



Assessment of Students' Attitudes Towards the Nursing Profession at Wolkite University, Ethiopia, 2021

Mamo Solomon Emire , Tariku Gebre Haile , Masino Tesu

Department of Nursing, Wolkite University, Wolkite, Ethiopia

Correspondence: Mamo Solomon Emire, Department of Nursing, Wolkite University, Wolkite, Ethiopia, Tel +251-932271095, Email mamosol69@gmail.com

Background: Nurses are the backbone of healthcare services, and nurses at work should be held responsible for providing high-quality care. A common problem at all levels of healthcare institutions is the negative attitude of the nursing profession. There is limited research on the subject of students' attitudes. The nursing profession and its evolution are influenced by social, cultural, and moral factors.

Objective: To identify the attitudes of nursing students towards the nursing profession at wolkite university, 2021.

Methods: An institution-based cross-sectional study was carried out between April 2 and May 30, 2021. The chosen nursing students were selected using a simple random sampling method. A pretest and a standardized self-administer questionnaire were used to get the data. Epi data 3.1 versions were used to enter the data, which was subsequently exported to SPSS version 23 for analysis. Bivariate and multivariable logistic regression analyses were used to find the associated factors of attitude toward the nursing profession. Statistical significance was defined as a P-value < 0.05.

Results: A total of 364 participants completed the study questionnaires giving a response rate of 86.6%. Nearly half of 170 (46.7%) with a range of (41.0–52.2) the study participants showed a positive attitude towards the nursing profession. Age (AOR: 4.54; 95% CI: 1.33–15.45) than younger, living in urban (AOR: 2.64; 95% CI: 1.29–5.40), monthly income of less than 1000 ETB (AOR: 0.23; 95% CI: 0.06–0.38) family reacted positively after they join nursing (AOR: 12.5; 95% CI: 4.78–32.69), and interest in the nursing profession (AOR: 7.28, 95% CI: 2.01–26.36) were significantly associated with a positive attitude toward nursing profession.

Conclusion and Recommendation: Overall, less than half of nursing students had a positive attitude toward the nursing profession. Age, Residence, Family monthly income, Students whose families reacted positively after they join the nursing Profession, and students who joined the nursing profession of their interest were significantly associated with the nursing profession. Thus stake holders in universities, health science colleges, the ministry of education, the ministry of health, and Ethiopian nursing associations have to give due attention to enrolling students who had their interest to join the nursing profession and portray a positive image of the nursing profession.

Keywords: nursing profession, nursing students, attitudes, Ethiopia

Background

The attitude of nursing students toward the profession is crucial for both student achievement and the advancement of the profession.¹ Nursing is a profession within health care, that maintains or regains optimal health, the healthcare industry that focuses on the health care of individuals, families, and communities.² The nursing profession is the backbone of the medical industry, and it is vital to improving quality of life and encouraging health,³ the largest professional group providing healthcare services are nurses.⁴

The development of nursing professionalism is attributed to Florence Nightingale. She laid the foundation for contemporary nursing and portrayed herself as someone concerned about the lives of others. In addition, she had high expectations for herself and sought perfection in her nursing work. She was an optimistic woman who served as

a missionary and a discoverer. She loved and was passionate about what she did.⁵ Choosing a profession is a complex process influenced by a variety of elements that differ from country to country and culture to culture.⁶ Nursing is a large profession with a long history of serving people, advocating for them, making them safer, and providing a humane healthcare system.⁷

An individual's attitude is a tendency that shapes his or her thoughts, feelings, and behaviors toward a psychological object.⁸ Nursing students may have a favorable attitude toward the profession since they are highly skilled individuals who are capable of providing high-quality care to others.⁹ Common reasons for joining nursing were found to be an awareness of the humanitarian nature of nursing, the job opportunities and security it provides, a desire to help others and to work with people, and an interest in science.¹⁰ In reality, knowledge, skill, and a positive outlook are the characteristics recommended to develop nursing education and new nursing strategies today. To develop nursing education and promote nursing strategies, there is a need for staff with a positive attitude.¹¹

