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AN EXPLANATORY SEQUENTIAL STUDY ON ADOLESCENT REPRODUCTIVE HEALTH LITERACY OF SENIOR HIGH SCHOOL STUDENTS

Johara D. Quilla
Master of Arts in Educational Management, Rizal Memorial Colleges, Inc.

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ABSTRACT

This study assessed the adolescent reproductive health literacy of senior high school students in Kapalong East District, Davao del Norte using a mixed-methods sequential explanatory design. A total of 208 students were surveyed quantitatively through cluster sampling, and 10 students participated in qualitative interviews via purposive sampling. Results revealed that students' reproductive health literacy was moderately extensive, with respectful relationships rated highest, followed by decision-making skills and knowledge. A significant difference was found in reproductive health literacy based on sex, indicating gender-based disparities in knowledge and behavior. Similarly, strand-based differences emerged, with Science and Technology Engineering and Mathematics and Humanities and Social Sciences students showing higher literacy than General Academic Strand and Technical Vocational Livelihood counterparts. Logistic regression confirmed that knowledge, decision-making, and respectful relationships significantly influenced students' sex. Qualitative findings highlighted limited access to reliable information, cultural taboos, and gender stereotypes as barriers to reproductive health literacy. Participants also emphasized differences in expectations, communication, and confidence based on sex and academic strand. These findings underscore the need for gender-responsive, strand-integrated, and culturally sensitive reproductive health education.

KEYWORDS: *Reproductive Health Literacy; Senior High School; Gender Difference; Academic Strand; Mixed-Methods Research*

INTRODUCTION

Adolescent reproductive health literacy remains weak among many senior high school students, limiting their ability to make safe and informed choices about their bodies. Recent school reports note that numerous learners confuse basic concepts such as contraception effectiveness and the meaning of consent, leaving them vulnerable to early pregnancy and sexually transmitted infections. Teachers also disclose discomfort when discussing sensitive topics, while unreliable online sources often become students' primary reference for reproductive information. These gaps are further widened by cultural norms that discourage open dialogue, thereby restricting access to accurate, age-appropriate guidance. Given this persistent problem of inadequate reproductive health understanding, the present study employs a sequential explanatory mixed method design to clarify the extent of literacy deficits and uncover the reasons behind them for senior high school students. In United states, it was reported that poor reproductive health literacy can limit adolescents' ability to exercise their reproductive rights and make informed decisions about their sexual and reproductive health. Access to comprehensive sexuality education, contraception, and reproductive healthcare services is essential for empowering adolescents to make autonomous choices about their bodies, relationships, and futures (Jones et al., 2023). Also, reports indicates that inadequate sexual education in schools significantly hampers adolescents' understanding of reproductive health, leading to misconceptions and risky behaviors (Santelli et al., 2019). Despite efforts to improve sexual education, disparities in access to comprehensive programs persist, particularly in rural and conservative areas where abstinence-only education is often prioritized over comprehensive reproductive health education (Kirby, 2019).

In the UK, similar challenges are evident, where inconsistencies in the delivery of sex and relationship education (SRE) contribute to poor reproductive health literacy among adolescents. Pound et al. (2019) highlighted that while Sex and Relationship Education is mandatory in schools, the quality and content of the programs vary widely, leaving significant gaps in students' knowledge and understanding of reproductive health. This is compounded by cultural taboos and discomfort among educators in discussing sensitive topics, which further limits the effectiveness of Sex and Relationship Education programs (Mann & Caffrey, 2019). As a result, many young people in the UK lack the necessary knowledge and skills to manage their reproductive health effectively, leading to issues such as unplanned pregnancies and inadequate use of contraception.

In Southeast Asia, it has been noted that Biswa (2021) misconceptions about sexual health may affect communication with peers, romantic partners, and family members, leading to misunderstandings, conflicts, and strained relationships. Social stigma surrounding reproductive health issues may also contribute to feelings of isolation and marginalization. Additionally, Bansal et al. (2020) highlighted that socio-economic factors, such as poverty and limited access to healthcare services, further exacerbate the situation by restricting adolescents' ability to seek and utilize Sex and Reproductive Health information and services. These issues underscore the urgent need for improved education and resources to enhance reproductive health literacy among adolescents in Southeast Asia, ensuring they are better equipped to make informed decisions about their health.

