Examining the Sexual and Reproductive Health Literacy Crisis for Adolescents in Rural[1] Primary Schools in Kisii Central Sub-County, Kenya

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[1] The term is used in this study to mean "not in the city". These areas may be around local towns and markets but the lives of people living here do not have the bustle of the big city and are tied together by some common practices and beliefs. People living in this area also share a mother tongue and for this study they share the Ekegusii language.

Abstract

Kisii Central Sub-County is one of the most densely populated sub-counties in rural Kenya with a population growth rate of 2.75% compared to 2.28% national population growth rate, according to the National Council for Population and Development (NCPD, 2017). Records available from several health facilities in Kisii County indicate that teen pregnancies are on the rise (Abuga, 2019). The fact that Kisii Central Sub-County continues to experience a surge in the number of teen pregnancies is a serious concern among health professionals, educationists, politicians and other stakeholders in the Sub-County. This challenge is caused by both lack of information or limited access to sexual and reproductive health information and services, among other factors as noted in the NCPD report (2017). Research conducted in Tharaka Nithi County (2018-2019), revealed that girls' lack of exposure to knowledge on menstruation and sexual reproductive health information and services, contributed towards high levels of teen pregnancies (Muriungi and Andima, 2020). This is a clear testimony that issues of sexual and reproductive health education need to be key in girls' empowerment programmes in Kenya. This study therefore sought to establish the nature of Sexual and Reproductive Health Literacy Materials (SRHLMs) available to adolescent girls in Kisii Central Sub-County, how the materials were accessed, and whether the adolescents were able to comprehend messages contained in these materials. The study included 225 pupils in grades 5, 6 and class 7 aged between 10-15 years from five (5) primary schools, 20 teachers, 5 deputy head teachers (one from each of the 5 schools), 5 head teachers (one form each of the 5 schools) and 20 community leaders (four from each school). Descriptive survey research design was used to generate data on the status of the SRHLMs in Kisii Central Sub- County. Both quantitative and qualitative data were collected. The study was guided by Anna Kågesten & Miranda van Reeuwijk's conceptual framework for adolescent sexual wellbeing (2021). It was established that there were limited SRHLMs for adolescents in the research community and the comprehension level by the adolescents was relatively low. A number of recommendations have been made to help address challenges teens face in addressing their sexual and reproductive health needs.

Key Words: Teenage pregnancies, Sexual Reproductive Health Literacy Materials(SRHLMs), Kenya, Access.

1. INTRODUCTION

1.1 Background to the Study

Research has shown that although there is great demand for sexual and reproductive health (SRH) information and services in Kenya, adolescents and youth who constitute the majority of the country's population still cannot access such crucial information and services. (Godia et al 2013)[2] This lack of access to SRH information has often resulted in escalated levels of teenage pregnancies in the country. For instance, Muturi (2020)[3] reports that between July 2016 - June 2017, Kenya recorded 378,397 teen pregnancies with 28,932 of this being between 10-14 years old. In addition, in their research on adolescent sexual health in Kisii County, Muendo, et al (2019)[4] show that adolescents in this region are underutilizing information on SRH services, considering the challenges associated with pregnancy and delivery. This corroborates with records available from several health facilities in Kisii County which indicate that teen pregnancies are on the rise (Abuga, 2019).[5] Further, Oroko (2015) shows that majority of adolescents and young people in Kisii do not have access to SRH information, either from the national policy stand point or the local communities, thus denying them the opportunity to understand the consequences of early engagement in sexual

[2] https://pubmed.ncbi.nlm.nih.gov/24229365/

[3] ncpd.go.ke › teenage-pregnancy-in-Kenya

[4] http://www.kenyapaediatric.org/wp-content/uploads/2018/05/Abstract-14-Adolescent-Sexual-Health-in-Kisii-County.Knowledge-Attitudes-and-Practices.pdf

[5] www.standardmedia.co.ke ›

activities. Additionally, Nyagesiba (2019) quotes a nominated Member of County Assembly (MCA)Josephine Ombati lamenting over the rise in teenage pregnancies in Kisii County. After the on-set of the COVID-19 period the rise in teen pregnancies was observed to be one of the significant challenges that faced girls in Kenya due to the prolonged period away from school and the associated sexual vulnerabilities. This was attributed to insufficient funding for SRH services and a lack of comprehensive sex education in schools (*The New Humanitarian*, 13th July, 2020).

The fact that Kisii Central Sub-County continues to experience a surge in the number of teen pregnancies is a serious concern among health professionals, educationists, politicians and other stakeholders. This challenge is caused by lack of information or limited access to sexual and reproductive health information and services as noted in the NCPD report (2017). In their study, Muriungi and Andima (2020)[6] observed that lack of access to Sexual and Reproductive Health Literacy Materials (SRHLMs) significantly contributed to early teenage pregnancies thus affecting girls' access to education. The two show that due to inadequate knowledge and lack of support systems during adolescence/pre-adolescence, girls are often unprepared to make informed decisions about their reproductive and sexual health. In addition, girls experiencing these menstrual related challenges, not only fail to succeed in their studies but also fail to develop a positive self-image. The findings of this research pointed to a need for concerted efforts to improve life skills and SRH education in order to create an impact on the lives of adolescents in the County. In fact, SRH literacy has a critical role to play in enhancing teen's ability to make informed decisions regarding their sexual engagements.

Although there is evidence of interventions on SRH for youth in and out of school in Kenya, there is scant research specifically focusing on the assessment of SRHL in Kisii County. In response, this study investigated the nature of available SRHLMs and how they are utilized by 10-15-year-old school going adolescents in Kisii central Sub-county, Kenya. This was a follow up study to the one done by Muriungi and Andima in Tharaka Nithi County mentioned above, which focused on girls' access to education. Although the two research contexts do not share the same geographical locations, they have similar cultural belief systems and practices, some of which significantly influence access to, and utilization of SRHLMs.

The study was guided by the following research questions:

i. What are the types of SRHLMs available for 10-15-year-old adolescents in selected primary schools?
ii. How do schools support adolescents to access the available SRHLMs?
iii. What is the reading and comprehension ability of the 10–15-year-olds related to the SRHLMs available to them?
iv. Do the 10–15-year-olds make practical and effective use of the available SRHLMs?

[6] https://code.ngo/wp-content/uploads/2020/05/A-Gender-Community-Outreach-for-Girls-Living-in-Vulnerable-Contexts-Kenya-May-2020.pdf

v. What challenges do adolescents face in accessing SRHLMs?
vi. What challenges do adolescents face in making use of messages contained in the available materials, in and outside of school?
vii. How does the community get involved in supporting adolescents' access to SRHLMs?

2. THEORETICAL PERSPECTIVE

The study was guided by Anna Kågesten & Miranda van Reeuwijk's conceptual framework for healthy adolescent sexuality development (2021). The two identify six key competencies for healthy adolescent sexuality development drawing on theories and literature related to positive youth development, empowerment, human rights, gender, social-ecological and life-course perspectives. The key competencies include: sexual literacy, gender-equal attitudes, respect for human rights and understanding consent, critical reflection skills, coping skills, and interpersonal skills. These competencies can be thought of as internal resources to support healthy sexuality development irrespective of whether a young person has engaged in any sexual activities. The study specifically relied on the sexual literacy competence approach. According to Anna & Miranda, sexual literacy refers to a developmentally and age-appropriate basic knowledge and access to information related to the human body, development, sexuality and Sexual and Reproductive Health Rights (111). The two argue that the specific content and meaning of basic understanding will vary according to age and developmental stage. In our context, we relied on the aspects they point out concerning sexuality education as the two argue that applying a rights-based approach to sexuality education has been found to boost positive attitudes towards sexual relationship rights, sexual self-efficacy and communication about sexuality and relationships. By examining the availability, access and the extent to which the adolescents in this study were able to comprehend the available SRHLMs, the study points out areas that need to be addressed to enhance sexual literacy amongst adolescents in Kisii Central sub-county.

