your life? Yes....1 No .....2
20. If no, go to respond 28 and 29 only.
21. How old were you when you had your 1<sup>st</sup> sexual intercourse? .....
21. Did you use any proction against pregnancy or disesases at your last sexual intercourse ? Yes .....1 No.....2
22. If yes what kind of protection did you use 1.condoms, 2.pills,3injectables, 4.implants, 5.IUD 6.not applicable
23. If you didn't use any protection, why ?
- We didn't have protection mean.....1
  - Me or my partner didn't want it .....2
  - Other reasons .....3
24. What was the reason for having sexual intercourse the last time you did it?
- Curiosity.....1
  - My partner promised me a gift.....2
  - I tooked the drug (drug abuse)
  - Because of peer pressure
  - I did it because of poverty/I needed money.....3
  - I have been raped.....4
  - Others (explain).....5
25. Are you still friend with your last sexual partner?
- Yes.....1
  - No.....2
26. What pushed/incitated you to do sexual intercourse for the first time?
- Television show.....1
  - Movies/films.....2
  - Radio.....3
  - Informed by my partner.....4

Heard from my friends.....5

I has been raped.....6

Others (explain).....7

27.Do you know any consequence of having sexual intercourse at younger age?

Yes .....1 No .....2

28.If Yes, what consequences do you know?

.....  
.....  
.....

We thanks you for your answers and your honesty. The contribution you give is very important and it will help in making programs that will improve the sexual life of your mates and other teenagers.

If you have any question feels free to ask.

**THANK YOU FOR YOUR COOPERATION**

## **Ibibazo bijyanye n’ubushakashatsi ku bumenyi ku mibonano mpuzabitsina mu rubyiruko**

### **Appendix iv: Ibisobanurirwa ubazwa**

**Ukora ubushakashatsi:** Ndagijimana Emmanuel, a Mastes student in Masters of Science in Epidemiology, School of Public Health, Collège of Medicine and Health Sciences, University of Rwanda.

Iyi nyandiko irizeza gukorana ibanga no gusaba umunyeshuri ubushake bwo gusubiza ibibazo by’ubushakashatsi.

Turagira ngo duhere ku bumenyi mufite ku bijyanye n’ubuzima bw’imyorokere ndetse n’ibirebana n’indwara zifatira mu myanya ndanga gitsina hanyuma tuzarebere hamwe ingamba zafatwa tugamije kubafasha kugira ubuzima bwiza buzira umuze bushingiye ku buzima bw’imyorokere, murindwa kubyara imburagihe cyangwa kwandura indwara zinyura mu myanya ndangagitsina.

Kugira ngo ibyo tubigereho rero, hari ibibazo twabateguriye bizadufasha kumenya imyumvire yanyu kuri ibyo bibazo byugarije urubyiruko ndetse nuko twafatanyaga kubishakira umuti urambye. Turifuza ko mwasubiza neza uko mubyumva, uko mubibona ariko mukagerageza kuvugisha ukuri kose kuko uko kuri ariko kuzatuma tugera ku myanzuro izatugirira akamaro bityo tugasohozaga za ngamba twiyemeje.

Byukuri ntumugire ikibazo cyangwa ubwoba byo gusubiza uko mubyumva kubera impamvu 5 zikurikira:

- ✓ Nta mazina azandikwa kuri izi mpapuro, ndetse nta nayo tubabaza.
- ✓ Nta muntu numwe uzamenya ibyo wasubije, yaba mwarimu, yaba bagenzi bawe ndetse n’ababyeyi bawe kuko dukorera mw’ibanga kuburyo bukomeye.
- ✓ Aha rero ufite uburenganzira busesuye bwo kwemera cyangwa kwanga gusubiza ibi bibazo; humura nta nkurikizi wazagira ngo kuko wanze gusubiza
- ✓ N’ubwo waba wemeye gusubiza ushobora kubihagarika mu gihe cyose wasanga utagishaka gukomezanya natwe mu bushakashatsi.
- ✓ Niba rero ubyemeye, subizanya ukuri buri kibazo cyose utabeshya. Haramutse hari icyo utumva wasobanuzaga. Hariho ibibazo uzajya usubiza ukoresheje “Yego” cyangwa “Oya”, hari n’ibindi uzajya usabwa kwandika wenyine igizubizo ubona ko aricyo gikwiye.

Tangira rero usome ibibazo maze usubize.

## Appendix v: Consent form: Kinyarwanda

Maze gusoma ibisabwa muri ubu bushakashatsi kandi ngahabwa ibisobanuro mu buryo busesuye, nyuzwe n'ibisubizo mpawe bijyanye n'ibibazo nari mfite byose , kandi numvise ko nshobora no kubaza n'ibindi bibazo nazajya mpura nabyo nyuma.

Na none numvise ko nshobora kuva muri ubu bushakashatsi mu gihe cyose nshakiye guhagarika ndetse nemerewe no kureka ibibazo bimwe na bimwe bijyanye n'ubu bushakashatsi.

Nemeye gutanga amakuru yose ku mushakashatsi ariko k'uburyo bw'ibanga ku byanditse kuri uru rupapuro.

Nemeye gufatanya n'umushakashatsi mu buryo bwo gutanga amakuru.

Umukono: \_\_\_\_\_

Amazina: \_\_\_\_\_

Taliki : \_\_\_\_\_

Amazina n' adresse by'umushakashatsi:

\_\_\_\_\_

Amazina y'uzayobora ubushakashatsi:

\_\_\_\_\_