

QUANTIFYING THE LINK: ASSESSING THE INTERPLAY BETWEEN PERSONAL HEALTH LITERACY LEVEL AND SELF-CARE PRACTICES OF NURSING STUDENTS IN A PRIVATE UNIVERSITY

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Paper Received: 27.11.2024 / **Paper Accepted:** 18.12.2024 / **Paper Published:** 20.12.2024

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Abstract

Neglect in self-care becomes prevalent among nurses and nursing students as they prioritize care for their patients. However, the delivery and promotion of quality care and the safety of patients are compromised when they fail to prioritize personal self-care. This study investigated the potential relationship between health literacy and self-care management among nursing students in a private university. A correlational study was conducted among 228 respondents determined through stratified random sampling. The key variables were assessed using the following questionnaires: (1) Demographic Profile, (2) Fil-Asia Version HLS-EU-Q47, and (3) The Integrative Health and Wellness Assessment (IHWA), in which the data collected were analyzed through (1) Frequency and percentage, (2) Measure of central tendency, and (3) Pearson's R formula. Most results have shown a weak positive relationship between respondents' health literacy in terms of health care and disease prevention and self-care management (R-value range of 0.1746-0.4324), the moderately strong positive relationship between respondents' health literacy in terms of health promotion and self-care management were mostly observed (R-value range of 0.2083-0.5175). The grouped p-value range of 0.0000-0.0082 is greater than 0.05, indicating a significant relationship between respondents' health literacy and self-care management.

To integrate findings into the curriculum, focusing on enhancing health literacy and promoting self-care practices among nursing students to ensure that students receive comprehensive education, thus better preparing them for their future roles as healthcare professionals while promoting work-life balance and establishing a peer support environment.

Keywords: Self-Care, Health Literacy, Prevention, Promotion.

Introduction

Health literacy has emerged as a pivotal concern in public health, particularly highlighted by the COVID-19 pandemic. The Health Promotion Framework Strategy 2023-2028 emphasizes health literacy as a key approach to fostering well-being, aiming to empower individuals with the knowledge to make informed health decisions, aligning with the principles of Universal Healthcare (Cuasay, 2023). Effective health literacy enables better access to and use of health information, promoting self-care and improving community health.

A notable trend in health literacy is the rise in global research collaboration, with significant contributions from countries like the United States, Australia, and the United Kingdom. Despite these efforts, the World Health Organization (WHO) reports persistent low health literacy in both developed and developing nations. In the Philippines, the COVID-19 pandemic has highlighted the need for enhanced health literacy, especially in rural areas with limited healthcare access. The pandemic also underscores the importance of self-care among healthcare professionals, including the nurses and the nursing

students, who often prioritize patient care over their own well-being, potentially compromising their ability to provide safe and high-quality care.

This correlational study aims to investigate the relationship between health literacy and self-care management among nursing students at ABC University. It seeks to demonstrate how health literacy impacts self-care practices, aligning with the competency standards set by the International Council of Nurses (ICN). The study aims to gather insights into the significance of health literacy in promoting effective self-care among healthcare providers.

The potential contribution of this research includes enhancing understanding of the role of health literacy in promoting self-care among healthcare professionals, which can improve their well-being and performance. The findings may inform policy and educational practices to better support the health of nursing students and professionals, leading to more health-literate communities where individuals engage in proactive self-care. Ultimately, this research could advance public health theory, practice, and policy, contributing to a more robust and inclusive healthcare system.

Theoretical Framework



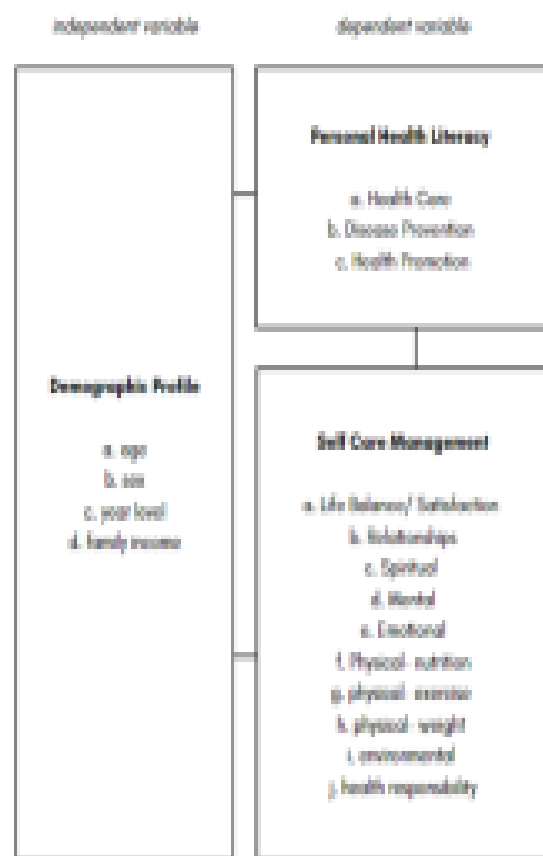
The study is based on Dorothea Orem's Theory of Self-Care, introduced in 1959. This theory comprises three components: the Theory of Self-Care, the Self-Care Deficit Theory, and the Theory of Nursing Systems. The study focuses on the Theory of Self-Care, which includes self-care agency (an individual's ability to perform self-care) and self-care behaviors (actions to promote well-being) (Gonzalo, 2023). The theory emphasizes that health and well-being require sufficient knowledge and resources for self-care.