3. METHODOLOGY

This section outlines the research context, target population and sample size, and data collection procedures.

3.1 Location of the Study

The study was located in Kisii Central Sub-county in Kisii County in Kenya. All the five schools that were involved in the study were drawn from Kiogoro and Masongo locations. The location of the Sub-County in the County is as shown in Figure 1 below:

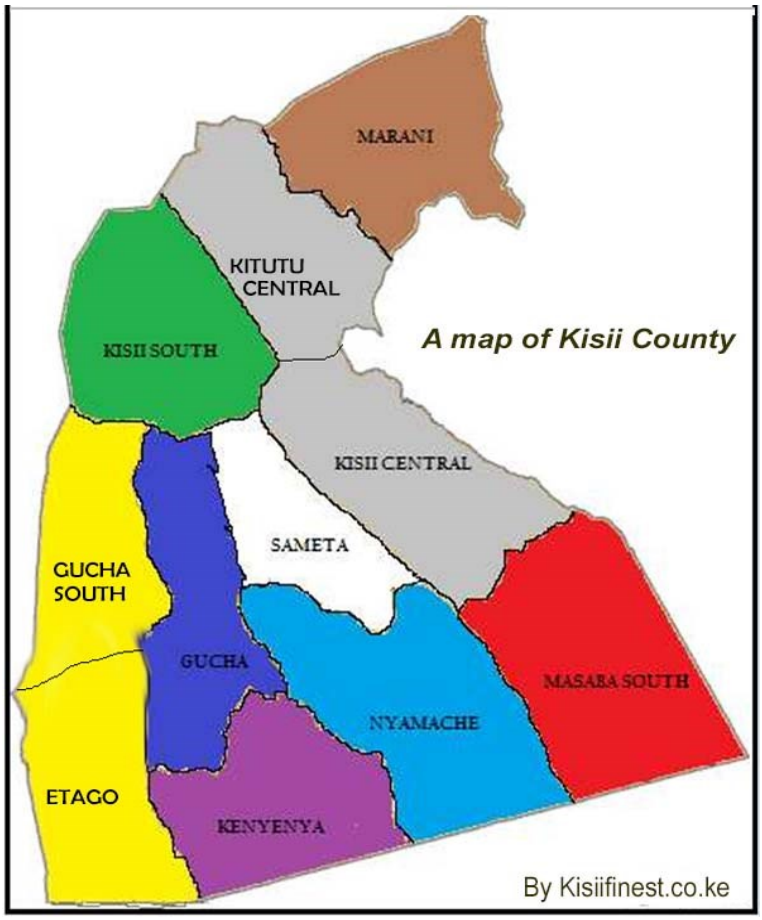

Figure 1: Map showing Location of Kisii Central Sub-county

3.2 Target Population and Sample Size

The participants for this study were drawn from a target population of approximately 750 pupils (all pupils in grade 5, 6, and class 7) aged between 10-15 years from five (5) primary schools. The five primary schools selected were: Ntundero Diocese of Kisii (DOK), Otamba DOK, Kiogoro District Education Board (DEB) Masongo DEB and Nyataro Church of God (COG) Primary schools. There were 50 pupils on average in each class in most schools in this region, placing the target population in each school at 150 pupils as we sampled three classes per school. Ary et al (1972), as cited in Andima (2014: 106), observes that 10-30% of a target population in descriptive studies is representative enough. The study therefore used simple random sampling to select 30% of the pupils from each class. This translated to 15 pupils in each class, making a total of 45 pupils from each school and a grand total of 225 pupils from the five schools. The pupil participants consisted of both boys and girls. Although the problem of teen pregnancy is borne by the girls, it was necessary to include boys, who are equal players in teen relationships that lead to early pregnancies and other associated challenges. The sample of girls' to boys' representation was determined proportionately from their numbers in each class. However, the number of girls was not lower than that of boys in either case. To capture the community's involvement in supporting adolescents in access and use of SRHLMs during the FGDs, the study

collected data from 20 teachers (4 from each of the 5 schools), 5 deputy head teacher, 5 head teachers and 20 selected community leaders (1 youth leader, 1 Community health volunteer, Board of Management (BOM) member and one religious leader from each school community). These samples were selected using purposive sampling.

3.3 Data Collection Procedures

Both quantitative and qualitative data were collected through the use of a questionnaire that had both closed- and open-ended questions. Quantitative data was collected from teachers and learners using the closed ended items of the questionnaire on the types and numbers of SRLMs available to adolescents, modes of accessing these materials by adolescents, the effectiveness and usefulness of the materials according to the adolescents. Qualitative data was collected using the open-ended items in the questionnaire from the learners and teachers on the challenges faced in accessing and making use of the said literacy materials and the possible ways of mitigating the challenges identified.

A pupils' comprehension test developed from a passage in one of the course books was used to test the adolescents' ability to comprehend selected SRH messages. The comprehension test required pupils to read an excerpt from the SRHLM and then identify key messages contained in the text and the meaning behind the messages. The comprehension consisted of ten multiple choice items.

Additional qualitative data was collected from teachers and selected community leaders through Focus Group Discussions (FGDs). The FGDs were mainly used to collect views on the community's support towards enabling adolescents' access to the SRHLMs and how they used them and to further find out the challenges adolescents faced in accessing SRHLMs and solicited the reasons behind the high teen pregnancies in the community and the possible ways of dealing with this challenge.

3.4 PHOTOS FROM FIELD VISITS

The photos below were taken during the research process and permission to use the photos was granted through verbal affirmation.

A. Phase One Data Collection Pictures (Survey)

Nyataro Primary school

Masongo Primary school

Ntundero Primary school

Otamba Primary School

Left: Kiogoro DEB Primary School and **right:** Dr. Andima with learners at Kiogoro – Survey session

Left: *Prof. Colomba guiding learners at Nyataro Primary (survey session) and* ***right****: Dr. Andima and Prof. Colomba guiding learners during the surveys at Ntundero Primary*

B. Phase Two Data Collection Pictures (Reading Comprehension Test and FGD Sessions)

Left: *Learners doing reading comprehension at Kiogoro Primary and* ***right****: Reading comprehension session at Otamba Primary School*

Dr. Andima and Prof. Colomba supervising comprehension assignment at Ntundero primary (Image Credit George and Colomba 2022)

A section of participants in FGDS

4. FINDINGS

4.1 Teachers' Demographic Details

a. Gender

Majority of the teachers involved in this study were female (60.0%) with fewer males (40.0%) as shown in Table 1 below:

Table 1: Teachers Gender Demographic

Teacher Demography	Category	Frequency (N = 20)	Percentage
Teachers by gender	Male	8	40.0
	Female	12	60.0

4.1.1 Level of Education

Amongst the twenty (20) teachers involved in this study, majority had acquired a diploma and above level of education (70.0%), while those with a P1 level of education accounted for 30.0% as shown of Table 2:

Table 2: Teachers' Level of Education

Teacher Demography	Category	Frequency (N = 20)	Percentage
Highest education attained	Masters	2	10.0
	B.Ed.	6	30.0
	Diploma	6	30.0
	P1	6	30.0

4.1.2 Teaching Experience

Most of the teachers sampled had a teaching experience of 15 years and above (50%), followed by those who had an experience ranging between 6-10 years (30%). The longest serving teacher had teaching experience of 32 years while the shortest serving teacher had teaching experience of 3 years. The spread of teaching experience is shown in Table 3:

Table 3: Teaching Experience

Teaching experience in years	Number of teachers (N = 20)	Percentage (%)
1 – 5 years	3	15.0
6 – 10 years	6	30.0
11 – 15 years	1	5.0
Over 15 years	10	50.0

4.1.3 Responsibility at Work

Data from all the schools show that fifteen (15) of the teachers sampled were class teachers and five were guidance and counselling teachers. A number of teachers in both categories had other responsibilities such as being in charge of games, drama, creative activities, examination coordination and staff welfare matters. All these responsibilities can be seen as enriching teachers' daily interactions with the learners and were significant in providing critical information on learners' sexual and reproductive health literacy information.