On the other hand, due to overwhelming work in the hospital, performing on holidays, a lack of appreciation for work, low pay, and a loss of nurses' interest in what they do, there has been a lot of negative attitude toward the nursing profession among the candidates, which could lead to a decline in work quality.¹² The financial remuneration of occupation is determined by the students' insight of it.¹³ Nursing students' attitudes about their profession have an impact on student retention and recruitment, funding for nursing education and research, and relationships with healthcare administrators and other healthcare professionals.¹⁴

Attitude is a key aspect in driving human behavior toward accomplishing goals, and enhancing accomplishment motivation, attitude is regarded as one of the psychological factors that substantially motivate students to work hard. Students' attitude determines whether or not they succeed in the nursing profession.¹

However, only a small number of nursing students were studied to gauge their attitudes regarding the nursing profession; as a result, it is crucial to make a broad conclusion on the matter. In addition, it may be possible to create and implement specific educational goals for changing unfavorable attitudes toward the profession. Through these methods, nursing candidates may develop favorable attitudes toward the field during their education, which may in turn help to increase the number of nurses who are passionate about their profession. This study is thought to contribute to research on the development and enhancement of the nursing profession. Therefore, this study aimed to analyze nurse students' attitudes toward the nursing profession and associated factors among Wolkite University undergraduate nursing students Ethiopian.

Methods and Materials

Study Area and Period

The study was carried out at Wolkite University, one of Ethiopia's ten most recent universities (founded in 2012). It lies around 170 kilometers from Addis Ababa, the country's capital city. Guraghe zone is Located in the South Nation and Nationalities Peoples Region (SNNPR) in southwest Ethiopia, positioned at 1910 meters above sea level. Wolkite University's had seven colleges make up the institution, including ones for social science and the arts, business, economics, engineering, computing and informatics, medicine, technology, and agricultural technology; with a total enrollment of 12,667 students in 2019 academic year. Colleges of medicine and health sciences have 1698 total students enrolled for the 2019 academic year. The study included nursing students who entered directly from the 12th grade and those who entered through a bridge program from a nursing background on a 10+3 diploma program and passed the licensing exam.

Study Design

The institution-based cross-sectional study design was used.

Source Population

All nursing students who have been enrolled at Wolkite University.

Study Population

All nursing students at Wolkite University fulfilled the inclusion criteria during the study period.

Inclusion and Exclusion Criteria

Year one is not included in the study since they decided on a vocation after completing a common course. Year 2, 3, and 4 nursing students who were available at the time of the data collection period. Those nursing students who were seriously ill were excluded.

Sample Size and Sampling Procedures

A formula for determining a single population proportion was used to estimate the sample size. Because no research has been done on this subject, the sample size for this cross-sectional study was estimated using a 50% prevalence assumption. The study's sample size was calculated using a 95% confidence interval and a 5% point margin of error. The study participants were chosen by lottery using a simple random sampling procedure using a list from each class as a sampling frame.

$$n = z \frac{(Z\alpha^*)^2 p(1 - p)}{d^2}$$

$$n = \frac{1.96)^2 0.5(1 - 0.5)}{(0.05)^2} = 384$$

Add 10% for non-response the final sample size was 422.

Variables

Dependent variables

The attitude of the nursing student towards the nursing profession.

Independent Variables

Socio-demographic variables; Age, sex, marital status, residence, educational level, presence of nurse practitioner in the family members, family income, ethnicity, religion, family occupational status, family educational status, and factors affecting the attitude of students towards their profession like; Reason to join their profession, having information before joining nursing, 12th-grade result, availability of international work, and qualification before joining.

Operational Definition

Nursing profession: it is a profession within the health care sector focused on the care of individuals, families, and communities so they may attain, maintain, or recover optimal health and quality of life.

