



Gender Equality among Nurses: Promotion Strategies for Gender Equality

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Abstract

Introduction: Nurses have a special position in hospitals due to their specialized, valuable and stressful job. Gender inequality together with the concerns about *health inequalities need attention*. Therefore, this study aimed to investigate gender equality among nurses in Fars province of Iran and to provide solutions to improve gender equality.

Methods: This quantitative-qualitative study was conducted in 2020. In the quantitative phase, the study population included all nurses employed in public and private hospitals of Fars province as well as all nursing students at Fars universities during 2011-2018. In the qualitative phase, 16 semi-structured interviews were conducted. Using SPSS version 23.0, the quantitative data was analyzed by applying descriptive statistics and Chi-squared test. Qualitative data were analyzed with Max QDA by using the framework method.

Results: The majority of hospital nurses (79.81%) and nursing students (65.86%) were female. There were statistically significant relationships between gender and hospital, the type of employment, university, and the type of degree ($P=0.00$). In addition, 3 main themes including culture building, nursing education and employment as well as 17 sub-themes were identified to improve gender equality among nurses.

Conclusion: Fars province faces challenges such as gender inequality among nurses and the shortage of male nurses. It is essential to invest in the development and implementation of strategies and executive solutions for raising and maintaining the prestige of nursing profession and training qualified nurses with a focus on creating healthcare job opportunities for men and women equally.

Keywords: Gender Equality, Nurses, Promotion Strategies, Fars Province.

Article History:
Received: 28 September 2020
Accepted: 30 December 2020

Please cite this paper as:
Masoumi SJ, Nasabi NA, Varzandeh M, Bordbar N. Gender Equality among Nurses: Promotion Strategies for Gender Equality. J Health Man & Info. 2020; 7(4): 252-258.

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Introduction

Human resources are the most important, strategic, and rare assets of organizations whose knowledge, skills, and abilities can create economic value and competitive advantage for their organization (1). This is more evident in health care systems which are strongly dependent on their workers (2, 3). On the other hand, the economic and social changes have set forth the need for proper and optimal gender equality in human resources as one of the main issues of development; however, gender inequality has overshadowed economic development and influenced the provision of educational opportunities (4, 5). Gender inequality and health

care inequality are two main concerns of the health care system, and the elimination of health inequities has become one of the most important concerns of health care systems worldwide, especially in developing countries (6).

Among the health workforce, nurses, who constitute a substantial proportion of human resources in the health care systems, have a special position due to their specialized, valuable and stressful job (7). Given that the World Health Organization (WHO) considers investing in nursing training, retention, and development as a prerequisite for ensuring universal health coverage, the health systems should focus on nursing roles to achieve effectiveness (8).

Gender inequality in nursing has been repeatedly reported in Iran by health care providers, especially nursing policymakers. According to the Ministry of Health and Medical Education (MOHME), women and men make up about 75% and 25% of the nursing workforce in the country, respectively. (9). Inequality in human resources for health is an unpleasant and complex phenomenon on which various studies have been conducted.

Health organizational reports have indicated gender inequality among the nurses working in hospitals and medical centers. Moreover, the shortage of male nurses has been a serious challenge to health care systems. Gender equality in nursing has been a priority for the Deputy Director of Nursing of MOHME (9). In this regard, the findings of Niazi et al. showed that the distribution of nursing human resources in hospitals affiliated to Babol University of Medical Sciences and Ghaemshahr Social Security Organization does not meet the proposed standards of MOHME (10). Moreover, the study conducted by Nasabi et al. on the distribution of nurses by gender showed that the shortage of male nurses is one of the limitations and challenges in nursing (11). Gender inequality in human resources for health, especially among nurses, is not limited to Iran and has been reported in other countries as well. In England, for instance, stereotypes have affected gender in nursing, and efforts are being made to increase the ratio of male nurses (12). Likewise, only 10% of registered nursing students in Scotland are male (13). In Germany, men are reluctant to enter the nursing profession due to the impact of gender stereotypes (14). Therefore, health planners and policymakers need to understand the characteristics of the health workforce and compare them with the desired status of gender equality to identify strategies for the promotion of gender equality. Given the need for finding a solution for the supply and distribution of nurses in hospitals and medical centers, this study aimed to investigate gender equality among nurses in Fars province, and to provide solutions for improving gender equality.

Methods

This descriptive cross-sectional analysis, with a quantitative-qualitative research design and retrospective approach, was conducted in 2020. In the quantitative phase, the study population included all nurses employed in public and private hospitals of Fars province and all nursing students of Fars universities during 2011-2018.

After the research proposal was approved, we received the Ethics Code No. RCCHHRRS-1582

and written permissions from Fars universities of medical sciences. Then, the data on the number of male and female nurses working in Fars hospitals, and the number of male and female students entering and graduating from different study programs at Fars universities during 2011-2018 was collected through correspondence with the Human Resource Management Department of each university.