Taking things in Philippine setting, Pasay-an, Magwilang, and Pangket (2020) noted that limited reproductive health literacy can compromise adolescents' ability to make informed decisions about their sexual and reproductive health. Lack of knowledge about contraception options, consent, and reproductive rights may undermine adolescents' autonomy and agency in sexual relationships. This can lead to feelings of disempowerment and a diminished sense of control over their bodies and futures. Adding more, Barca et al. (2019) found that poor reproductive health literacy may hinder adolescents' access to timely and appropriate healthcare services. Adolescents may be less likely to seek reproductive healthcare due to stigma, fear of judgment, or lack of awareness about available services.

In Kapalong East District, Davao del Norte, the situation echoes national concerns but is compounded by local constraints. A recent division report showed that only few of Grade 11 12 students could differentiate between sexually transmitted infection prevention and pregnancy prevention methods, and many relied primarily on peers for sexual health information. Teachers cite insufficient training and lack of age-appropriate materials as barriers to comprehensive instruction, while conservative community attitudes limit open discussion. Consequently, school nurses reported a year-on-year rise in consultations for suspected STIs among senior high learners. These district level statistics signal an immediate need for targeted teacher capacity building, parent engagement, and culturally sensitive learning resources to boost adolescent reproductive health literacy.

There is a clear research gap in understanding adolescent reproductive health literacy in rural Philippine settings, particularly within Kapalong East District in Davao del Norte. Most existing studies either rely solely on quantitative data, which limits the depth of interpretation, or focus on urban populations with greater access to information and resources. Additionally, national reports provide broad statistics but do not capture the nuanced experiences and challenges faced by students in rural and conservative areas. By using a mixed method approach, specifically the sequential explanatory design, the current study first collects broad numerical trends, then follows up with qualitative insights to explain the “why” behind the data. This dual approach fills the gap in literature by offering both measurable patterns and context-rich perspectives, helping school leaders better understand both the extent and reasons behind the moderate reproductive health literacy among students.

The urgency of conducting this study in Kapalong East District stems from growing concerns over teenage pregnancy, misinformation, and the absence of open communication on reproductive health. Local school reports show that many students lack access to reliable information, while teachers express hesitation in delivering sensitive content due to cultural norms. This study is socially relevant because it aims to empower students with the knowledge and decision-making skills needed for responsible health behavior. Also, the findings can guide schools, parents, and policymakers in creating more inclusive, accurate, and culturally respectful reproductive health programs. Addressing this issue not only supports students’ well-being but also contributes to broader public health and education goals in the region.

REVIEW OF SIGNIFICANT LITERATURE

This section provides the discussions of variable and its indicators. The discussions of the concepts, ideas and viewpoints from various authors were taken from different books, journal and electronic.

Adolescent Reproductive Health Literacy

Adolescent reproductive health literacy as defined by Wardiati et al. (2023) is the knowledge, understanding, and skills that adolescents possess regarding various aspects of reproductive health, including anatomy, physiology, sexual and reproductive rights, contraception, sexually transmitted infections (STIs), pregnancy, and childbirth. It also encompasses the ability to access, understand, and use information and services related to reproductive health, as well as the capacity to make informed decisions about sexual and reproductive matters. According to Ma et al. (2021), the understanding of students with moderate level on reproductive health topics may be adequate but not comprehensive. They may possess some knowledge about basic reproductive biology and contraceptive methods but may lack in-depth understanding or awareness of more complex issues such as sexual consent, gender identity, or sexual orientation.

Adolescent reproductive health literacy is integral to academic success and educational attainment among students. Adolescent reproductive health literacy is not only relevant to health education but also intersects with various academic subjects, including biology, social studies, and literature. Students with moderate levels of adolescent reproductive health

literacy may face challenges in understanding complex reproductive health concepts or accessing accurate information due to factors such as cultural norms, stigma, or inadequate resources (Dongarwar & Salihu, 2019). With improved adolescent reproductive health literacy, students are better equipped to make informed choices about their sexual and reproductive health, reducing the risk of unintended pregnancies, STIs, and other adverse outcomes. Additionally, a solid foundation in adolescent reproductive health literacy can help students develop healthy attitudes and behaviors related to sexuality and relationships, leading to improved self-esteem and overall quality of life (Santisouk et al., 2020).