When individuals cannot meet their self-care needs due to insufficient self-care agency, a self-care deficit arises, necessitating nursing intervention. These nursing systems support individuals whose

need for therapeutic self-care surpasses their capacity, facilitated by the nurse-patient relationship.

In this study, Orem's Self-Care Theory is used to explore the relationship between health literacy and self-care management among nursing students at ABC University. It helps explain potential self-neglect among nursing students, highlighting the importance of self-care practices for maintaining health and delivering effective patient care. Understanding this relationship can guide the development of targeted nursing interventions to support both students and their future patients.

Conceptual Framework



The framework presents the connections between the study's variables. The independent variable is the demographic profile while the dependent variables are personal health literacy and self-care management. Lines connect the independent variable to each dependent variable, indicating potential significant differences based on demographics. Another line connects the two dependent variables, showing the link between health literacy and self-care practices among nursing students at ABC University.

Statement of the Problem

This research study investigated whether there is a significant relationship between personal health literacy and how nursing students at ABC University perceive self-care management. The study specifically answered the following questions:

1. What is the socio-demographic profile of the nursing students at ABC University based on the following:
 - 1.1 age;
 - 1.2. sex;
 - 1.3. year level;
 - 1.4. family income?
2. What is the level of health literacy among the nursing students at ABC University, in terms of:
 - 2.1. health care;
 - 2.2. disease prevention; and
 - 2.3. health promotion?
3. What is the level of self-care management among the nursing students at ABC University in terms of:
 - 3.1. life balance/ satisfaction;
 - 3.2. relationship;
 - 3.3. spiritual;
 - 3.4. mental;
 - 3.5. emotional;
 - 3.6. physical (nutrition, exercise, and weight);
 - 3.7. environmental; and
 - 3.8. health responsibility?
4. Is there a significant relationship between health literacy and self-care management practices among the nursing students at ABC University?
5. Is there a significant difference in the respondents' health literacy when they are grouped according to profile?
6. Is there a significant difference in the respondents' self-care management when they are grouped according to profile?

Scope and Delimitation

The scope of this study is focused on the association between personal health literacy and the self-care management of nursing students. With that, this study was conducted at Malolos, Bulacan, inclusive to a total of 228/525 nursing students of the academic year 2023-2024. This study is delimited to undergraduate nursing students at ABC University enrolled in the current academic year 2023-2024, excluding those students who were not enrolled in the Nursing Program of ABC University.

Methodology

Research Design

The researchers utilized a quantitative research approach to measure nursing students' health literacy and self-care management levels and determine their correlation.

Participants/Respondents of the Study

The respondents in this study are undergraduate nursing students at ABC University during the academic year 2023-2024. Out of the 525 nursing population, stratified sampling was used and then divided into four strata, based on year level, results were 102 for the 1st year, 59 for the 2nd year, 38 for the 3rd year, and 29 for the 4th year nursing students. All in all, 228 nursing students of the academic year were involved in this study.

Instrument/s of the Study

The researchers employed three instruments to measure key variables: a demographic profile, the Fil-Asia Version HLS-EU-Q47, and the Integrative Health and Wellness Assessment (IHWA). The demographic profile captured characteristics such as age, sex, year level, religion, health status, medical history, and family income, forming the basis for assessing health literacy and self-care management needs. The HLS-EU-Q47, a 47-item questionnaire localized for Filipino populations, measured health literacy in healthcare, disease prevention, and health promotion domains with a 95% confidence level. The IHWA, a 36-item questionnaire with a reliability of 0.88, assessed self-care management across eight areas: life balance/satisfaction, relationship, spiritual, mental, emotional, physical (nutrition, exercise, weight), environmental, and health responsibility, using a 5-point Likert scale. Consent was obtained for all instruments, ensuring adherence to academic integrity and research ethics.