Next, the qualitative phase was performed. At this stage, semi-structured interviews were conducted to identify strategies for improving gender equality among nurses. Two former human resource managers, and the Deputy Director of Nursing of MOHME, former and current directors of human resources, The current and former Deputy Directors for the Development of Management and Human Resources, Director and Deputy Director of Nursing Office, Director of Organization Development and Administrative Transformation, and Clinical Supervisors of Private Hospitals of Shiraz University of Medical Sciences, Vice-Chancellor for Education at Faculty of Nursing and Midwifery and the director of the Department of Medical Education of Shiraz University of Medical Sciences were interviewed. The interviewees were selected via snowball sampling from knowledgeable people who had enough experience and information on human resource management, and were willing to share their information.

At this stage, the interviews were conducted by one of the researchers either in-person or over the phone, or virtually, depending on the participants' preferences. At the beginning of the interview, research objectives were explained to the participants, as well as the steps taken to ensure the confidentiality of their information. A semi-structured interview guide was then used. Each interview lasted 60 minutes and were transcribed word by word after the interview. Data saturation was attained after 16 interviews.

In order to ensure accuracy and precision in the qualitative phase, Guba and Lincoln's four criteria (credibility, dependability, confirmability, and transferability) were used for data coding (15). Constant data comparison, data classification and summarization, maximum variation sampling, in-depth interviews at participants' desired locations and times, and researcher's constant data engagement were used to ensure data credibility. In order to ensure data confirmability, two faculty members who were familiar with qualitative data analysis and had not participated in the research were provided with some of the interview transcripts and extracted codes. They were asked to check the precision of data encoding.

Expert review was used to ensure data dependability. Thus, these experts and members of the research team assessed the precision of data encoding. Also, in order to ensure data transferability, the data collection and analysis method, participant characteristics, and a complete description of the subject were provided so that other researchers can follow the research path.

The quantitative data were analyzed using descriptive statistics and a Chi-squared test in SPSS version 23.0 at a significance level of $\alpha=5\%$. Also, the qualitative data was analyzed with Max QDA using the five steps of the framework method as follows. The first step: in order to get familiar with the data, the researcher listened to the audio recordings and read the transcripts numerous times. The second step: to form the thematic framework, the researcher closely examined the data and identified common themes – topics, and ideas that have come up repeatedly and put them into groups identified by codes. The third step: Each data unit was labeled with codes that were indexed by relevant content. The fourth step: The summarized data was entered into the framework method matrix, and finally the fifth step: Mapping and interpreting were done to define the concepts, show the association between the concepts, and offer explanations and suggestions.

Results

A total of 5286 nurses had entered Fars hospitals during 2011-2018, including 4219 females (79.81%) and 1067 males (20.19%), the majority of whom were working in public hospitals (86.98) and were Peymani employees (41.39) (Table 1).

Also, a total of 11130 nursing students were studying at Fars universities during 2011-2018, including 7330 females (65.86%) and 3800 (34.14%) males. In addition, the majority of students were studying at public universities (63.56%) pursuing an undergraduate degree (91.05%) (Table 2).

The results showed a statistically significant relationship between gender and hospital ($P=0.00$), gender and type of employment ($P=0.00$), gender and university ($P=0.00$), and gender and study level ($P=0.00$). so that most of the nurses working in public hospitals were female. Most of the Peymani nurses were female. The majority of those studying at public universities were female. Also, the majority of the undergraduates were female (Table 3).

Three main themes, including culture building, nursing education, and nursing employment, as well as 17 sub-themes, were identified via the analysis of interviews (Table 4).

Table 1: Frequency distribution of nurses at Fars hospitals by gender during 2011-2018

Variables	Male (%)	Female (%)	Total (%)
Hospital			
Public	852 (16.12)	3746 (70.86)	4598 (86.98)
Private	215 (4.07)	473 (8.95)	688 (13.02)
Type of employment*			
Contract Employees	370 (7)	528 (9.99)	898 (16.99)
Permanent Employees	39 (0.74)	125 (2.36)	164 (3.1)
Tarhi Employees	362 (6.85)	1610 (30.46)	1972 (37.31)
Peymani Employees	284 (5.37)	1904 (36.02)	2188 (41.39)
Corporate employees	9 (0.17)	34 (0.64)	43 (0.81)
Other	3 (0.06)	18 (0.34)	21 (0.4)

*There are several types of employment in Iran including: 1) Contract (or Gharardadi) employees have a year-working-contract, whereas, 2) Permanent (or official) employees have a permanent contract. 3) Tarhi employees are newly graduated professionals who work in health care system for a year or two. 4) Peymani employees usually have a 1-3 year contract that might be extended to a permanent one. 5)Corporate (or Sherkati) employees work in the hospital but are paid by an external employer having a contract with the hospital.