Moreover, Vamos et al. (2022) suggest that lack of comprehensive knowledge can impact adolescents' self-esteem, particularly in situations where they feel uncertain or uninformed about reproductive health matters. Adolescents with moderate adolescent reproductive health literacy may experience feelings of inadequacy or insecurity if they perceive themselves as lacking the necessary knowledge or skills to make informed decisions about their sexual and reproductive health. Scull et al. (2022) highlighted that as adolescents gain knowledge and skills related to reproductive health, they may feel more empowered and confident in their ability to navigate sexual and reproductive decisions. With increased adolescent reproductive health literacy, students are better equipped to understand their bodies, communicate effectively with partners and healthcare providers, and make informed choices that align with their values and preferences. This sense of empowerment can bolster adolescents' self-esteem and foster a positive self-image.

Meanwhile, basic reproductive knowledge provides adolescents with the information they need to understand their bodies, recognize signs of reproductive health issues, and take proactive steps to maintain their health and well-being. This includes knowing how to identify symptoms of sexually transmitted infections, understand contraceptive options, and access reproductive healthcare services (Govender et al., 2019). With basic reproductive knowledge, adolescents become aware of common reproductive health issues and their symptoms, such as irregular menstrual cycles, abnormal vaginal discharge, or genital discomfort. This knowledge allows them to identify and seek assistance for symptoms such as itching, burning, soreness, or pain during urination or sexual activity, which may be indicative of infections, inflammation, or other genital health issues (Fadilah et al., 2019).

As noted by Phongluxa et al. (2020), adolescents who have a solid understanding of basic reproductive health concepts are better equipped to make informed decisions about sexual activity, contraception, and safer sex practices. This knowledge helps reduce the risk of unintended pregnancies and STIs by empowering adolescents to engage in healthy and responsible sexual behaviors. Vamos et al. (2022) asserted that adolescents who have a solid understanding of basic reproductive health concepts are better equipped to make informed decisions about sexual activity, contraception, and safer sex practices. This knowledge empowers them to engage in healthy and responsible sexual behaviors, reduce the risk of unintended pregnancies and sexually transmitted infection, and promote their overall sexual and reproductive health and well-being.
As proposed by Sarhan et al. (2020), awareness of risks and consequences plays a crucial role in adolescent reproductive health literacy by empowering adolescents to make informed decisions, adopt responsible sexual behaviors, and protect themselves from negative outcomes. In educational practices, providing comprehensive and accurate information about risks and consequences is essential for promoting positive sexual health outcomes and empowering adolescents to navigate their sexual and reproductive lives with confidence and resilience. Adding more, Liang et al. (2019) noted that awareness of the risks of unintended pregnancies and STIs encourages adolescents to take proactive steps to protect themselves, such as using contraception consistently and correctly and practicing safer sex behaviors. Likewise, Narbubpha (2020) pointed out that these students recognize the potential risks and consequences associated with sexual activity, such as unintended pregnancy, sexually transmitted infection, and emotional consequences. They may have a general understanding of how to minimize these risks but may not consistently apply preventive measures in their own behavior.

In addition, Yau et al. (2020) noted that students who have a moderate perception of the risks associated with sexual activity and may express some confidence in their ability to protect their own health. However, they may underestimate certain risks or overestimate their ability to control outcomes, leading to potential gaps in their risk management strategies. According to Taba (2022), a balanced understanding of risk perception can empower adolescents to adopt positive health behaviors, such as using contraception consistently, practicing safer sex, and seeking healthcare when needed. Likewise, Pandey et al. (2019) asserted that adolescents who have a balanced understanding of risk perception recognize the importance of using contraception consistently to prevent unintended pregnancies and reduce the risk of sexually transmitted infection. They understand that sexual activity carries inherent risks and take proactive steps to protect themselves by using condoms, birth control pills, or other contraceptive methods consistently and correctly.

STATEMENT OF THE PROBLEM

The research questions underlying the investigation in this study are as follows:

1. What is the extent of adolescent reproductive health literacy of senior high school students in terms of:
    - 1.1 knowledge;
    - 1.2 decision-making skills; and
    - 1.3 respectful relationships?

