

## SYSTEMATIC REVIEW

## FACTORS RELATED TO PURSUING HIGHER EDUCATION AMONG NURSES IN A DEVELOPING CONTEXT

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## ABSTRACT

**Introduction:** Higher education plays a vital role in nursing education, nursing care, nursing practice, and administration. This research examines the factors that facilitate the pursuit of higher education, including personal and professional factors such as promotion, better job positions, and job satisfaction. It also discusses the challenges faced, which include both personal and institutional factors, such as financial constraints and a busy work schedule during studies.

**Material & Methods:** In this literature review, existing studies on the inhibiting and facilitating factors were retrieved through a literature search in PubMed, the Cumulative Index to Nursing and Allied Health Literature (CINAHL), and Google Scholar.

**Results:** Preliminary evidence suggests that inhibiting factors for higher education include financial issues, work schedules, and organizational policies. On the other hand, facilitating factors are associated with the acquisition of knowledge and skills, high job positions, and personal satisfaction. Therefore, pursuing higher education presents several challenges, and there is a need for research in developing countries to identify context-specific inhibiting and facilitating factors. This research would help overcome these challenges and enhance facilitating factors to increase the number of nurses and address the shortage of highly qualified professionals.

**Conclusion:** Nurses face both facilitating factors and challenges in higher education, including institutional, personal, and professional factors. Higher education students can significantly overcome these challenges through access to scholarships, flexible work schedules, and a sense of unity among nurses.

**Keywords:** Higher Education, Nursing Education, Nursing Care.

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## INTRODUCTION

Nursing higher education includes a wide range of academic programs. These programs are intended to strengthen nurses' clinical skills, critical thinking ability, leadership traits, and specialized knowledge in numerous areas of healthcare.<sup>1</sup> Higher education contains Post registered nurse Bachelor of Science in nursing (Post RN BSN), Master of science in nursing (MSN), Advance Practice Nurse (APN),

Doctor Nurse Practice (DNP), and Doctor of philosophy (PhD).<sup>2</sup> Higher studies in nursing play a significant role in shaping and organizing the profession as a whole.<sup>3</sup> It helps in implementing recent evidence-based practice (EBP) in clinical areas.<sup>4</sup> The nurses with HE provides advanced care to patients while maintaining professional values in the workplace.<sup>5</sup> Furthermore, they contribute to

improved treatment outcomes and increased patient satisfaction.<sup>6</sup> The HE and patient outcomes are closely related to each other, increase in the number of nurses with higher education can result in reduced morbidity and mortality rate of patients.<sup>7</sup> Pakistan has a shortage of 900,000 nurses. There are 110626 registered nurses and only 369 registered nursing institutes in Pakistan. Moreover, Pakistan has only 12 PhD qualified nurses while 16 scholars are doing PhD in different universities. The total number of PhD who graduated from Pakistani universities is just three.<sup>8</sup> According to recommendations of Higher education commission (HEC), faculty with at least one high degree in the relevant program may teach students in a particular program. Therefore, the need for MSN-prepared faculty is recommended by the HEC. However, in Pakistan, there are 522 MSN degree nurses & 414 nurses have master's degrees in public health.<sup>8</sup> Due to various reasons, particularly financial and geopolitical instability, Pakistani nurses are highly motivated to move abroad.<sup>9</sup> Some of them have already migrated to other countries in search of better opportunities. Considering the current scenario, it is evident that the pursuit of higher education among nurses in Pakistan is insufficient. As a result, educational institutes of Pakistan are unable to provide quality education due to a lack of qualified nurses. Consequently, many nursing education institutes are producing below-quality nurses.<sup>10</sup> Thus, strategies need to be adopted to encourage nurses to get higher education.<sup>11</sup> The shortage of highly qualified nurses and the challenges mentioned above motivated me to conduct an extensive literature review to identify the inhibiting and facilitating factors the influence higher education in nursing. The aim of this review is to explore the existing literature on the facilitating and inhibiting factors related to pursuing higher education.