Table 2: Frequency distribution of Fars nursing students by gender during 2011-2018

Variable	Male (%)	Female (%)	Total (%)
University			
Public	3020 (27.13)	4054 (36.43)	7074 (63.56)
Semi-private	780 (7.01)	3276 (29.43)	4056 (36.44)
Study level			
Bachelor	3565 (32.03)	6569 (59.02)	10134 (91.05)
Master	192 (1.72)	614 (5.52)	806 (7.24)
PhD	43 (0.39)	147 (1.32)	190 (1.71)

Table 3: The relationship between gender and demographic characteristics of the nursing staff and students

Variable		Gender		Results of χ^2
		Male N (%)	Female N (%)	
Hospital	Public	852 (16.12)	3746 (70.86)	$\chi^2=60.1$, df=1, P=0.00
	Private	215 (4.07)	473 (8.95)	
Type of employment*	Contract Employees	370 (7)	528 (9.99)	$\chi^2=322.6$, df=5, P=0.00
	Permanent Employees	39 (0.74)	125 (2.36)	
	Tarhi Employed Employees	362 (6.85)	1610 (30.46)	
	Peymani Employees	284 (5.37)	1904 (36.02)	
	Corporate employees	9 (0.17)	34 (0.64)	
	Other	3 (0.06)	18 (0.34)	
University	Public	3020 (27.13)	4054 (36.43)	$\chi^2=631.03$, df=1, P=0.00
	Semi-private	780 (7.01)	3276 (29.43)	
Study program	Bachelor	3565 (32.03)	6569 (59.02)	$\chi^2=54.22$, df=2, P=0.00
	Master	192 (1.72)	614 (5.52)	
	PhD	43 (0.39)	147 (1.32)	

*The types of employment are explained in footnote no 1

Table 4: Identified solutions for improving gender equality among nurses

No.	Theme	Sub-Theme
1	Culture building	<ul style="list-style-type: none"> - Improving the <i>prestige of nursing</i> and making it an attractive career choice - Utilizing <i>cross</i>-sectoral capacities and collaborations such as public media and Department of Education - Changing the name of this profession to clinical engineering - Introducing the nursing profession to the youth as a valuable job during Work and Employment Week Event - Providing clinical services to the community and specific target groups by male nurses during the <i>Public Health Week Event</i>
2	Nursing education	<ul style="list-style-type: none"> - Assigning an <i>admission ratio</i> for men to get into nursing school - Assessing their physical and mental health status before entering nursing school - Conducting <i>admission</i> interviews for those who have got <i>admitted</i> through the written entrance exam for the purpose of rational decision making on student admission - Giving special privileges on male students continuing education to get their master and doctoral degrees in CCU, ICU, trauma, emergency, neurology and burns
3	Nursing employment	<ul style="list-style-type: none"> - Creating financial incentives for men through paying <i>nursing sign-on bonuses</i> - Employing male nurses for higher <i>paying</i> nursing jobs - <i>Allocating compensation</i> benefits for men who enter the nursing profession - <i>Prioritizing male nurses' employment at specific clinical wards</i> - Acting the laws such as unpaid leave and severance pay for each person - <i>Changing salaries</i> - Supporting the nurses working in public sector hospitals especially teaching hospitals that provide <i>medical education and training</i> - Job rotation

Discussion

Nurses play a valuable role in the health care system and have a stable competitive value as the driving force of the system (16). In the WHO report 2010, the emphasis was placed on the need for identifying the number and characteristics of health care providers, the need for cultural, gender, and ethnic parities in the health workforce, and to develop strategies for ensuring gender equality in the health workforce, paying attention to gender in human resources assessment, considering the distribution of health workforce based on gender and the need for an

analytical framework for gender inequality in the health system, considering the number of male/female medical students entering universities, and incentives for retaining health workers according to gender indicators (17). Therefore, this study aimed to investigate gender equality among nurses in Fars province, and to provide solutions for promoting gender equality among them.

As the findings of this study showed, the number of female nursing staff working in Fars hospitals and the number of female nursing students studying in Fars universities during 2011-2018 were significantly