2. Is there a significant difference on the adolescent reproductive health literacy of senior high school students when analyzed according to sex and academic strands?
3. Which domains of adolescent reproductive health literacy significantly influence the gender of senior high school students?
4. What are the standpoints of the participants on the salient points of the results on the extent of adolescent reproductive health literacy of senior high school students?
5. What are the standpoints of the participants on the salient points of the results on the significant difference on the adolescent reproductive health literacy of senior high school students when analyzed according to gender and academic strands?
6. What are the standpoints of the participants on the salient points of the results on the domains of adolescent reproductive health literacy that significantly influence the gender of senior high school students?

METHODOLOGY

This section contains the research design, research respondents, research instrument, trustworthiness of the study, ethical consideration, data gathering procedure, and data analysis.

Research Design

In this study, the researcher employed mixed methods, specifically an explanatory sequential research design. As defined by Toyon (2021), a mixed method research design was an approach to research that combined elements of both qualitative and quantitative methodologies. It involved collecting and analyzing both quantitative data (such as numerical measurements or statistical analyses) and qualitative data (such as observations or interviews) in order to gain a more comprehensive understanding of the research topic. Mixed method research designs were employed when the researcher sought to explore complex phenomena that could not be fully understood using only one methodological approach. By combining quantitative and qualitative data collection and analysis techniques, the researcher aimed to complement each method's strengths and weaknesses, providing a more nuanced and holistic understanding of the research problem.

An explanatory sequential approach was a type of mixed methods approach where quantitative data was collected and analyzed first, followed by qualitative data collection and analysis to provide additional depth and understanding (Birgili & Demir, 2022). In this design, the quantitative phase preceded the qualitative phase, with the qualitative phase used to help explain or elaborate on the quantitative findings. This sequential process allowed the researcher to gain a more comprehensive understanding of the research problem by integrating both quantitative and qualitative perspectives. By combining quantitative and qualitative data in a sequential manner, the researcher aimed to gain deeper insights and provide a more comprehensive analysis of the research topic (Othman et al., 2020).

In the quantitative phase, the researcher specifically used the correlational and comparative techniques of research to gather data, ideas, facts, and information related to the study. The descriptive-correlational approach was a type of research method that aimed to establish the relationship or association between two or more variables without implying causation. In this design, the researcher measured the degree of relationship or correlation between variables to understand how changes in one variable might be related to changes in another variable. Correlational research typically involved collecting data on the variables of interest from a sample population and then analyzing the data to determine if there was a relationship between them (Pace, 2019). In the context of this study, the correlational research design allowed the researcher to examine the relationship between the domains of reproductive health literacy and the gender of the students.

Moreover, the descriptive-comparative research design was a methodology used to describe and compare different groups or variables to identify similarities, differences, or patterns. This approach involved collecting data on the variables of interest and then analyzing and comparing them to understand the relationships between them (Shahrokh & Miri, 2019). In the context of determining the significant difference between male adolescent reproductive health literacy and female adolescent reproductive health literacy, a descriptive-comparative research design was appropriate. This design allowed the researcher to describe the levels of reproductive health literacy among male and female adolescents separately and then compare them to identify any significant differences.

In the qualitative phase, the researcher used a phenomenological approach. A phenomenological study was a methodology used to explore and understand individuals' lived experiences, perceptions, and perspectives of a particular phenomenon. It focused on uncovering the essence or meaning of these experiences from the participants' own perspectives (Williams, 2021). This design allowed the researcher to delve deeply into the subjective experiences of the participants and gain insights into how they understood and navigated issues related to reproductive health. The researcher employed this approach to conduct in-depth interviews or focus group discussions with senior high school students to explore their experiences, beliefs, attitudes, and behaviors regarding reproductive health literacy. Through open-ended questioning and active listening, the researcher uncovered the underlying meanings and themes embedded within the participants' narratives.

The sequential explanatory mixed method design was highly appropriate for a study exploring the adolescent reproductive health literacy of senior high school students. Firstly, the quantitative phase of the study, which included correlational and comparative techniques, allowed the researcher to quantitatively analyze the relationship between adolescent reproductive health literacy and gender. Additionally, the comparative analysis enabled the researcher to assess the significant difference in reproductive health literacy between male and female senior high school students. By comparing the mean scores or levels of reproductive health literacy between the two genders, the researcher was able to identify any disparities and differences in knowledge, attitudes, or behaviors related to reproductive health.