Positive attitude: A student who has the positively stated attitudinal statements toward the nursing profession, who scores above the mean from the attitude question.

Negative attitude: a student who has negatively stated statements towards the nursing profession, who scores below the mean from the attitude question.

Attitude: is defined as a predisposition or a tendency to respond positively or negatively towards a certain idea, object, person, or situation.

Nursing students: defines a student nurse as a student enrolled and registered with a college or a university to pursue a nursing program leading to the award of a certificate to practice nursing.

Grade 12th result: Students who received 350 out of 700 points in the 12th grade in Ethiopia are eligible for admission to universities.

Data Collection Tool

A pretested and a standardized self-administered questionnaire were used to get the data. The questionnaire was created based on several earlier studies of a similar nature and then adjusted to add crucial factors from this study. Then study participants were selected by a simple random sampling technique from each year of study using the students' lecture room. The survey variables include demographic, attitudes, and general professional features associated with the nursing

profession. The questionnaire was initially drafted in English and translated into the local Amharic language and re-translated back into English by independent language experts.

15 items were used to measure attitudes towards the nursing profession (with a minimum score of 15 and a maximum score of 75). Responses to each item were recorded on a 5-point Likert scale as follows: “strongly disagree” (1 point), “disagree” (2 points), “neutral” (3 points), “agree” (4 points), and “I completely agree” (5 points). The overall relationship level was classified using Bloom’s baseline cutoff point as positive if the score was 80–100% (60–75), neutral if the score was 60–79% (45–59), and negative if the score was less than 60% (45). An average score of ≥ 51.01 was regarded as a favorable attitude, and a score of less than 51.01 was regarded as an unfavorable attitude towards the nursing profession.

Data Quality Control

The questionnaire was pretested at Rift Valley University on 5% of the entire sample size, and significant revisions were done before the actual data collection. By carefully constructing the tool, the quality of the data was ensured. One-day training session on the data collection, how to ask questions, and how to engage with respondents was given to 3 BSc nurse data collectors and 2 supervisors. Before teachers begin delivering lessons, data collecting takes place in the lecture hall for 20 minutes. Supervisor carefully reviewed the obtained data every day for completeness, accuracy, and clarity and the principal investigators kept an eye on the overall data gathering activities.

Data Processing and Analysis

Before analysis, the acquired data were reviewed for accuracy and completeness. To conduct the analysis, the data were first entered into Epidata and then exported to SPSS version 23. After that, the data were recorded and cleansed using the proper statistical analysis. The outcomes of the descriptive analysis were presented using tables and figure charts, and frequencies statistics like mean, standard deviation, and percentage were utilized in the text. The internal consistency reliability of attitude questions in pretest questionnaires was investigated, and Cronbach’s alpha values of ($= 0.71$). Bivariate logistic regression analysis was used to find the correlation between each independent variable and the outcome variable using multivariable logistic regression analysis. In this study, a statistically significant association was declared at a P-value of <0.05 .

Results

Socio-Demographic Characteristics of the Respondents

A total of 364 students participated in the study, with a response rate of 86.6%. More than half of the study participants 190 (52.2%) were female, and more than three fourth of the study participants 305 (83.8%) were between the ages of 18–25 years. The majority of the participants 273 (75%) were unmarried, and more than half of the participants 214 (58.8%) were from an urban background. The education level of mothers; primary school, secondary school, master’s 169 (46.4%), 78 (21.4%), and 7 (1.9%) respectively, Less than 163 (44.8%) participants had a monthly income of more than 3000 ETB (Table 1).

The General Attitude of Students Toward the Nursing Profession

According to this study, out of 364 study participants who were asked why they wanted to become a nurse, almost half 176 (48.4%) participants they wanted to serve others, followed by a high score of 12th-grade results of 87 (23.9%), and low family income 32 (8.8%). Regarding about source of information obtained; from family (friends), health facilities, schools, and media 66 (31.1%), 65 (30.7%), 59 (27.8%), and 21 (9.9%) respectively. After joining the nursing department more than half of the students’ families 222 (61%) reacted positively toward the nursing profession (Table 2).