4.2 Pupils' Demographic Information

The pupils included in this research were aged between 10 and 16 years and were in grade 5 to class 7, as shown in Table 4 below. By age 10 pupils are expected to be in grade 5 if they progress uninterrupted from pre-school through to lower primary. From Table 4, it is clear to note that 48% of the pupils in grade 5 were one year late in their schooling, 26.7% were two years late, 13.3% were three years late and 1.3% were 5 years late in their schooling. In grade six, 57.3% were late by one year, 25.3% by two years, 5.3% by three years, 1.3% by four years and 1.3% by five years. In class 7, 48% were late by one year, 13.3% were late by two years, 6.7% were late by three years and 2.7% were late by four years. From this data, a good percentage of pupils who participated in the study were behind in their schooling schedule. Such delays in school schedules can be attributed to various factors which affect most learners in Sub-Saharan Africa. This is pointed out by Leora Klapper and Mansi Vipin Panchamia (2023) who argue that:

> Sub-Saharan Africa has the highest rates of education exclusion of the six developing world regions. Over one-fifth of primary-age children are out of school, and almost 60 percent of youth between the ages of 15 and 17 are not in school. There are many barriers to education for low-income households. One of them is school fees, which unfortunately remain widespread in schools across Sub-Saharan Africa, causing financial stress to families.[7]

The two further note that "in a dozen Sub-Saharan African countries, including Kenya and Nigeria, school fees is the most commonly reported financial worry (Ibid). Poverty is also linked to failure to attend school in a timely manner because more often than not, children from poor background delay attending school so that they can work to assist the family. In another study with the title, "Analysis of Impact "Of Free Primary Education In East Africa: A Case Study of Kisii County in Kenya (2003-2013)"[8], Oigara Manasi Peninah notes that, "[a] large section of teachers observed that

[7] https://blogs.worldbank.org/developmenttalk/high-price-education-sub-saharan-africa
[8] https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4225671/

parents with low education levels and low income are likely to encourage their children to leave school and seek employment" (24). Oigara further notes that "low incomes among Kisii County residents and low government financing have negative impacts on education indicators thus quality, retention, access and completion" (35).

This means that delay in schooling may be attributed to family related issues, like poverty, lack of school fees and failure to start school timely, plus personal issues like repeating classes due to poor performance; factors that teachers may not have control of. The difference in age gaps between the pupils may have some negative effect in terms of how such older pupils deal with sexual and reproductive health challenges while learning with pupils who are younger than themselves because of the embarrassment which is sometimes associated with menses among younger unknowledgeable girls

Table 4: Pupils' Age Distribution Across Grade/Class Levels

	Years						
Grades	**10**	**11**	**12**	**13**	**14**	**15**	**16**
5	8 (10.7%)	36 (48%)	20 (26.7%)	10 (13.3%)	00 (0%)	1(1.3%)	00 (0%)
6	0 (0%)	7 (9.3%)	43 (57.3%)	19(25.3%)	04 (5.3%)	1(1.3%)	01(1.3%)
Class 7	0 (0%)	06 (8%)	16 (21.3%)	36 (48%)	10 (13.3%)	5 (6.7%)	2 (2.7%)

4.2.1 Types of Sexual and Reproductive Health Literacy Materials Available for Pupils in the Selected Primary Schools in the Sub-County.

The pupils were asked to indicate the type of SRHLMs available in the community for their reading. From the responses, majority (87.1%) indicated that they got most of the information from passages contained in the pupils' course books (science course books, C.R.E course books, and Life Skills course books) and teachers' guidebooks, especially the life skills lesson books (51.1%), Ministry of Health leaflets (48.9%), storybooks (42.3%) and leaflets from visitors to the school (40.5%). This finding corroborates with information given by the majority of the teachers (Table 6) and community leaders from the focus group discussions. Other materials containing SRHL information included and posters (see Table 5). A few of the pupils indicated that some information on SRHL was available in newspapers and magazines, a source that was also mentioned by some community leaders.

Table 5: Available Sexual and Reproductive Health Literacy Materials in the Schools (Pupils)

Reproductive health materials	**Pupils**	**Percentage %**
Passages in course books for Science, C.R.E & Life Skills	196	87.1
Teacher guide (life skills)	116	51.1
Leaflets from the dispensary/hospital	111	48.9
Story books	96	42.3
Leaflets issued by a visitor to the school	92	40.5
Posters	45	19.8

Findings on the availability of the SRHLMs from the teachers sampled indicated that passages in pupils' course books (science course books, C.R.E. course books, and Life Skills course books) and teachers' guidebooks especially life skill constituted the greatest percentage of the available school SRHLMs for pupils. Story books (65as %), posters

(55%) and leaflets from the Ministry of Health (55%) were also indicated to contain SRH information. Leaflets from the Ministry of Education and talks from visitors to the school were not significant sources of SRHL information for pupils in the sub-County. To complement pupils' information on the availability of the SRHLMs, teachers were asked to respond to a teachers' questionnaire. Table 6 presents teachers' responses on the available SRHLMs in the schools sampled.

Table 6: Available Sexual and Reproductive Health Literacy Materials in the Schools (Teachers)

SHRLMs	**Frequency (%) N = 20**
Passages in course books (Science, C.R.E and Life skills)	20 (100%)
Teacher guide (life skills)	17 (85%)
Story books	13 (65%)
Posters	11 (55%)
Leaflets from the ministry of Health	11(55%)
Leaflets from the ministry of Education	6 (30%)
Leaflets from a Visitor to the school	4 (20%)

From Table 6, it is evident that SRHLMs were available from passages in course books while sources outside the classroom situations were least available. This means that adolescents were limited in accessing materials outside the school. It was further noted that the type of SRHLMs indicated to be available by pupils as well as the teachers in the school are not dedicated to addressing the SRH needs of the adolescents per se. In addition, a general observation from the FGD sessions also indicated that the SRHLMs were not sufficient and that they were quite shallow in content. In fact, the materials were either in form of passages or a sub-topic in pupils' course books in the subject areas listed early in this paper. This means that in most cases the content is taught theoretically to enable pupils to pass examinations, a situation that was ascertained by teachers during the FGD sessions. According to Anna Kågesten & Miranda van Reeuwijk (p.109) the ability of young people to translate competencies into desired actions and achieve a sense of sexual wellbeing partly depends on social, medical and economic resources available to them, on their (sexual) agency, and on the influence of social-ecological opportunity structures, which in the context of this study, were missing. It was observed from the study that no conscious effort was dedicated to teaching adolescents about the SRH issues because of the heavy workload teachers were handling. Teachers therefore felt that this responsibility should best be handled by the public health officers, who were not very responsive as there was no evidence of such interventions from the ministry having taken place across all the schools sampled.