higher than the male ones, thereby indicating gender inequality in nursing staff and students in the province. It seems that female nurses provide care to male patients due to the shortage of male nurses. This can lead to problems such as a shortage of male nursing staff for male care units and where manly strength is required such as trauma, burn, emergency, and intensive care units. An analysis of gender equality in 22 European countries over the past 16 years showed that the nursing profession and nursing workforce should be strengthened by *policy making*, and indicators of gender equality in education and employment should be developed to adjust the nursing graduates –to- employed nurses ratio (18). A study conducted by Squires et al. (2019) in Georgia puts emphasis on the reform of the nursing human resources (19). Sasa's study (2019) in the UK showed that stereotypes have affected gender inequality in nursing, and efforts are being made to increase the ratio of male nurses (12). The findings of Whitford et al. (2020) in Scotland also showed that only 10% of registered nursing students are males (13). Moreover, the findings of Schwamm (2019) in Germany showed that men are reluctant to enter the nursing profession due to the impact of gender stereotypes on nursing (14). Carlsson's study (2020) in Sweden showed that nursing is a "feminine profession" and this stereotype is considered as an obstacle to the development of the nursing profession, so female students think they are better able to provide health care services and male students think they are better at development and leadership skills (20). These examples show that tackling gender stereotypes in nursing is not specific to our country and can be seen in other countries even in developed countries. Consistent with the present study, these studies have indicated that men are less inclined to work in the nursing profession.

In order to identify the solutions for the promotion of gender equality among nurses, the participants' opinions and suggestions were classified into three categories: *culture building*, *nursing education*, and *nursing employment*. The culture-building category included macro solutions at the community level as well as the need for interaction and cooperation among various organizations and ministries. In this regard, it should be mentioned that the attitude of society towards nursing can affect nurses' performance and job satisfaction. The more positive this attitude is, the more nurses feel good about their job and the lower nurse turnover rates (21). However, negative attitudes of society towards nursing can have an adverse effect on nurses' turnover and organizational performance (22-26). Therefore, programs and policies should

be developed to promote the value and importance of nursing in the society. People should know that a healthy society will be a powerful and successful society, and the health of a society depends on the nurses who deliver services. This way of thinking in society can lead to work engagement and increased retention rates among nurses (27). The health officials' attempts to clarify the status of nurses in the health care system of Iran and to reform the cultural system have been effective in repairing nurses' damaged professional identities and may lead to a greater propensity for this profession among men and also to the promotion of gender equality in nursing. In this regard, the use of the public media for giving higher importance to nursing as a specialized profession can be a cross-sectoral objective of MOHME. Culture building via educational tools and introducing this profession using educational videos should be set as the priority agenda for this ministry. Changing the name of this profession to clinical engineering can be effective in culture building since clinical engineering is more accepted by society.

The nursing education category included the strategies for improving the prestige of nurses and creating strong incentives for improving the *public's perception* of the nursing profession and encouraging men to enter nursing. Physical, psychological and personality characteristics that enable learning and performing job duties should be considered as job requirements. Given that personality traits influence career choices (28), and due to the significant rates of nurse burnout, the effects of nurses' personality traits on their physical and mental health and the quality of nursing care services (29, 30), it is essential to recruit healthy nurses who can stand the challenging work conditions and psychological distress, and provide the highest quality care to patients. Pre-education and pre-employment assessments may ensure the desirable and required personality traits that make a good nurse. These personality traits should be maintained and improved during nursing education and employment (31-33). Encouraging men to choose the nursing profession and improving the prestige of nursing can be effective in attracting them to the nursing profession. On the other hand, gender equality in nursing education is essential for meeting future professional needs. To do so, following strategies are recommended for the purpose of rational decision making on student admission, and improving nurse retention: 1) assigning an admission index for men to get into nursing school; 2) giving special privileges on continuing their education to get their master and doctoral degrees in CCU, ICU, trauma, emergency,

neurology, and burns; 3) assessing their physical and mental health status before entering nursing school; 4) conducting admission interviews for those who have got admitted through the written entrance exam.

The nursing employment category included nurse recruitment and retention strategies. Nurse recruitment and retention are considered as the main functions of human resource management. A study in the UK showed that low salaries of nursing and negative healthcare ads may have reduced men's motivation to enter the nursing profession (34). Moreover, a study in Italy showed that managers should arrange and organize the staff in such a way that male-female collaboration among physicians and nurses is ensured given the higher percentage of female medical workers (35). Therefore, career planning is positively correlated with job effectiveness, efficiency, satisfaction, organizational commitment, ability to deal with new competitors, and employee retention. Career planning can increase employees' loyalty and intrinsic motivation (36, 37). Thus, career planning should be on the agenda of human resources/nursing management as a prerequisite for male nurse retention.

Conclusion

As the results of this study show, Fars province faces challenges such as gender inequality in nursing and shortage of male nurses. Therefore, it is essential to invest in the development and implementation of strategies and executive solutions for improving the prestige of the nursing profession and training qualified nurses with a focus on creating healthcare job opportunities for men and women equally.

Acknowledgments

The research proposal (No. 206/1582) was approved by the Ministry of Health and Medical Education. We would like to express our gratitude to the officers of Fars universities of medical sciences, managers, and employees of the Departments of Human Resources of the studied centers who were always so helpful and provided us with their assistance.

Conflict of Interest: None declared.

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