Nursing Students’ Attitudes Toward the Nursing Profession

The average attitude score in this study was 39.03. Nearly half of the participants 170 (46.7%) with; a 95% confidence interval with a range (41.8–52.2) had a positive attitude toward the nursing profession. More than half of the participants 194 (52.2%) showed a negative attitude towards the nursing profession in all attitude questions (Table 3).

Table 1 Distribution of the Sample's Students Toward the Nursing Profession at Wolkite University Ethiopia in 2022 (n = 364)

| variable | Category | Frequency | % |
|--------------------------|-------------------|-----------|------|
| Sex | M | 174 | 47.8 |
| | F | 190 | 52.2 |
| Age | 18–25 | 305 | 83.8 |
| | 26–35 | 59 | 16.2 |
| Marital status | Married | 83 | 22.8 |
| | Unmarried | 273 | 75 |
| | Other | 8 | 2.2 |
| Monthly income | <1000 | 34 | 9.3 |
| | 1000–2000 | 67 | 18.4 |
| | 2000–3000 | 100 | 27.5 |
| | >3000 | 163 | 44.8 |
| Education level | Year 2 | 71 | 19.5 |
| | Year 3 | 122 | 33.5 |
| | Year 4 | 171 | 47 |
| Residence | Urban | 214 | 58.8 |
| | Rural | 150 | 41.2 |
| Mother educational level | Unable read write | 13 | 3.6 |
| | Read and write | 45 | 12.4 |
| | Primary | 169 | 46.4 |
| | Secondary | 78 | 21.4 |
| | Bachelor degree | 52 | 14.3 |
| | Masters | 7 | 1.9 |
| Father educational level | Unable read write | 6 | 1.6 |
| | Read and write | 24 | 6.5 |
| | Primary | 142 | 39 |
| | Secondary | 88 | 24.3 |
| | Bachelor degree | 82 | 22.6 |
| | Masters | 22 | 6 |

Abbreviation: ETB, Ethiopian birr.

Factors Associated with Nursing Students in the Nursing Profession

This study assesses factors associated with the attitude of the nursing profession. In Bivariate analysis age, educational level, residence, family monthly income, having information before joining the nursing department, family (friends) react positively after joining the nursing department, their interest in nursing, and the effect of information on your attitude toward nursing profession status were the candidate variables for multivariable logistic regression analysis.

Table 2 General Inquiries Distribution of Students Toward the Nursing Profession at Wolkite University Ethiopia in 2022 (n = 364)

| Questions | Responses | f | % |
|---|------------------------------------|-----|-------|
| Students' reasons to join the nursing profession | High school 12th-grade result | 87 | 23.9% |
| | Design to help other | 176 | 48.4% |
| | Low family income | 32 | 8.8% |
| | Availability of international work | 57 | 15.7% |
| | Other | 12 | 3.3% |
| Students who had information about nursing before joining the profession | Yes | 206 | 56.6% |
| | No | 158 | 43.4% |
| Source of information | Family and friend | 66 | 31.1% |
| | School | 59 | 27.8% |
| | Health facility | 65 | 30.7% |
| | Media | 21 | 9.9% |
| | Other | 1 | 0.5% |
| Information received by students has an impact on their attitude | Yes | 212 | 59.2% |
| | No | 152 | 41.8% |
| How the information affected the students | Positively | 127 | 61.7% |
| | Negatively | 79 | 38.3% |
| Students' families who reacted positively after joining the nursing profession | Yes | 222 | 61.0% |
| | No | 142 | 39.0% |
| Students' reactions while they are talking with others about the nursing profession | Proud | 160 | 44.0 |
| | Shy | 79 | 21.7 |
| | Change topic | 59 | 16.2 |
| | Defending | 32 | 8.8 |
| | Attack nursing profession | 34 | 9.3 |

In multivariable logistic regression analysis age, residence, family monthly income, family reacted positively after joining nursing and their interest in the nursing profession were statistically significant factors associated with attitude towards the nursing profession.