4.3 Sources of Sexual and Reproductive Health Literacy Materials

The study sought to find out the source of the SRLMs available for adolescents. From the results, the pupils got course books in science, life skills and story books from the school library and teachers. Posters and leaflets from the ministry of health were mainly gotten from the local dispensaries, but very rarely. These posters and leaflets were provided to

the pupils by the teachers, and they did not contain elaborate information on issues of sexual and reproductive health. This is shown in Table 7.

Table 7: Sources of Sexual and Reproductive Health Literacy Materials (Pupils)

	Where the SRHLMs are accessed from				
Materials	**School Library**	**Teacher**	**Local dispensary**	**Local church**	**Other sources**
Science, CRE, Life Skills books	126 (56.0%)	145 (64.4%)	28 (12.4%)	14 (6.2%)	10 (4.4%)
Story book	94 (41.8%)	25 (11.1%)	22 (9.8%)	12 (5.3%)	12 (5.3%)
Posters	13 (5.8%)	10 (4.4%)	39 (16.9%)	7 (3.1%)	18 (8.0%)
Teacher life skills' guide	44 (19.6%)	79 (35.1%)	10 (4.4%)	7 (3.1%)	2 (0.9%)
Leaflets from the ministry of Health	14 (6.2%)	22 (9.8%)	14 (6.2%)	6 (2.7%)	8 (32.6%)
Leaflets from the ministry of Education	23 (10.2%)	11 (4.9%)	6 (2.7%)	2 (0.9%)	2 (0.9%)
Leaflets from visitors to the school	26 (11.6%)	7 (3.1%)	7 (3.1%)	4 (1.7%)	20 (8.9%)
Other materials	30(13.3%)	10(4.4%)	2(0.9%)	20(8.9%)	33(14.7%)

From Table 7, it is important to note that the dispensary which should be spearheading the adolescents' sexual issues is not a significant source of SRHLMs. Sexual reproductive health is a function in the Ministry of Health in Kenya. It is therefore expected that the public health professionals should be in the forefront in educating adolescents on issues of sexual and reproductive health, given the high levels of teen pregnancies in the Sub-County. This inadequate participation by the health professionals concerning sexual health matters in the Kenyan context points to lack of social, medical and economic resources that Anna Kågesten & Miranda van Reeuwijk (109) view as key to young people being able to translate competencies into desired actions therefore achieving a sense of sexual wellbeing. This lack of support for adolescents/ sexual matters is often attributed to the confusion that the health workers face when dealing with youngsters, sometimes because of cultural sanctions which lead to lack of clear understanding on how to approach the youth. For instance, Pamela Godia, et al, in a study that looked at the perceptions and experiences of Health Service Providers (HSP) in providing sexual and reproductive health (SRH) services to young people in Kenya, noted that majority of HSPs "felt they lacked competency in providing SRH services to young people …. [and] were conservative with regards to providing SRH services to the young people" because of cultural norms. In addition, Godia et al's research shows that the health workers were "torn between personal feelings, cultural and religious values and beliefs and their wish to respect young people's rights to accessing and obtaining SRH services".[9] The fact that the dispensary was not a significant source of SRHLMs is a serious gap worth paying attention to.

The local church was also not a significant source of SRHLMs. Whereas the church is assumed to be the moral prefect of society, there was no noted effort by the religious leaders to engineer campaigns to sensitize the youth on the danger

[9] https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4225671/

of early sexual engagements despite the high levels of teen pregnancy in the Sub-County. This can be attributed to a resistance by the church towards sex education in Kenya. For example, Doris Kathia points out that "Sex and Sexuality are delicate subjects to talk about in most Kenyan communities and churches. They have traditionally been taboo topics, and one is often stigmatized as promoting immorality by merely raising the subject"[10]. There is a lot of research in Kenya that demonstrates resistance from the church on the introduction of sex education in the school curriculum. Additionally, religious institutions often discourage intergenerational dialogue on SRH as evident during church forums. This means that in the context of this research, such attitudes might contribute to the reason why the health workers who are most often church members find it difficult to take an active role in matters of sexual and reproductive health.

Other sources of the SRHLMs as observed by the pupils were: older siblings, roadside posters, posters mounted in market centers, classmates, and friends. This was corroborated by the responses on the sources of the available literacy materials during the FGD sessions across all the sampled schools for the study.

The teachers also observed that the library and teachers were the main source of the SRHLMs (course book and story books and teacher guides, leaflets from the ministry of education) for adolescents in the Sub-County. The teachers indicated that the local dispensaries were the source of posters and Ministry of Health leaflets on SRHL. Other sources observed by teachers included excerpts from journals and newspapers. This is shown in Table 8.

Table 8: Sources of Sexual and Reproductive Health Literacy Materials (Teachers)

	Where the reading materials are accessed from				
Reading materials	**School library**	**Teacher**	**Local dispensary**	**Local church**	**Other sources**
Passage in class course book	16 (80.0%)	6 (30.06%)	0 (0.0%)	1 (5.0%)	0 (0.0%)
Story books	15 (75.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (5.3%)
Posters	1 (5.0%)	2 (10.0%)	6 (30.0%)	1 (5.0%)	0 (0.0%)
Teacher life skills' guide	11 (55.0%)	7 (35.0%)	1 (5.3%)	0 (0.0%)	0 (0.0%)
Leaflets from the ministry of Health	0(0.0%)	1 (5.0%)	11 (55.0%)	0 (0.0%)	0 (0.0%)
Leaflets from the ministry of Education	5 (25.0%)	6 (30.0%)	0 (0.0%)	1 (5.0%)	0 (0.0%)

4.4 Mode of Accessing the Materials

Teachers' as well as pupils' responses in the questionnaire indicated that they (pupils) accessed SRHLMs through teacher assignments. The pupils further pointed out that handouts during public health presentations were one of the main ways through which they accessed SRHLMs, a position that teachers did not agree with. This lack of congruency on the modes of accessing the SRHLMs is a pointer to a possible gap in addressing the SRH needs of adolescents in the research context. Other means of accessing the SRHLMs were through borrowing from the school library and

[10] https://nayakenya.org/2021/07/28/is-the-church-standing-in-the-way-of-reproductive-health/

classmates. To access teacher guides, especially for life skills, the pupils depended mainly on borrowing from the library and teacher presentations. Another mode of accessing the materials was through pastoral presentations which is often a one-hour session per week in primary schools in Kenya. The Pastoral Programme Instruction (PPI) curriculum is approved by the Kenya Institute of Curriculum Development (KICD) to cater for different faith traditions in schools. The programme aims to teach pupils about God and spirituality[11]. It is therefore possible that during the pastoral sessions religious doctrines of morality (instructions on sexual behavior) are more emphasized, which does not encompass the all-rounded approach proposed by Anna Kågesten & Miranda van Reeuwijk (2021). The two are of the opinion that strengthening healthy sexuality development involves "empowering young people to feel comfortable with the normative physical, emotional, cognitive and social (sexual) changes that they are going through, to navigate their surrounding contexts and to form mutually respectful relationships and interactions" (109). Anna Kågesten & Miranda van Reeuwijk further argue that calling for positive or healthy approaches to adolescents SRHR implies that adolescent sexuality involves more than (just) avoiding risks and unwanted consequences. The approach by the church can therefore be said to be inhibitive to adolescence in the process of understanding their sexual issues.

Although teachers as well as pupils did indicate that the SRHLMs were accessed from the school libraries, it was observed that books in the libraries in the schools were not displayed on shelves but were either in boxes or in cabinets. Libraries were therefore utilized as rooms where books were kept, and pupils were only able to borrow a given book when asked to do so by the teacher. Table 9 and table 10 indicate the pupils' and teachers' responses on how the SRHLMs were accessed respectively.