## MATERIAL AND METHODS

The databases including PubMed, Cumulative Index to Nursing and Allied Health Literature (CINAHL), and Google Scholar were used. Medical Subject Headings (MeSH) were included in the final search syntax & Boolean operators with wildcard characters were included. These terms were used for search “Higher education” OR “MSN\*” OR “nursing higher education” OR “PhD Nurs\*” and challenges OR “Barriers” OR “Inhibit” \* OR

“Facilitate\*” OR “Factor\*” and “Nurses” OR “Nurs”\*. Articles published from 2015 to 2024 were reviewed. Articles searched were restricted to those available in English and obtainable in Full-text format as shown in Figure 1. A comprehensive literature review was conducted over a period of 6 months. The study consists of higher education nursing students and nurses.

## RESULTS

A total of 16,555 records were retrieved from the selected databases. After applying filters, 16310 articles were excluded. Subsequently, duplicate studies were removed, and the abstracts of 110 full-text articles were reviewed. Of these, 94 articles were excluded for various reasons. Ultimately, 16 papers were included in this literature review.

The included articles were synthesized for analysis. Of these, eight studies were cross-sectional, six studies were qualitative, one was cohort, and one was mixed method. The majority of the published articles were from the USA, Africa, Australia, Egypt, Qatar, Iran, Pakistan, Israel and Malaysia. Relevant information was extracted from the selected papers, including study characteristics and findings. The extracted information included general information (such as the first author's name, country, year, study title, sample size, and study design) as well as factors that inhibit and facilitate higher education in nursing.

### Scope of Higher Education

Higher Education improves job opportunities and employees' performance outcomes, as it results in evidence-based practice and enhanced knowledge and skills of the nurses.<sup>19</sup> Consequently, it contributes to improved performance of an organization in terms of quality outcomes and patient satisfaction. It also supports an individual to create new systematic knowledge to guide and change the nursing profession and advance the health of individuals, communities, and populations. Furthermore, the digitalization of healthcare through modernizations in data science, artificial intelligence, and robotics is creating numerous opportunities for those with Ph. D. in nursing to advance the quality of care and improve access to healthcare, particularly for underserved populations.<sup>12</sup>

Higher Education programs are designed to equip students with the foundational knowledge and skills that enable them to conduct research throughout their careers and

not just for their dissertation. Statistics, philosophy, research methods, and measurements are all common course topics included in higher education.<sup>13</sup> A study reported that nurses believed HE enhances their competence and quality of care. It also helps them to get higher positions and work as Clinical Nurse Specialists (CNS) or nursing specialists. Furthermore, motivated nurses demonstrate resilience when pursuing higher education, which supports their academic and professional growth.<sup>14</sup>

## DISCUSSION

### *Facilitating factors of higher education*

The nurses accepted that the hospital provided opportunities for higher education and provided financial support for higher studies. Additionally, flexible work schedules were identified as significant motivators for pursuing higher education.<sup>21</sup> The research concluded that a high percentage of students were satisfied with learning environmental factors followed by organizing factors. Moreover, administrative support and library services were also ranked as satisfactory factor by postgraduate students.<sup>30</sup> The nurses reported that with higher education they get more knowledge and skills, enhanced competence at work and empowered within society.<sup>31</sup> A similar study showed that nurses and midwives identified flexible work schedules, scholarships/stipends, and loans as facilitating factors for higher education while some reported that colleagues enrolled in higher education also encourage and support each other.<sup>32</sup> Several similar studies conducted in various countries have shared numerous facilitating factors that influence HE among nurses. Results revealed that nurses are motivated toward higher education for job promotions and better positions. These achievements not only improve their confidence level in the workplace but also earn them more respect, which gives them personal and professional satisfaction. The participants also believed that if they had higher education, they would have reduced workload, better social status and improved overall well-being.<sup>15,17,19,33</sup>