The odds of having a positive attitude toward the nursing profession were 4.5 times higher among individuals aged 26–35 years old compared to those aged 18–25 years old (AOR: 4.54, 95% CI: 1.33–15.45). The odds of having a positive attitude toward the nursing profession were 2.6 times higher in urban areas than in rural areas (AOR: 2.64; 95% CI: 1.29–5.40).

By 77% (AOR:0.23; 95% CI:0.06–0.38), those with a monthly income of less than 1000 ETB were less likely to have a positive attitude toward the nursing profession than those with a monthly income of greater than 3000 ETB. My interest

Table 3 Distribution of the Nursing Students' Attitudes Towards the Nursing Profession at Wolkite University Ethiopia in 2022 (n=364)

| Attitude Domain | Strongly Dis-Agree n (%) | Dis-Agree n (%) | Neutral n (%) | Agree n (%) | Strongly Agree n(%) |
|---|-----------------------------|--------------------|------------------|----------------|------------------------|
| I chose nursing based on my desire and interest | 32(8.8) | 131(36) | 40(11) | 71(19.5) | 90(24.7) |
| Nursing provide the opportunity to help people | 14(3.8) | 115(31.6) | 44(12.1) | 92(25.3) | 99(27.2) |
| I love nurse than other professions | 50(13.7) | 105(28.8) | 71(19.5) | 81(22.3) | 57(15.7) |
| Nursing is vital profession in any society | 52(14.3) | 71(19.5) | 83(22.8) | 87(23.9) | 71(19.5) |
| I think the nursing profession has not reached the state it deserves | 25(6.9) | 66(18.1) | 95(26.1) | 80(22) | 98(26.9) |
| I love practicing nursing in clinical areas | 47(12.7) | 67(18.4) | 63(17.3) | 86(23.6) | 101(27.7) |
| When I was in high school I dream of being a nurse | 39(10.7) | 94(25.8) | 59(16.2) | 95(26.1) | 77(21.2) |
| I would advise any person to choose nursing as their future career | 42(11.5) | 57(15.7) | 73(20.1) | 104(28.6) | 88(24.2) |
| No difference b/n my perception of nursing and the reality in terms of education and practice | 44(12.1) | 73(20.1) | 50(13.7) | 133(36.5) | 64(17.6) |
| I think nursing is the most appropriate profession for me | 46(12.6) | 63(17.3) | 61(16.8) | 86(23.6) | 108(29.7) |
| I do not feel Inferior when I think of my profession | 9(2.5) | 57(15.7) | 82(22.5) | 105(28.8) | 111(30.5) |
| Nursing is a respected profession | 39(10.7) | 49(13.5) | 64(17.6) | 98(26.9) | 114(31.3) |
| Nursing is an independent profession | 23(6.3) | 36(9.9) | 68(18.7) | 101(27.7) | 136(37.4) |
| Nursing is significant in a patient recovery | 14(3.8) | 51(14) | 56(15.4) | 114(31.3) | 129(35.4) |
| Male nurses can be good nurse as females | 56(15.4) | 35(9.6) | 71(19.5) | 96(26.4) | 106(29.1) |

in nursing was 12.5 times higher than their counterpart (AOR: 12.5 95% CI: 4.78–32.69), and their interest in nursing was 12.5 times higher than their counterpart (AOR: 7.28 95% CI: 4.78–32.69) (Table 4).

Discussion

The prevalence of positive attitude toward the nursing profession was 46.7% with a range of (41.0–52.2%). Our research revealed that major correlates and predictors of attitude toward the nursing profession include age, residence, monthly income, family reaction after you join nursing, and my interest.