Table 9: **Means of Accessing SRHLs (Pupils)**

Materials	**Ways of Getting them**						
	Borrowing from school library	**Handouts during public health presentations**	**Teacher presentation**	**Teacher assignments**	**Pastoral presentation**	**Classmates**	**Other sources**
Science, CRE Life Skills books	23 (10.2%)	62 (27.6%)	46 (20.4%)	27 (11.9%)	27 (12.0%)	9 (4.0%)	78 (34.7%)
Story book	16 (7.1%)	17 (7.6%)	8 (3.6%)	4 (1.8%)	31 (13.8%)	5 (2.2%)	2 (0.9%)
Posters	**27 (12.0%)**	**14 (6.2%)**	**5 (2.2%)**	**7 (3.1%)**	**7 (3.1%)**	**9 (4.0%)**	**3 (1.3%)**
Leaflets	**18 (8.0%)**	**16 (7.1%)**	**7 (3.1%)**	**6 (2.7%)**	**6 (2.7%)**	**4 (1.8%)**	**6 (2.7%)**
Teacher guide (life skills)	**10 (4.4%)**	**46 (20.4%)**	**20 (8.9%)**	**9 (4.0%)**	**6 (2.7%)**	**5 (2.2%)**	**19 (8.4%)**
Others	**7 (3.1%)**	**28(12.4%)**	**12(5.3%0**	**6(2.7%)**	**4(1.8%)**	**4(1.8%0**	**74 (32.9%)**

Table 10: Means of Accessing **SRHLMs** (Teachers)

[11] https://biblesociety-kenya.org/programme-for-pastoral-instruction-ppi/

SRHLMs	Mode of Accessing to Reading Materials					
	Borrowing from available libraries	**Handouts from public health presentation**	**Teacher presentation**	**Teacher assignments**	**Pastoral presentation**	**Other modes (specify)**
Passages in course books	9 (45.0%)	0 (0.0%)	14 (70.0%)	5 (25.0%)	0 (0.0%)	0 (0.0%)
Teacher guide (life skills)	9 (45.0%)	1 (5.0%)	9 (45.0%)	1 (5.0%)	3 (15.0%)	0 (0.0%)
Story books	14 (70.0%)	0 (0.0%)	1 (5.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
Posters	0 (0.0%)	6 (30.06%)	0 (0.0%)	0 (0.0%)	2 (10.0%)	1 (5.0%)
Leaflets	**1 (5.0%)**	**7 (35.0%)**	**0** (0.0%)	**1 (5.0%)**	**1 (5.0%)**	**0** (0.0%)

Tables 9 and 10 show that there was evidence of accessing available SRHLMs through teachers' presentations. It should, however, be noted that the SRHLMs in teachers' presentations were part of the syllabus content in science, religious studies and in other subject areas where the topic or sub-topics appeared and their coverage was geared towards pupils passing examinations with little practical application to their lives as mentioned earlier.

4.5 School Support for adolescents to access the Available SRHLMs

The pupils were asked to indicate the nature of support schools gave them in terms of accessing the SRHLMs and the responses showed a range of support that included; invitation of public health professionals to give talks in schools (37.3%), encouragement to watch films (13.8%) and joining church groups (10.7%). Other forms of support mentioned by the pupils (77%) ranged from seeking parental and sibling support, on issues of sexual engagements. This is shown in Table 11:

Table 11: Pupils views on School Support on Access to SRHLMs

Support Type	No. of Pupils	%
Inviting a doctor/ nurse to talk to pupils	84	37.3
Encouraging pupils to join church groups	24	10.7
Encouraging pupils to watch films	31	13.8
Other supports	174	77.3

Responses from the teachers, showed that schools supported pupils to access the SRHLMs through encouraging them to borrow the materials from the library (50%), attend public health presentations (45%), and listen to community leaders' presentations (5%) whenever possible, as shown in table 12.

Table 12: Teachers Views on School Support for the Pupils' Access to the Reading Materials

Support Type	No. of Teachers	%
Organize Library borrowing	10	50.0
Public health presentation	9	45.0
Church library visits	0	0.0
Community leaders presentation	1	5.0

4.6 Challenges in accessing and utilizing the SRHLMs Messages in and Outside School.

When asked to indicate the challenges they faced in accessing and applying the messages contained in SRHLMs in and outside school, the pupils identified the following as their main challenges:

i. The lack of reading materials at home was greatly contributed to by the high levels of poverty.
ii. Parental control, whereby parents felt that allowing the adolescents to access these materials was away exposing them to negative influences.
iii. Lack of role models to advise on what to read and how to make use of the messages contained in the texts from both the school and from home.
iv. The unavailability of SRHLMs specially dedicated to teaching them the dangers of engaging in early sexual encounters between boys and girls is a problem.

The teachers on the other hand observed the following to be the challenges facing the pupils' access to and utilization of the messages contained in the SRHLMs:

i. Lack of materials specially dedicated to SRHL at school and at home.
ii. Teachers' lack of capacity to handle SRH issues is a problem. This in essence means that teachers are not able to guide adolescents appropriately using the content found in the course books, in addition to the fact that teachers handle heavy workloads and rarely have enough time to organize public talks.
iii. High levels of illiteracy in the research community, meaning that many parents are not aware of the importance of such materials and therefore do not accord their children support to access these materials
iv. Lack of SRHLMs in health facilities.
v. Girls' chronic absenteeism from school due to lack of sanitary towels whenever they are having their monthly periods.

The above challenges point out the need for an intervention measure to enlighten the adolescents in the study context on their Sexual Reproductive Rights, as captured in Anna Kågesten and Miranda van Reeuwijk's conceptual framework for adolescent sexual wellbeing. The third principle recognizes adolescents' fundamental right to sexual and reproductive health information, services, participation, and non-discrimination (109).

4.7 Pupils' ability to Read and Understand Messages Contained in the SRHLMs Available

The study sought to find out whether adolescents were able to comprehend messages contained in SRHLMs, with reference to the language used and relevance of content. Through the questionnaires, the pupils were asked whether the available materials were easy to understand, and the majority (60.4%) indicated that the available materials were not easy to understand. They observed that the language used in those texts was difficult and the examples given did not reflect their contextual realities. This is supported by the analysis of the pupils' mean performance on the reading comprehension discussed in the next section (Section 4.8). The teachers also indicated that high levels of illiteracy and the huge number of nonreaders in their classrooms contributed a great deal to the lack of utilization of sexual reproductive literacy messaging among the pupils. However, a few (39.6%) of the pupils indicated that the materials were easy to understand, and they isolated the following as the key messages contained in what they read in the SRHLMs:

i. Adolescence brings changes to a person's body.
ii. Boys get wet dreams.
iii. Desire to engage in sexual activities with members of the opposite sex is experienced when adolescence sets in.
iv. Avoid sexual engagement with the opposite gender.
v. Discharge from girls' private parts signifies the onset of menstruation.
vi. Teenage girls develop breasts.
vii. Voice breaking signifies the onset of adolescence in boys.
viii. Pregnancy can be caused by lack of knowledge.
ix. Early sexual engagement leads to school dropouts because of unwanted pregnancies, spread of HIV Aids

A close look at the messages the pupils identified shows that they were able to get information from the materials read, which implies that engagement in early sexual activities and increased rates of teen pregnancy may not be purely based on comprehension of sexual messaging, which calls for further research to uncover intricacies related to prevalence of teen pregnancies in the Sub-county and therefore propose solutions to the problem. Such a study will give agency to the condition of adolescents, especially girls. Agency is noted by Anna Kågesten and Miranda van Reeuwijk to be a key component of adolescent empowerment. It refers to the ability to make/influence decisions and assert own interests and opinions (108).