Following the quantitative phase, the qualitative phase employing a phenomenological approach deepened the understanding of the quantitative findings. Through in-depth interviews or focus group discussions with senior high school students, the researcher explored the lived experiences, perceptions, and perspectives of male and female students regarding reproductive health literacy. This qualitative phase provided rich insights into how students perceived and navigated reproductive health issues, shedding light on the underlying factors influencing their reproductive health literacy.

The sequential explanatory mixed method design allowed for a comprehensive exploration of the influence of adolescent reproductive health literacy on the gender of senior high school students. By combining quantitative and qualitative approaches, the researcher obtained a nuanced understanding of the research topic, bridging the gap between statistical analysis and lived experiences. This integrated approach strengthened the validity and reliability of the study findings, providing valuable insights for addressing reproductive health education and promoting gender-sensitive approaches in senior high school settings.

Research Respondents

The respondents of this study were selected to provide relevant insights aligned with the research objectives. Their experiences and perspectives served as valuable sources of data in understanding the phenomenon under investigation.

The researcher selected 208 Grade 11 and 12 senior high school students in Kapalong East District, Davao del Norte. The respondents were selected using a cluster sampling technique. According to Riaz et al. (2022), cluster sampling was a technique used in research where the population was divided into groups or clusters, and then a random selection of clusters was chosen for inclusion in the study. Within each selected cluster, all individuals or a subset of individuals were included in the sample. This sampling technique was appropriate for studies where it was impractical or impossible to obtain a complete list of all individuals in the population, such as in large-scale surveys or studies conducted across wide geographical areas.

In the study on adolescent reproductive health literacy, the researcher implemented cluster sampling by first identifying clusters of public secondary schools within Kapalong East District, Davao del Norte. These clusters were selected randomly or stratified based on factors such as school size or location. After the clusters were identified, the researcher then approached each selected school to obtain consent for participation. Finally, all students within the selected schools were invited to participate in the study, ensuring representation from diverse backgrounds and demographics.

The researcher implemented inclusion criteria in selecting the respondents. This included: students enrolled in senior high school programs in the said district; students with sufficient proficiency in the English language used for data collection to understand and respond to questions effectively; students who provided informed consent to participate in the study, either directly if they were of legal age or through parental or guardian consent if they were minors; and students who were available and willing to participate in data collection activities, such as interviews, surveys, or focus group discussions, as required by the study protocol. In contrast, individuals who were not currently enrolled in senior high school programs were excluded from the study.

Qualitative Phase

The researcher purposively selected 10 senior high school students for the in-depth interview (IDI). A total of 10 senior high school students in Kapalong East District, Davao del Norte were invited as participants. Purposive sampling was utilized in selecting the participants of the study. Purposive sampling was a non-random sampling technique where researchers deliberately chose participants who possessed specific characteristics or met predetermined criteria relevant to the research objectives. This method allowed the researcher to target individuals who were most likely to provide rich and relevant information pertinent to the study objectives, thereby enhancing the depth and quality of the research findings.

In the context of the study about adolescent reproductive health literacy among senior high school students, purposive sampling involved selecting participants based on factors such as age, gender, socioeconomic status, geographic location, or level of reproductive health knowledge. The inclusion criteria used included the following: students with sufficient proficiency in the English language used for data collection to understand and respond to questions effectively; students who provided informed consent to participate in the study, either directly if they were of legal age or through parental or

guardian consent if they were minors; and students who were available and willing to participate in data collection activities, such as interviews, surveys, or focus group discussions, as required by the study protocol.

Research Instrument

The researcher used two sets of instruments in the study: one for the quantitative phase and another for the qualitative phase. These questionnaires underwent content validation by a panel of experts and were pilot-tested to assess their validity and reliability. The comments, corrections, and suggestions provided by the experts were incorporated into the final revisions of the questionnaires.

In the quantitative phase, the researcher utilized an instrument designed to assess adolescent reproductive health literacy, as conceptualized by Wardiati et al. (2023), which included dimensions such as knowledge, decision-making skills, and respectful relationships. The Cronbach alpha value for this instrument is 886, sdescribed as good and interpreted as relaible. Respondents used a 5-point Likert scale, where 5 indicated "very extensive" and 1 indicated "not extensive," to measure the extent of their reproductive health literacy. The researcher used a range of means, descriptions, and interpretations to guide the analysis of adolescent reproductive health literacy among students:

In the qualitative phase, the researcher conducted in-depth interviews (IDI) with a total of 10 senior high school students using a semi-structured interview guide. This guide was developed after consultation and review by experts, and it underwent several revisions based on their feedback. The validation process focused on the language, conceptual levels, suitability of the items to the research design, and alignment of the interview questions with the study's objectives.