Data Collection and Analysis

Data collection was done in a span of two weeks. Researchers went to ABC University and handed out consent forms and survey questionnaires to the randomly chosen respondents from each year level. After collecting the data, it was systematically processed, compiled, organized, and tabulated, subjected to analysis by a statistician. Statistical tools were used including frequency and percentage, mean and standard deviation, Pearson's R formula, t-test, and ANOVA to analyze the data and address the research questions. For research question 1, frequency and percentage were used to describe the demographics of the nursing students. For question 2, mean and standard deviation were applied to measure health literacy using the Fil-Asia Version HLS-EU-Q47, which categorized responses from "Very Easy" to "Very Difficult." For question 3, the same statistical tools measured self-care management using the Integrative Health and Wellness Assessment (IHWA), with ratings from "Always" to "Never." Pearson's R was used to answer question 4, assessing the correlation between variables. For questions 5 and 6, t-test and ANOVA analyzed differences in health literacy and self-care management based on demographic profiles. All data was analyzed by a statistician, with results

summarized in a research report highlighting trends, associations, and significant correlations through paragraphs, charts, and tables.

Ethical Consideration/s

1. The researchers approached potential respondents and verbally explained the duration, potential benefits, and any burdens associated with participating in the study. A formal consent form for respondents was provided, and their consent was obtained before data collection began. Respondents were assured that the written and signed permission is not a binding contract, and they are free to choose whether to participate in the research without any compulsion or intimidation.
2. In developing the questionnaire, offensive, discriminatory, and objectionable language was excluded.
3. The researchers maintained the confidentiality of all respondents' information and responses. Answer sheets were accessible only to the research principal and hired statistician.
4. Thorough explanations of the variables at the end of the survey were provided, including details about the tests conducted and the purpose of the tests. The researchers also included brief explanations of the study topic to inform participants further.
5. Respondents were allowed to request a copy of the study's findings on an individual basis.
6. No compensation or incentives were provided to prospective respondents.
7. There was no conflict of interest in this study.

Results and Discussion

1. The majority of respondents are aged 18-19 (103 out of 228), female (168 out of 228) and from the 1st yr (102 out of 228) sections. Most of the families are earning 10,000-20,000 (54 out of 228), most have been hospitalized (131 out of 228) and have medical conditions (139/228). However, only a few have had surgery (131/228), have allergies (90/228), have chronic medical conditions (14/228) and have experienced substance abuse (5/228).

2. Personal health literacy is divided into 3 subcategories namely, health care, disease prevention, and health promotion.

Health Care. The findings suggest that the respondents have shown a satisfactory level of health literacy in health care (OM= 3.17, SD= 0.79) findings (44) support these results, showing that 4.6 out of 10 nursing students demonstrate inadequate or problematic health literacy.

Disease Prevention. They show a high level of health literacy in terms of disease prevention (OM= 3.29, SD= 0.78). They excel in understanding the importance of vaccinations, health screenings, and health warnings regarding behaviors like smoking and physical activity.

Health Promotion. The findings suggest that the respondents have shown a satisfactory level of health literacy in (OM=3.22, SD=0.80). The study found that respondents demonstrate a satisfactory level of health literacy in terms of personal health promotion, with high scores in understanding doctor instructions, mental health activities, decision-making based on doctor's information, and finding healthy lifestyle information. However, they scored lower in joining sports clubs or exercise classes.

3. They engage in self-care practices frequently in all sub-levels.

Life balance/ satisfaction. Strong engagement is seen in practices related to being hopeful about the future and allocating time and resources to people and causes they admire.

Relationship. They consistently demonstrate high levels of engagement in feeling comfortable with their sexuality, having trusted individuals for support, and actively participating in relationship establishment and maintenance. Our findings emphasize the significance of a strong support system in enhancing the wellbeing of Nursing Students. However, there is a need for additional support to encourage sharing of feelings and opinions without guilt to foster stronger self care practices and improved emotional wellbeing.

Spiritual. They demonstrate high levels of engagement in feeling that their life has meaning, value, and purpose, as well as experiencing joyfulness and gratitude, indicating a strong commitment to spiritual self-care management. This suggests the value of personal spiritual practices and the need to encourage more community support involvement. Schools and healthcare institutions should define spiritual health comprehensively and promote both individual and communal practices to enhance holistic care.

Mental. There was a balanced distribution between the twelve (12) statements. Six (6) statements indicate frequent engagement in self-care practices, while the other half demonstrated consistent engagement. Notably, they demonstrate the highest level of dedication in enjoying the development of new skills and talents, utilizing imagination to explore possibilities, and maintaining openness to new ideas and experiences, indicating a strong commitment to mental self-care management. While

Nursing Students are proactive in self care, there is a need to cultivate a culture that promotes seeking help, with institutions encouraged to provide support systems, educational programs, and resources for mental health awareness and self-care. Addressing the reluctance to seek help can enhance mental wellbeing, ultimately supporting the academic and professional success of nursing students.

Emotional. The respondents diligently engage in certain practices such as listening to and respecting the feelings of others, learning from their own mistakes, and embracing new challenges or experiences.