4.8 Reading Comprehension Abilities of the 10-15-year-old Adolescents

To complement the survey data on learners' ability to read and internalize the sexual and reproductive health messages, a total of 45 pupils from each school, 15 from each of the grades, were asked to read a passage (Appendix III) and answer 10 multiple choice questions on the messages contained in the passage. The pupils' mean performance per grade in each school is as shown in Table 13.

Table 13. Pupils' Mean Comprehension Performance by Grade

School	Number of pupils	Grade	Mean	Standard deviation
Masongo DEB	15	5	3.800	1.897
	15	6	4.600	2.530
	15	7	5.800	2.597
Otamba DOK	15	5	5.067	1.751
	15	6	7.857	0.770
	15	7	8.467	0.640
Kiogoro DEB	15	5	5.867	2.066
	15	6	7.867	1.060
	15	7	8.571	1.158
Ntundero DOK	15	5	5.533	1.807
	15	6	4.846	1.725
	15	7	8.200	1.424
Nyataro COG	15	5	6.667	1.672
	15	6	5.667	2.160
	15	7	6.333	1.543

The data in Table 13 shows that the leaners had varied reading abilities. This is demonstrated by the differences in the mean score of results from pupils from the five schools in the three grades. This too, is aligned with findings that some pupils found the passages to be difficult to understand while others found the passages to be easy to understand. The pupils' mean performance in the comprehension increased progressively from grade 5 to grade 7 in Masongo, Otamba and Kiogoro, while in Ntundero and Nyataro primary schools' grade 5 pupils posted better means than grade 6 and class 7 pupils. Such discrepancies could be attributed to the individual teacher's instructional practices.

4.9 Community Involvement in Addressing the Sexual and Reproductive Health Challenges Faced by Adolescents in and out of School

Responses from both pupils and teachers on whether community leaders ever visited the schools to talk about SRH indicated very low community leaders' engagement. For instance, 3.1% of the pupils noted that their schools were visited by a Board of Management (BOM) member, 13.8% were visited by Parent Teachers Association (PTA) member,

and 11.6% were visited by a priest/pastor, while 8.9% had their schools visited by a chief (leader of a location) and 3.1% were visited by a community health volunteer the previous term as shown in table 13:

Table 13: Community members visiting Schools to Give a Talk on Sex in The Last Term

Community Leaders	Frequency (%)
BOM Member	7 (3.1%)
PTA Member	31 (13.8%)
Priest	26 (11.6%)
Pastor	26 (11.6%)
Chief	20 (8.9%)
Community health volunteer/ Health Officer	7 (3.1%)

Although the community and religious leaders visited the schools, responses from the teachers indicated that they did not specifically address the pupils' SRH needs. This may be explained by the fact that the church as noted early is opposed to the inclusion of sex education in the school curriculum, while some of the community leaders are illiterate and hence had little exposure on the changing nature of sexual and reproductive health issues. In addition, issues to do with boy/girl relationships, monthly periods, adolescence, and adulthood were rarely addressed by these community leaders. This finding agrees with the information shared by most of the community leaders across all the schools during the FGD sessions. This hints to the lack of social and cultural structures that Anna Kågesten and Miranda van Reeuwijk point out as some of the key structures in managing adolescents SRHR.

4.10 Solutions to Challenges Facing Adolescents in Accessing and Utilizing the Messages on Sexual and Reproductive Health

During the FGDs sessions, community leaders, who included church leaders, health workers and Motor bike riders, drawn from the school environment, were asked to suggest context-based solutions to the challenges identified. They made the following suggestions:

i. Teachers should take a more proactive role in sensitizing adolescents to their SRH needs. This will include developing simplified posters and flyers on SRH. The literacy materials should also integrate pictorials and illustrations to help improve adolescents' comprehension of the messages in the literacy information sources.

ii. The religious leaders also felt that it was their responsibility to lead the community in sensitizing the youth on issues of sexuality. Some of the responses from these leaders are outlined below:

- **Religious leader Y**: As the church we should arrange seminars when these children are in for Sunday school to speak on issues of sexuality. The sermons should be tweaked in a way to address sexual and reproductive health issues. Equally we can request the schools to allow us to address this topic during the pastoral programme lessons so as to reach out to all the pupils.

iii. It was also suggested that the chiefs (location administrative leaders) should be sensitized to arrange for community forums to continuously address sexual and reproductive health needs of the youth.

In this forum, public health officers should be given opportunities to address the community members on the sexual and reproductive needs of the adolescents as captured in the following comment:

- **Community health worker X said**: we should also arrange health workshops with the help of the chief and Nyumba Kumi leadership (community security groups) to sensitize the adolescents on their sexuality when they are on holiday. Community active involvement in this will help adolescents realize that sexual and reproductive health issues are taken seriously by the entire community.

iv. All the community leaders in all the schools observed that the County public health department needed to be asked to play a more active role in ensuring that more SRHLMs are developed and dispatched to the various health facilities and schools. The materials should be simplified and be youth friendly. It was also observed that public health officers needed to come up with sexual and reproductive health community working groups to address immediate needs within communities in good time.

v. Responses shared during the FGD sessions also indicated that there was a need to come up with SRHL clubs within the schools. It was proposed that the public health officers should come up with training modules on sexuality-related issues for both boys and girls. Observations shared during the FGD sessions on past cases of girls who had become pregnant while in school indicated that most of the sexual activities were between boys and girls learning in the same school. Teachers therefore felt that the clubs will be used as a forum to sensitize the youth on ways of behaving responsibly during adolescence.

4.11 Causes of Prevalence of teenage pregnancy in the schools

During the FGD sessions, cases of teen pregnancy were reported not to be very high, but there was a noted increase in cases of sexual activities among teenagers in and outside school. This was explained to be caused by a number of factors listed below:

i. Most of the teenagers actively involved in sexual activities were living with their grandparents. These children are born by teen mothers who have left their homes to work as house helpers, leaving the responsibility of taking care of their children to their old parents. This means that the close supervision required in monitoring what these teenagers do is missing.

ii. It emerged from the FGD sessions across all the schools that sexual activities that teenagers in this community get involved in are often with very close relatives living with them, who should be providing guidance to the same teenagers. This means that there is a compromised moral fabric in the community as captured in two of the incidences quoted below:

   a. **Teacher Z**: We have been handling cases of girls who have been impregnated by their close siblings who have sometimes tried to force the girls to procure an abortion with the full knowledge of their parents. Some of the girls have been rescued and allowed to give birth and go back to school.

b. **Teacher Y**: We had a case where one of our girls regularly had sex with an uncle. This happened often in the morning as the girl walked to school; she passed by the uncle's house. When her mother learnt about this and secretly followed the girl and found them engaging in sex, the girl and her uncle ganged up and beat the mother.

iii. Some of the cases of teen pregnancies were as a result of drug and substance abuse by family members. Close siblings were reported to abuse teenage girls, resulting in early unwanted cases of teen pregnancies. At the time of writing the report there were some active cases in court.

iv. The teenage girls are introduced to the use of contraceptives early in their lives, which eliminates the fear of pregnancy and therefore engaging in early sexual activities. It was reported that this was carried out with the full knowledge of the mothers.

v. High levels of poverty were cited as contributing to engagement in sexual activities among the girls. Some were forced to engage in sex for money to buy food for the families. This was more prevalent in single parent families or in cases where the girls were living with their grandparents.

5. CONCLUSIONS

The following conclusions were drawn from the findings from this study:

First, the SRHLMs in the research context were few and when available they were shallow in content and not sufficient, as they were captured only as sub-topics in pupils course books and in teachers' guide.

Second, adolescents in the research context were not exposed to a variety of SRHLMs because they only got to read materials that were available in a classroom situation. For instance, beyond the classroom/school context there were very few posters, magazines, and handouts on SRH.