### *Challenges in higher education*

In studies, participants highlighted that organization policy, financial barriers, and strict work schedules are the biggest challenges that inhibit nurses from higher education. The participants declared that the high cost of

education and family responsibility are also barriers to higher education. Furthermore, Technology requirements and research-related challenges are also inhibiting factors.<sup>15,21,25,26</sup> Another study identified three key challenges for HE; the first one was personal challenges which includes finances, job, domestic and resident. The second was academic and institutional challenges such as workload and time constraints. And the third one was research-related challenges. A contrast study revealed some other barriers such as Information literacy, supervisory relationship, and supervisory structure and process.<sup>34</sup> Higher studies are also associated with the support provided by the educational institute as well as the domestic support. Several organizational challenges hinder nurses from pursuing higher education, including uncooperative institutions and financial burdens.<sup>28</sup> Participants in one study expressed concerns about managing small children, compromising their social lives, and feeling it was too late to start higher education. Moreover, lack of scholarship opportunities, strict class schedules, and the absence of study leave policies, makes it difficult for nurses to enroll in further studies.

A study on MSN graduate students highlighted economic restraints, work commitments, and domestic tasks as major challenges that are consistent with the findings of the current study. A contrast study highlighted different challenges, such as strict faculty mentoring, anxiety about research and thesis processes, and limited familiarity with modern technology.<sup>22</sup> In another study, the Students' reported financial constraints, family responsibilities, program duration, living far away from the university, strict work schedule and degree programs as key inhibiting factors for HE.<sup>35</sup> According to another study participants revealed that nurses' high tuition fees is a hindrance to HE.<sup>32</sup> High tuition fees were another significant barrier, along with the limited availability of higher education programs in universities. Additionally, some nurses admitted to struggling with modern technology, statistics, and writing skills, which further impeded their progress in advanced education.<sup>36</sup> Contrary studies pointed out some other inhibiting factors such as student-related factors, instructor-related factors, inadequate teaching methods, insufficient facilities, and flawed evaluation criteria.<sup>29</sup>

Nashwan, Villar<sup>32</sup> reported that despite these challenges, nurses who received scholarships, stipends, loans, or flexible work rosters found these resources helpful in overcoming barriers to higher education.

Management of hospitals plays an important role in creating a supportive environment for higher education students. They can provide flexible work schedules and can develop effective study leave policy. After the completion of higher studies, management can further support nurses by offering better positions that enable evidence-based practice and foster competitive leadership skills.

## CONCLUSION

The current literature review concludes that the most significant facilitating factors for pursuing higher education among nurses include better job positions, further education opportunities, professional satisfaction, scholarships, and flexible work schedules. On the other hand, barriers to higher education were identified as financial challenges, management issues, strict university policies, research-related anxiety, family responsibilities, program duration, and living far away from the university. The administration should develop a comprehensive plan to address these challenges, which will promote higher education and will increase the number of highly qualified nurses.

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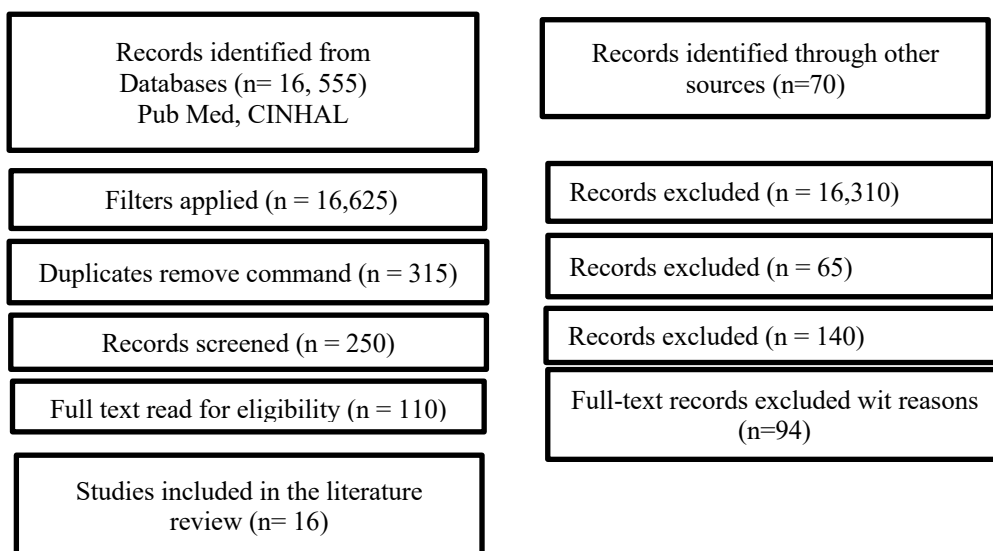