Data Analysis

The Data Analysis section presents the methods used to interpret the responses and identify emerging patterns from the participants. It outlines the process of organizing, coding, and analyzing the data to generate meaningful themes relevant to the study objectives.

Weighted Mean

This was useful in characterizing the adolescent reproductive health literacy of male and female senior high school students, allowing the researcher to describe and compare their levels of knowledge, attitudes, and practices.

Logistic Regression

This was applied to evaluate which factor of adolescent reproductive health literacy significantly predicted the gender of senior high school students, providing insights into the specific dimensions of literacy that are most associated with male or female identity.

RESULTS AND DISCUSSIONS

This chapter presents the results generated from the data gathered. It is sequenced based on the objectives of the study as presented in the first chapter. Thus, it presents the extents of adolescent reproductive health literacy of senior high school students; significant different on the adolescent reproductive health literacy of senior high school students when analyzed according to sex and strand; logistic regression analysis on the adolescent reproductive health literacy influencing the sex of senior high school students; and standpoints of the participants on the salient points of the quantitative results.

Adolescent Reproductive Health Literacy of Senior High School Students

The adolescent reproductive health literacy of senior high school students is measured in terms of knowledge, decision-making skills, and respectful relationship. The extent of this variable and its domain is presented below.

Knowledge

Based on the data presented in Table 1, the mean score for adolescent reproductive health literacy in terms of knowledge was 3.11, with a moderately extensive descriptive rating. This suggests that senior high school students sometimes demonstrate awareness and understanding of key concepts related to reproductive health. The result means that senior high school students sometimes demonstrate awareness and understanding of reproductive health concepts such as contraception, STIs, and health check-ups. According to Fubam et al. (2022), adolescents with moderate reproductive health literacy often exhibit partial understanding of health information but may struggle to apply it in real-life decision-making.

The range of means on this particular domain is 2.99 to 3.28. The highest-rated item was Feeling confident in understanding contraception methods and their effectiveness, with a mean score of 3.28. In contrast, the lowest-rated item was Having access to reliable sources of information about adolescent reproductive health, which scored a mean of 2.99. This indicates that students' knowledge of adolescent reproductive health is moderately extensive, with greater confidence in understanding contraception than in accessing reliable information. This aligns with Deshmukh and Chaniana (2020), who emphasized that adolescents often possess basic reproductive knowledge but face challenges in locating trustworthy health

resources, which limits their ability to make informed decisions. Also,Namukonda et al. (2021) noted that knowledge about reproductive health encourages students to think critically about the information they receive and the choices they make regarding their sexual and reproductive lives

CONCLUSIONS AND RECOMMENDATIONS

This part of the paper presents the conclusion and recommendation of the researcher. The discussion is supported by the literature presented in the first chapters and the conclusion is in accordance with statements of the problem presented in this study.

The primary objective of this study was to assessed the adolescent reproductive health literacy of senior high school students utilizing mixed method research design using sequential explanatory approach. The researcher selected the 208 Grade 11 and 12 senior high school students from Kapalong East District, Davao del Norte as the respondents through cluster sampling method for the quantitative phase, while, 10 Grade 11 and 12 senior high school students from Kapalong East District, Davao del Norte as the participants through purposive sampling method for the qualitative phase. The researcher made used of modified and enhanced adapted survey questionnaires for quantitative phase which was pilot tested in a nearby school to ensure high reliability and internal consistency of the items in the instrument, while, a semi-structured interview guide was used for qualitative phase. The result of the study are summarize as follows:

It is reveal in this study that the adolescent reproductive health literacy among senior high school students in Kapalong East District was moderately extensive, indicating that key competencies were sometimes demonstrated. Among the indicators, respectful relationships received the highest descriptive rating, followed by decision-making skills and knowledge, all of which were assessed as moderately extensive. These results suggest that while students show occasional awareness and responsible behavior in reproductive health matters, further educational reinforcement is necessary to achieve more consistent literacy.revealed that the overall level of adolescent reproductive health literacy among senior high school students in Kapalong East District was moderately extensive, indicating that key competencies were sometimes demonstrated. Among the indicators, respectful relationships received the highest descriptive rating, followed by decision-making skills and knowledge, all of which were assessed as moderately extensive. These results suggest that while students show occasional awareness and responsible behavior in reproductive health matters, further educational reinforcement is necessary to achieve more consistent literacy.