Physical

- **Nutrition.** It is found that the respondents are diligently engaged in practices such as being aware that high-fat foods are not healthy, being aware of any food sensitivities or allergies, being aware of foods that affect their digestion, and eating their meals at home.

- **Exercise.** The findings suggest that respondents frequently integrate self care practices related to exercise (overall mean of 3.78 and standard deviation of 1.07). Our findings suggest that Nursing Students value activity for self-care but may lack social interactions in physical activities could enhance both physical and mental well-being among students.

- **Weight.** This suggests that Nursing Students are aware of the significance of integrating physical activity and nutrition to manage stress, maintain health, and enhance their overall well-being. Providing health guidelines and support for students to prioritize physical and mental fitness can improve their academic and clinical performance.

Environmental. All the 17 statements under this aspect showed that the respondents engaged in self-care practices often. Students are conscious of their surroundings, understanding the absorption process of substances applied to their bodies. However, their understanding of using natural pesticides was lacking, indicating a need for education on the benefits of natural alternatives. The findings suggest that students have a good grasp of manipulating their environment for better study habits and skills performance, being aware of how the environment influences health. Enhancing nursing students' knowledge and perspectives can lead to holistic health improvement and disease prevention.

Health responsibility. Among the twenty statements, respondents were found to be diligently engaged in four specific practices namely, avoiding smoking, vaping, or inhaling substances into their lungs, believing that they are the key to their well-being and overall health, practicing good oral hygiene, being free from an addiction to a substance or behavior. Nursing students often rely on unhealthy coping mechanisms such as alcohol

consumption, smoking, and poor dietary habits to deal with stress.

4. The statistical analysis using Pearson r found that there is a significant relationship between the respondents' personal health literacy and self-care management. Thus, the statistical analysis rejects the null hypothesis stating that there is no significant relationship between the respondents' personal health literacy and self-care management.

5. The analysis of the difference in the respondents' personal health literacy when they are grouped according to their profile are found to have no significant difference. Thus, the analysis accepts the null hypothesis stating that there is no significant difference in the respondents' personal health literacy when they are grouped according to their profile.

6. The analysis of the difference in the respondents' self care management when they are grouped according to their profile are found to have no significant difference. Thus, the analysis accepts the null hypothesis stating that there is no significant difference in the respondents' self care management when they are grouped according to their profile.

Conclusion

This research ended with positive results showing that nursing students at ABC University have a conscientious attitude in all aspects of their health. However, improvement is highly recommended in areas such as sleeping habits, communication techniques, support from the community, asking for help and assistance as needed, enhancing coping mechanisms for anxiety, worry, fear, and anger, eating vegetables, exercising in public places, and going to yearly physical examination, to further improve their well-being as preparation for their future as competent and well-rounded nurses.

Recommendations

1. Nursing Students. To integrate findings into their knowledge, focusing on enhancing health literacy and promoting self-care practices amongst themselves to ensure that they receive a comprehensive education in these significant areas: life balance/satisfaction, relationship, spiritual, mental, emotional, physical, environmental, and health responsibility - thereby, better preparing them for their future roles as healthcare professionals while promoting their wellbeing.

2. Family of the Nursing Students. To have active participation in the promotion of the Nursing Student's improvement in health literacy and self-care management practices. By fostering open family communication, they can show their support to their student and engage in discussions that could

address the problems the Nursing student currently may be facing. This can contribute to the overall well-being of the student, as family ties play a crucial part in their development.

3. Patients. To encourage collaboration between patients and nursing students in promoting mutual understanding and support for the importance of health literacy and self-care initiatives.

4. Nursing Administrators and Hospital Nurses. To hold knowledge regarding issues arising the Nursing Students' health literacy and self-care management practices that will result in the empowerment of medication management and utilization of health literacy resources to improve health navigation services. Additionally, to enhance and develop the healthcare providers' performance in the field, it is necessary to promote work-life balance and establish a peer support environment.

5. The Institution. To support policies that encourage self-care initiatives among nursing students, prioritizing their health and wellness. These initiatives may include wellness programs, stress management workshops, and access to mental health resources. Additionally, it is recommended to ensure accessible health information and foster a supportive learning environment.

6. Future Researchers. To analyze demographic variations across nursing education year levels to tailor interventions for students at distinct stages of their academic progression. Additional research on the correlation between family income and demographic attributes could provide a significant understanding of the socioeconomic determinants affecting nursing students. Further, future researchers could consider conducting qualitative interviews to gain a deeper understanding of the financial challenges faced by students from different incomes.

Conflicts of Interest

The authors declare that there is no conflict of interest in this manuscript. Results have been deduced objectively; nothing influenced this result by any individual, monetary, or institutional interests. In effect, utmost endeavors were in order to conduct a bias-free operation of gathering and analyzing the data into interpretation and producing a study based on merit, away from research inconsistencies.

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