The finding of our study is consistent with previous studies conducted in Ismailia 44.4%,¹⁵ and Mangalore 43.33%.¹⁶ However, this study's finding was lower than the study conducted in Nepal 53.4%,¹⁷ Hue University 62.07%,¹⁸ Faculty of Nursing Zagazig University 96%,¹⁹ in Iran 65.4%.²⁰ This might be due to poor or inadequate information on academic and career planning for potential nursing students, limited resources, a heavy workload, low income in developing countries, and differences in the study environments.

Table 4 Factors Associated with Nursing Students' Attitude Towards the Nursing Profession at Wolkite University in 2022 (Multivariable Analysis, n=364)

| Variables | Category | Nursing Students Attitude | | | | Odds Ratio | |
|---|---------------|---------------------------|-------|-------------------|-------|--------------------|--------------------|
| | | Negative Attitude | | Positive Attitude | | COR(95 CI) | AOR 95% CI |
| Age | 18–25 | 174 | 89.7% | 131 | 77.1% | 1 | 1 |
| | 26–35 | 20 | 10.3% | 39 | 22.9% | 2.59(1.44–4.65)* | 4.54(1.33–15.45)** |
| Residence | Urban | 102 | 52.6% | 112 | 65.9% | 1.74(1.14–2.66)* | 2.64(1.29–5.40)** |
| | Rural | 92 | 47.4% | 58 | 34.1% | 1 | 1 |
| Family monthly income | <1000 | 25 | 12.9% | 9 | 5.3% | 0.32(0.14–0.73)* | 0.23(0.06–0.38)** |
| | 1000–2000 | 30 | 15.5% | 37 | 21.8% | 1.1(0.62–1.96) | 3.48(1.18–10.22) |
| | 2000–3000 | 62 | 32.0% | 38 | 22.4% | 0.55(0.33–0.91)* | 0.52(0.23–1.20) |
| | >3000 | 77 | 39.7% | 86 | 50.6% | 1 | 1 |
| Family reacted positively after joining nursing | Yes | 77 | 39.7% | 145 | 85.3% | 8.81(5.27–14.71)* | 12.5(4.78–32.69)** |
| | No | 117 | 60.3% | 25 | 14.7% | 1 | 1 |
| Students' interest in nursing | No | 45 | 23.2% | 29 | 17.1% | 5.98(2.41–14.85)* | 3.11(0.77–12.62) |
| | Yes to better | 84 | 43.3% | 134 | 78.8% | 14.82(6.49–33.84)* | 7.28(2.01–26.36)** |
| | Yes to worst | 65 | 33.5% | 7 | 4.1% | 1 | 1 |

Note: *Statistically significant ($p < 0.05$), **Statistically significant ($p < 0.01$).

Abbreviations: AOR, adjusted odds ratio; CI, confidence interval; COR, crude odds ratio.

The finding of this study was higher than studies conducted in India by 30%.²¹ This can be a result of various sampling techniques and study periods. The nursing students of today confirmed a favorable shift in their attitudes toward nursing as a respected and appreciated profession. This might be due to nursing students recognizing that their families and community appreciate the nursing profession which could, in turn, increase their self-esteem and commitment to the nursing profession.

The present study shows that there is a significant association between ages attitudes of nursing students towards the nursing profession. The finding is supported by the studies done in India.²² The possible reason could be explained that as nursing students age increases they seem to hold equivocal attitudes toward nursing as a career and critical thinking and mentality of professionalism might increase.

Our study also depicted that those students whose residence from Urban schools were 2.6 times more likely to have a positive attitude towards the nursing profession as compared to those students from rural schools. Similarly in our study, 65.9% of nursing students who have been living in urban schools had a positive attitude toward the nursing profession which is consistent with the study done at Sikkim Manipal College of Nursing.²² This association could be due to those students from urban areas having more opportunities and exposure to information, books, and the internet about the nursing profession.