The analysis showed a significant difference in the adolescent reproductive health literacy of senior high school students when analyzed according to sex, as indicated by the t-value, degrees of freedom, and a p-value less than 0.05. The null hypothesis was rejected, confirming that sex plays a statistically significant role in students' reproductive health literacy. The result suggests that gender-based differences may influence the extent of reproductive health knowledge and behaviors among learners.

The findings reveal a significant difference in adolescent reproductive health literacy among senior high school students when analyzed according to strand. The post hoc results indicate that students from the STEM strand exhibit significantly higher literacy compared to those in HUMSS, GAS, and TVL, with all pairwise comparisons showing statistically significant differences. These results suggest that academic strand influences students' levels of reproductive health literacy, highlighting the need for strand-specific interventions.

The logistic regression analysis reveals that adolescent reproductive health literacy significantly influences the sex of senior high school students in Kapalong East District. All three indicators, knowledge, decision-making skills, and respectful relationships, show statistically significant contributions to the model. The overall model is significant, indicating that these components meaningfully predict differences in reproductive health literacy based on sex.

Meanwhile, the standpoints of participants reveal that adolescent reproductive health literacy among senior high school students is only moderately extensive due to limited access to reliable information and inadequate school-based instruction. Cultural stigma, family conservatism, and gender-based stereotypes further restrict open discussions, leading to discomfort and misinformation. Additionally, students demonstrate limited empowerment in decision-making, lacking both the confidence and communication skills to engage in reproductive health conversations effectively.

Moreover, the standpoints of participants indicate a significant difference in adolescent reproductive health literacy when analyzed according to sex, mainly due to differing expectations and gender-based limitations. Girls are expected to be more informed and are taught more strictly, while boys face fewer pressures and less encouragement to ask questions. Additionally, communication styles differ, with girls engaging more seriously and confidently in discussions, whereas boys tend to approach the topic less seriously due to perceived threats to masculinity.

Further, the standpoints of participants reveal a significant difference in adolescent reproductive health literacy when analyzed according to strand due to variations in curriculum emphasis and teaching approaches. Students in STEM and HUMSS strands report clearer and more detailed instruction on reproductive health because their subjects naturally integrate such topics. Conversely, those in TVL and GAS strands receive less emphasis, with lessons often deprioritized or dependent on teacher discretion, leading to inconsistent literacy across strands.

Furthermore, the standpoints of the participants show that domains of adolescent reproductive health literacy, particularly knowledge, decision-making, and respectful relationships, significantly influence gender differences among senior high school students. Girls are expected to possess more knowledge and are more often targeted by awareness campaigns, while boys have limited access to resources and face lower expectations. Moreover, girls display more confidence in decision-making and boundary setting in relationships, whereas boys often struggle with communication and rely more on their partners in reproductive health discussions.

Conclusions

Based on the findings of this study several conclusions were generated: Adolescent reproductive health literacy among senior high school students in Kapalong East District is moderately extensive, suggesting that learners sometimes demonstrate awareness and application of essential reproductive health concepts. Among the domains, respectful relationships recorded the highest extent, followed by decision-making skills and knowledge, indicating stronger emphasis on interpersonal aspects than foundational information. This implies the need for schools to enhance instructional strategies and resource access to reinforce comprehensive knowledge and critical decision-making abilities related to reproductive health.

There is significant difference in the adolescent reproductive health literacy of senior high school students when analyzed according to sex, as evidenced by the t-value and p-value results that led to the rejection of the null hypothesis. This indicates that male and female students vary in their level of reproductive health literacy, potentially influenced by differing gender norms and educational exposures. The implication suggests that schools should adopt gender-responsive strategies in reproductive health education to address the specific needs and learning gaps of each group.