Third, most of the SRHLMs were accessed through teacher presentations and handouts. Although there was the mention of the library as a source of SRHLMs, it was noted that the materials were not displayed on shelves, and most were kept in boxes

Fourth, there was a serious challenge in accessing and utilizing the SRHLMs occasioned by the high levels of poverty as such families could not afford to buy these materials, while language barrier was also cited as a barrier to comprehending the available SRHLMs.

Fifth, adolescents received very limited support from the community as well as from the schools in terms of access and utilization of messages contained in the SRHLMs. This was because teachers did not delve beyond the passages in the course books because of heavy workloads and the pressure to cover the syllabus.

Sixth, the community leaders acknowledged the high rate of teenage pregnancy and increased sexual activity amongst adolescence and therefore underscored the importance of collectively addressing the sexual and reproductive health needs of the adolescents

6. Recommendations

From the findings of this study, a number of interventions are critical to aid the provision and use of SRHLMs by adolescents both inside and outside the immediate school community.

First, a lot of sensitization activities are needed for both the teachers and the Ministry of Education on the need to provide SRHLMs and the inclusion of materials in the curriculum. This is a long-term intervention that can possibly be picked in the new Competence Based Curriculum (CBC) that Kenya is embarking on presently.

Second, there is need to establish SRH community working groups, constituting of members drawn from the Sub-County public health office, community public health volunteers, religious leaders, to assist in enhancing the uptake of SRHL information among the adolescents in the community. Such a move may assist in a reduction of early pregnancies among young girls.

Third, it would be fruitful to encourage the launching of SRHL clubs at the school level and examine their effects on the uptake and utilization of sexual and reproductive health messaging. This process should involve training of sexual and reproductive health champions among adolescents by public health officers. To back up this process, there will be a need for preparation of training modules that are contextually relevant, with relevant examples and in a language that is easy to be understood by adolescents. The school champions will, in turn, give talks during the sexual and reproductive health literacy school club meetings. This can also entail journal entry in terms of adolescents' behavior change patterns, challenges, and potential home-grown solutions.

Fourth, holding workshops on the development of SRHLMs and this should take into account the adolescents' language abilities would assist in the uptake of sexual and reproductive knowledge. This should involve the public health professionals, teachers, community leaders, and youth. Such an intervention can ensure sharing of the SRHLMs developed, which can be useful in the process of helping in attitude as well as behavior change among community members and adolescents towards SRH needs of adolescents.

Fifth, there is a need to sensitize communities on the need to give both boys and girls equal opportunities to realize their full potential, in line with Sustainable Development Goals 4 and 5 (SDGs 4 & 5) and to achieve universal gender equity. This would entail creating community forums through the Sub-County administration who should spearhead the gender conversations on the importance of:

i. Avoiding engaging in early sexual activities
ii. Speaking out whenever faced with sexual and reproductive health challenges during adolescence
iii. Reporting cases of rape early enough for the offender to be apprehended and corrective measures taken for the victims

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APPENDICES
Appendix I: Questionnaires for Pupils

2021-2023 RESEARCH
Pupils' Questionnaire

Examining the Sexual and Reproductive Health Literacy Crisis for Adolescents in Rural Primary Schools in Kisii Central Sub-County, Kenya

Please take a few moments of your time to give us information on reading ***materials that talk about body changes during adolescence, menstruation, puberty, adulthood, boy/girl relationships and general cleanliness of sexual body parts that are available in your school and community.*** *The information volunteered will be treated with uttermost confidentiality.*

1. **Demographic Details**
   a. **Gender (Please tick)**
      i. I am a boy ----------
      ii. I am girl----------
   b. How old are you? ----------
   c. In which class are you? ----------

2. **Types of** *reading* ***materials that talk about body changes during adolescence, menstruation, puberty, adulthood, boy/girl relationship and general cleanliness of sexual body parts***

   Have you read about sex from any of the following materials/resources? Put a tick (√) for Yes

Reading Materials	**Tick if read**
Science lessons, CRE, Life Skills lessons.	
Story book	
Posters	
Leaflets from the dispensary/hospital	
Leaflets issued by a visitor to the school	
Teacher guide (life skill lessons)	
Others (list them below)	
a.	
b.	
c.	

3. Sources of the materials read on sex

Indicate where you got the material you read by ticking in the appropriate box:

Materials	Where the SRHLMs are accessed from **(put a tick (√)**				
	School Library	Teacher	Local dispensary	Local church	Other sources (Kindly state)
Science, CRE, Life Skills books					
Story book					
Posters					
Teacher life skills' guide					
Leaflets from the ministry of Health					
Leaflets from the ministry of Education					
Leaflets from visitors to the school					
Others **(list below and tick where accessed from)**					

4. Ways of getting the materials on sex

a) Indicate against each material in the table below to show how you accessed/got it:

Materials	**Ways of Getting them (put a tick (√)**						
	Borrowing from school library	**Handouts from public health presentations**	**Teacher presentation**	**Teacher assignments**	**Pastoral presentation**	**Classmates**	**Other sources (please describe)**
Science, CRE, Life Skills books							
Story book							
Posters							
Leaflets							
Teacher guide (life skills)							
Others **(list below and tick the source)**							

5. School Support

a. What does your school do to help you know about sexual activities between boys and girls, menstruation, puberty, adolescence and adulthood? Put a tick **(√)** where appropriate.

i. Inviting a doctor/ nurse to talk to us.
ii. Encouraging you to be members of teens' church group.
iii. Encouraging you to watch films

b. Other kinds of support not listed above (specify)----------
---

---

6. Challenges faced in getting and using messages contained in the materials read on sex.

a. What problems do you have in getting materials to read on sexual relationships between boys and girls, menstruation, puberty, adolescence and adulthood?
……
……
……
……

b. Does your school have magazines or other reading materials to teach you on the dangers of engaging in sex between boys and girls while in school?
Yes ---------- No ----------
If yes, state whether you are able to get them?
---

c. If you have been able to get some of the materials, are the materials easy to understand?
Yes ---------- No ----------

i. If yes, write down **three** key messages you got from the reading materials----------
---

If no, what is the problem?

---

7. Community Support

Have the following community members visited your school this last term to give a talk on sex? Tick (√) against whoever has visited.

Community Leaders	**(put a tick (√) where appropriate**
BOM Member	
PTA Member	
Priest	
Pastor	
Chief	
Community health volunteer/ Health Officer	
List any other visitor who came to the school to speak to you about sex matters	

i. How did these community leaders assist you to get reading materials teaching you about sex matters?

---

ii. Do the community leaders explain to you how to handle the following?

a. Boy/girl relationships. Yes □ No □
b. Monthly period. Yes □ No □
c. Adolescence. Yes □ No □
d. Adulthood. Yes □ No □

Thank you for taking time to fill this questionnaire

Appendix II Teachers' Questionnaire

2021-2023 RESEARCH
Teachers' Questionnaire

Examining the Sexual and Reproductive Health Literacy Crisis among Adolescents in Rural Primary Schools in Kisii Central Sub-County, Kenya

Please take a few moments of your time to help us get information on *reading* ***materials accessible to adolescents that talk about body changes during adolescence, menstruation, puberty, adulthood, boy/girl sexual relationships and general cleanliness of sexual body parts that are available in your school and community. All feedback is greatly appreciated. The information volunteered will be treated with uttermost confidentiality.***

8. **Demographic details**

   Gender ……
   Qualification /Highest level of Education or training……
   Teaching Experience……
   Responsibility at work……

9. Types of reading materials that talk about body changes during adolescence, menstruation, puberty, adulthood, boy/girl sexual relationships and general cleanliness of sexual body parts

   a. **Which of the following reading materials on Sex health matters for adolescents are available in your school? (put a tick (√) where applicable**

SHRLMs	**Available**
Passages in course books	
Story books	
Posters	
Teacher guide (life skills)	
Leaflets from the ministry of Health	
Leaflets from the ministry of Education	
Leaflets from a Visitor to the school	
Others (please list any other not appearing above)	

10. **Sources of the reading materials on Sex health matters for adolescents**
    a. Indicate where your pupils get these reading materials from.