Ethiopian nursing students who had a family income of less than 1000 EBR were 77% times less likely to have a positive attitude towards the nursing profession. This could be because the students in economically low and developing countries will choose nursing as a career. After all, nursing offers stable employment.

Moreover, the present study showed that those students' Families who reacted positively after they join the nursing profession were 12.5 times more likely to have a positive attitude towards the nursing profession as compared to their counterparts. This influence might be due to students' attitudes highly influenced by parents and friends and peer pressure

which had a significant impact on the choice of nursing as a career and encouraging force and main source of moral support during their years of schooling.

In our study majority of nursing students, 78.8% of them join the nursing profession of their interest which is higher compared to the study done in Saudi 52%).²³ Furthermore, the current study also exposed that those students who joined the nursing profession of their interest were 7.28 times more likely to have a positive attitude towards the nursing profession as compared to their counterparts. This could be due to intrinsic factors being the most determinant factor that could affect the attitude of individuals.

Limitation

This study may not demonstrate cause and effect relationships because a cross-sectional study methodology was employed.

Conclusion and Recommendation

Overall, less than half of nursing students had a positive attitude toward the nursing profession. Age, residence, family monthly income, Students whose families reacted positively after they join the nursing Profession, and students who joined the nursing profession of their interest were significantly associated with the nursing profession. Hence stakeholders in universities, health science colleges, the ministry of education, and the ministry of health have to give due attention to enrolling students who had their interested to join the nursing profession and portray a positive image of the nursing profession through seminars, brochures, media advertisements, professional journals and professional associations in general.

Abbreviation

SNNP, South Nation Nationality, and People; SPSS Statistical Package for Social Science WU, Wolkite University WHO, World Health Organization.

Data Sharing Statement

The datasets used and analyzed during the current study are available from the corresponding author on a reasonable request.

Ethics Approval and Consent to Participate

Ethical clearance was obtained from Wolkite University Ethical Review Board (ERB) and a permission letter was obtained from the nursing department. Following the permission, participants were briefed about the study purpose and the procedure of the data collection process. The responders gave their written informed consent. The study participants' privacy and the confidentiality of the information were both respected.

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Author Contributions

Each author significantly contributed to the work's conception, study design, execution, data collection, analysis, and interpretation, as well as its drafting, editing, or critical review. All authors agreed to be held accountable for all parts of the work and gave it their final approval before it was published. The journal to which the manuscript would be submitted was also decided.