Also, there is a significant difference in adolescent reproductive health literacy when analyzed according to academic strand, leading to the rejection of the null hypothesis. Students from STEM and HUMSS strands exhibit higher literacy levels compared to those from GAS and TVL, suggesting varied curriculum emphasis and content exposure across tracks. This implies that reproductive health education should be integrated equitably across all strands to ensure that every student receives adequate and relevant knowledge, regardless of their academic focus.

In addition, knowledge, decision-making skills, and respectful relationships significantly influence the sex of senior high school students in terms of their reproductive health literacy. Among the indicators, respectful relationships and knowledge exert the strongest influence, suggesting gendered differences in how students internalize and apply these aspects. These results imply that reproductive health programs should consider gender-specific strategies to effectively enhance literacy and address the distinct learning needs of both male and female students.

Meanwhile, the participants describe their adolescent reproductive health literacy as only moderately extensive due to limited access to reliable information and insufficient teaching materials in schools. Cultural and social barriers such as stigma, shame, and gender-based stereotypes further hinder open discussions and understanding of reproductive health. These findings imply that schools and families must work together to provide clear, inclusive, and supportive reproductive health education that empowers students to make informed decisions.

More so, the participants shared that gender plays a significant role in shaping adolescents' reproductive health literacy, with girls expected to be more knowledgeable and responsible than boys. Boys often face social norms that discourage them from asking questions or engaging seriously in discussions, while girls experience more structured guidance but also harsher judgment. These perspectives suggest a need for inclusive, gender-sensitive education that addresses stereotypes and promotes equal access to accurate reproductive health information for all students.

In addition, participants recognized that adolescent reproductive health literacy significantly differs across academic strands due to variations in curriculum emphasis and subject relevance. Students from STEM and HUMSS strands reported more structured and in-depth discussions, while those in TVL and GAS received less exposure, often due to subject priorities and teacher discretion. These findings imply that reproductive health education should be more uniformly integrated across all strands to ensure equitable understanding among senior high school students.

Lastly, participants emphasized that gender significantly influences adolescent reproductive health literacy, particularly in the areas of knowledge, decision-making, and communication. Girls are expected to be more knowledgeable and are often the primary targets of awareness campaigns, while boys experience limited access to information and social support. These insights imply the need for gender-sensitive approaches in reproductive health education that provide equal opportunities and tailored guidance for both male and female students. The result supports the Gender Socialization Theory by Mead et al. (1934), which posits that societal expectations and cultural norms shape gender roles and behaviors from early social interactions. The findings align with this theory, as they reveal that girls are socialized to be more informed and responsible in reproductive health matters, while boys face limited access and engagement due to gendered expectations.

Recommendations

In light of the study's findings, the following recommendations are offered to inform policy, school leadership, teaching practice, and future research:

For DepEd Officials. DepEd officials should strengthen the implementation of comprehensive sexuality education (CSE) across all strands in senior high school, ensuring it is age-appropriate and gender-sensitive. Policies must promote equal access to reliable reproductive health information, addressing cultural stigma and gender-based disparities. Moreover, additional training and resources should be allocated to support schools in delivering consistent and accurate health literacy instruction.

For School Heads. School heads are encouraged to institutionalize school-wide programs that promote adolescent reproductive health literacy through integration in homeroom guidance and co-curricular activities. They may ensure that all strands, including TVL and GAS, receive equal mphasis on reproductive health education. Additionally, collaboration with health professionals and community organizations can enrich school-based instruction and support inclusive discussions.

For Teachers. Teachers may actively facilitate discussions on reproductive health using inclusive and non-judgmental approaches that consider both male and female perspectives. They may address gender stereotypes and empower all students, regardless of strand or sex, to engage in respectful and informed decision-making. Continuous professional development on reproductive health education is also recommended to enhance instructional competence and confidence.

For Learners. Learners are encouraged to participate actively in reproductive health education and seek information from credible sources. They may develop communication and decision-making skills that promote respectful relationships and personal well-being. Students are also urged to challenge stereotypes and support inclusive peer conversations on reproductive health matters.

For Future Researchers. Future researchers should explore in-depth qualitative perspectives of both students and teachers to uncover hidden barriers in reproductive health education. Comparative studies across different regions or school types may provide broader insights into curriculum gaps and gender disparities. Investigating intervention models tailored by strand or sex could also guide more effective educational policies and practices.

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