	Where the reading materials are accessed from **(put a tick (√)**

Types of Reading Materials	School Library	Teacher	Local dispensary	Local church	Other sources (Kindly state)
Passage in class course book					
Story books					
Posters					
Teacher life skills' guide					
Leaflets from the ministry of Health					
Leaflets from the ministry of Education					
Others **(list below and tick where accessed from)**					

11. Modes of Accessing the reading materials on Sex health matters for adolescents

a. How do adolescents in your school access these reading materials?

SRHLMs	**Mode of Access (put a tick (√)**					
	Borrowing from available libraries	**Handouts from public health presentation**	**Teacher presentation**	**Teacher assignments**	**Pastoral presentation**	**Other modes (specify)**
Passages in course books						
Story books						
Posters						
Leaflets						
Teacher guide (life skills)						
Others **(list below and tick the source)**						

12. School Support

a. How does (if at all) the school support the pupils to access the reading materials on Sexual health matters? (put a tick (√) where appropriate.

i. Organize for library borrowing
ii. Organize for public health presentations
iii. Organize for church library visits
iv. Organize for community leaders' presentations

b. Others (specify)----------

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13. Challenges faced in access and use of messages contained in the SRHLMs?

a. What challenges do adolescents in your school face in accessing these health literacy materials?

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b. What challenges do these adolescents face in applying the messages contained in these health literacy materials in their lives?

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14. Community Support

a. Have the following community members visited your school this last term to give a talk about sex matters? Tick (√) against whoever has visited.

Community Leaders	**(put a tick (√) where appropriate**
BOM Member	
PTA Member	
Priest	
Pastor	
Chief	
Community health volunteer/ Health Officer	
List any other visitor who came to the school to speak to you.	

b. How (if at all) do these community leaders assist adolescents to get reading materials teaching them about sex?

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c. Do the community leaders explain to them how to handle the following?
   i. Boy/girl relationships. Yes □ No □
   ii. Monthly period. Yes □ No □
   iii. Adolescence. Yes □ No □
   iv. Adulthood. Yes □ No □

Thank you for taking time to fill this questionnaire

Appendix III: Pupils Comprehension Questions

2021-2023 RESEARCH

Reading Comprehension on Sexual Health Literacy

Class/grade_____
Gender_____
School _____

Instructions: Read the following passage and answer the questions that follow.

SEXUAL HEALTH AND GIRL-BOY RELATIONSHIPS

As a boy or a girl reaches puberty, his/her body starts to change from being the body of a child to the body of an adult. At this time, girls start having their menstruation period. Boys also change in many ways: for example, their voices break and their sexual organs start producing sperms. Both boys and girls sweat more than when they were younger because of these body changes. They are therefore advised to always clean their bodies thoroughly to avoid bad smells and bacterial infection. Because of these body changes, boys and girls begin to experience sexual feelings. They may feel warm sexual feelings when they think about or touch another person of the opposite sex. This may lead to confusion because the feelings are strong. These feelings are a natural part of growing up. The adolescents need to resist temptations brought by these feelings. Temptations can lead to getting involved in sex and getting pregnant. One girl said the following about her experience:

> "I was not told anything about sex when I was growing up – my parents just said that I should not play with boys after I started seeing my periods. We engaged in sex with my classmate one afternoon. I had no idea that I could get pregnant the first time or that the boy would leave me to take care of the baby alone"

Getting pregnant before marriage is an irresponsible behavior. Irresponsible behavior means, acting in an unacceptable way. For example, engaging in sexual activity, engaging in rape, putting someone at risk as a result of engaging in sex. For young people in school irresponsible behavior also means, getting pregnant and becoming fathers and mothers before they finish school. It is not right to have sex before marriage because young people are not yet ready to start a family. Irresponsible sexual behavior takes away a person's dignity and self-respect. It is therefore important that young people should avoid engaging in irresponsible sexual behavior.

Young boys and girls should have friends of their age. They should also choose friends who are responsible. Good friends should influence you positively by not asking for sexual favors before marriage. Sometimes children can be subjected to sexual abuse by parents, other adults, guardians and even older children. Children need to know their rights, how to speak out and even how to avoid being sexually mistreated. Children need to be loved by their parents, guardians and older people.

Answer the following question from the comprehension by circling the correct answer.

1. Why do boys and girls get confused when they reach puberty?
   a. Their bodies have new organs
   b. Sexual feelings
   c. They are sick
   d. They are not clean
2. Why should boys and girls avoid temptations brought by sexual feelings before marriage?
   a. They are in school
   b. They do not have money

c. May lead to unwanted pregnancies
d. Can spread COVID-19

3. Why should boys and girls bathe often during adolescence?
    a. They play a lot
    b. They should be clean at school
    c. Body changes make them sweat often
    d. To avoid getting infection and bad smell.

4. What should good friends do?
    a. Influence one another negatively
    b. Engage in sexual activity
    c. Avoid engaging in sexual activity
    d. Support each other to take care of a pregnancy

5. What should children do when someone wants to sexually mistreat them?
    a. Keep quiet
    b. Know their rights
    c. Speak out to authorities
    d. Cry and run away

6. Girls should avoid sexual temptations from boys after they begin to see their periods because:
    a. They are not clean
    b. They can easily get pregnant
    c. Boys will laugh at them
    d. They should respect boys

7. Which source is NOT good for advice to young people in school on sexual relationships
    a. Church
    b. School
    c. Bars
    d. Parents

8. Which of the following is NOT a sign of irresponsible behavior?
    a. Rape
    b. Risking someone's life through sexual activity
    c. Pregnancy
    d. None of the above
9. What should children expect from adults, guardians and adults?
    a. Mistreatment
    b. Love
    c. Sexual relationships
    d. being canned
10. Which of the following is NOT a result of irresponsible sexual behavior?
    a. Spread of diseases
    b. Early pregnancy
    c. Passing of school National exams
    d. Loss of self-dignity

Appendix IV: Focus Group Discussion Questions

2021-2023 RESEARCH
FGDs for Teachers and the Community

1. Which SRHMs are available for 10-15 year-old adolescents in your community?
    a. Are they comprehensively sufficient/enough?
2. Is the adolescents' access of the materials satisfactory?
    a. Could the access be improved?
        i. How?
3. What is the adolescents' level of reading comprehension of these materials? (for teachers).
4. In what ways are the adolescents assisted to understand and apply the knowledge in these materials to inform their sexual relationships?
5. In your opinion are the existing SRHLMs sufficiently effective to provide adolescents with the knowledge they need to become literate and knowledgeable in matters related to sexual relationships?
    a. If yes, how?
    b. If no, why?
6. What challenges do you think the learners face when applying messages in the texts available?
7. What additional knowledge do you think adolescents need in relation to matters of sexual relationships?
8. What role should the community play in supporting teenagers on sexual and reproductive health?
    a. Do you think the community is playing this role?
        i. If yes, how?
        ii. If no, why?
9. Do we still have high prevalence of teen pregnancies in the schools and the community despite the availability of the materials?
    a. If yes, why?
10. What remedies do you think would work to eliminate this rise in teenage pregnancies?