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References

1. Coban GI, Kiirca N, Yurttas A. Analysis of nurses' attitudes about the nursing profession in southern Turkey. *Int J Caring Sci*. 2015;8(3):665.
2. Ali AA, El-Wahab EA, Abood SA. The relationship between students attitude toward nursing profession, achievement motivation and academic performance of baccalaureate nursing students. *Assiut Sci Nurs J*. 2014;2(3):181–192. doi:10.21608/asnj.2014.58601
3. Wilson S, Hauck Y, Bremner A, Finn J. Quality nursing care in Australian paediatric hospitals: a Delphi approach to identifying indicators. *J Clin Nurs*. 2012;21(11-12):1594–1605. doi:10.1111/j.1365-2702.2011.04004.x
4. Juraschek SP, Zhang X, Ranganathan V, Lin VW. United States registered nurse workforce report card and shortage forecast. *Am J Med Qual*. 2012;27(3):241–249. doi:10.1177/1062860611416634
5. Olshansky E, Zender R. The use of community-based participatory research to understand and work with vulnerable populations. In: *Caring for the Vulnerable*. Jones & Bartlett Learning; 2011:305.
6. Zencir G, Eşer İ. Nursing students' attitudes towards the nursing profession, nursing preferred with the relationship between: example of Turkey. *Dokuz Eylül Univ Nurs Faculty Electron J*. 2016;9(2):30–37.
7. Olshansky E, Zender R. The use of community-based participatory research to understand and work with vulnerable populations. In: *Caring for the Vulnerable*. Jones & Bartlett Learning; 2008:269–275.
8. Gulgoz S, Kagitcibasi C. Intelligence and intelligence testing in Turkey. In: *International Handbook of Intelligence*. Cambridge University Press; 2004:248–269.
9. Midilli TS, Durgun N. Nursing students' attitudes toward the nursing profession in western Turkey and affecting factors. *Nurs Health Sci*. 2017;6(1):55–60.
10. Coverston C, Harmon K, Keller E, Malner A. A comparison of Guatemalan and USA nurses' attitudes towards nursing. *Int Nurs Rev*. 2004;51(2):94–103. doi:10.1111/j.1466-7657.2003.00199.x
11. Cronenwett L, Sherwood G, Pohl J, et al. Quality and safety education for advanced nursing practice. *Nurs Outlook*. 2009;57(6):338–348. doi:10.1016/j.outlook.2009.07.009
12. Liaw SY, Wu LT, Chow YL, Lim S, Tan KK. Career choice and perceptions of nursing among healthcare students in higher educational institutions. *Nurse Educ Today*. 2017;52:66–72. doi:10.1016/j.nedt.2017.02.008
13. Shiroor G, Lily P. Knowledge and attitude regarding nursing as a Career among adolescence. *Int J Multidiscip Res Dev*. 2017;4(8):90–91.
14. Yohannes Z, Hadra N, Tegene L, Wehib M, Mohammednur S, Akalu T. Perception of nursing as a career choice among natural science preparatory school students in Hawassa City, South Ethiopia. *J Health Prof*. 2017;7(3):2348–9537.
15. Ahmed MM, El-Hosany WA, El-Sayed NM. Assessment of the Image of Nursing Profession as Seen by Secondary School Students in Ismailia. The 7th International Scientific Conference of Faculty of Nursing, Suez Canal University In collaboration with Edith Cowen university- Australia, 21–22 November 2018 Academic Perspective in Nursing: Practice, Education and Research. Available from: <https://www.researchgate.net/profile/Wafaa-El-Hosany/publication/331311539>.
16. Kathreena M, Jaslyn J, Jasmine M, Sonia K. A study to assess the attitude towards nursing profession among the nursing students in the selected college at Mangalore. *Int J Health Sci*. 2015;5(10):217–220.
17. Khatri A, Singh R. Knowledge and attitude towards nursing profession among male secondary level students. *J Kathmandu Med Coll*. 2020;9(3):137–143. doi:10.3126/jkmc.v9i3.36412
18. Mai BH, Ho TMY, Nguyen TTT, Hoang TH, Phuong NTA, Anh Phuong NT. Attitudes and perceptions towards nursing profession among nursing students at hue university of medicine and pharmacy. *J Probl Based Learn*. 2018;5(2):55–62. doi:10.24313/jpbl.2018.5.2.55
19. Mohammed AM, Abdeen MA, Ata AA. Nursing students' attitude toward nursing profession and achievement motivation. *Zagazig Nurs J*. 2020;16(1):17–35.
20. Koushali AN, Hajiamini Z, Ebadi A. Comparison of nursing students' and clinical nurses' attitude toward the nursing profession. *Iran J Nurs Midwifery Res*. 2012;17(5):375–380.
21. Chendake M, Mohite VR, Gholap M, Naregal PM, Hiremath P. A study to assess the knowledge regarding human rights of mentally ill among post basic B. Sc. nursing students in Krishna institute of nursing sciences, Karad. *Int J Health Sci Res*. 2014;4(10):164–171.
22. Das M, Devi B, Bhutia SD. Knowledge and attitude towards nursing profession among adolescent students of Sikkim. *Asian J Nurs Educ Res*. 2014;4(3):357.
23. Al Mutair A, Redwan F. Undergraduate Saudi nursing students attitudes towards nursing profession. *J Nurs Care*. 2016;5(329):2167–2168. doi:10.4172/2167-1168.1000329

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