Figure 1: PRISMA Flow Diagram

Table 1: Studies included in the review

Author and year	Title	Population & Country	Facilitating Factors	Inhibiting Factors	Study Design
Kinsella 2018	Motivational factors influencing nurses to undertake postgraduate hospital-based education	34 nurses Australia	Intrinsic & Extrinsic motivation ,Skill, Knowledge		Cross-sectional
Loftin 2021	Challenges in Pursuing Nursing Education at the Graduate Level: Motivators, Barriers, and Persistence	119 nursing students USA	Promotion ,Better positions ,Further education worker & Family encouragement , knowledge ,Confidence level earn more respect, personal and professional satisfaction	Hard work schedule, Financial constrain ,Domestic issues , long duration of degree , Technology requirement , Personal responsibilities	cross-sectional descriptive
Ng 2016	Exploring factors affecting registered nurses' pursuit of postgraduate education in Australia	586 nurses Australia	Clinical skills, improves critical thinking ,knowledge , confidence, satisfaction	cost was economic commitment overload of work lack of a flexible learning lack of personal interest	Cohort study
Watkin 2015	Reasons for application and expectations from a post-registration degree: Views of Omani nurses and their manager	57 nurses Oman	Availability of the university, Further education, self-growth, enhance knowledge and skills		Longitudinal Qualitative
Nashwan 2022	Intention and motivation to pursue higher education among registered nurses and midwives: a cross-sectional study during COVID-19	513 nurses Qatar	flexible work schedules & scholarships/stipends, loans, advanced education	High fees, Education ,unavailability of higher education institutions ,Busy work schedule ,Family commitment , unaware of modern technology	Cross-sectional

Nazar 2019	Nurses and Midwives Perceptions of Benefits of Higher Education and the Barriers Faced by Them in Undertaking Higher Studies	450 nurses Dubai	Enhances knowledge, better jobs , personal satisfaction , promotion	Small kids, worry about compromising their social life, unavailability of scholarship , strict class time table , long traveling, rotation duty schedule, No study leaves policy	Mix method
Kithuci 2017	Factors Influencing Educational Upgrading of Nurses at a Regional Referral Hospital In Kenya	126 nurses Kenya	Education & Competitive workforce of flexible study, knowledge and skills	Financial constraints, Old age, Inadequate rewards. Financial responsibilities, married life, older than their classmates , technological challenges , Inadequate time	Cross-sectional
Kausar 2019	Assessing Nurse's Problems in Pursuing Higher Education, Implementing Evidence-Based Practice and Patient Care Deliver	Pakistan 213 nurses		Organization constrain ,Financial barriers, Strict work schedules, High cost of tuition, Family responsibility, Aging	Cross-sectional
Walliuam 2021	Overcoming barriers to PhD education in nursing	USA MSN students		University strict rules, Research anxiety, Economic restrain	Survey
Sabio 2020	Understanding the Barriers to BSN Education Among ADN Students: A Qualitative Study	USA Diploma nurses 3 focus		Financial constraints, Family responsibilities, Program duration, living far away from the university, Strict work schedule,	qualitative Phenomenological
Qadir 2018	Mitigating barriers to doctoral education for nurses	Qatar PhD students		Fear of failure, Financial lack of writing ability, Unfamiliar with statistics	Cross-sectional
Mbombi 2020	Exploring barriers that nurses experience to enrolment for a postgraduate nursing qualification at a higher education institution in South Africa	Africa 20 nurses		Financial challenges, shortage of staff in the hospital, Lack of information, lack of requirements for postgraduate courses on the job, Family responsibilities, Deficiency of education curiosity	qualitative exploratory-descriptive
Sengane 2018	Challenges experienced by postgraduate nursing students at a South African university	Africa 15 master doctoral		Financial, job, domestic issues, workload ,time constraints , Information literacy, supervisory relationship, supervisory structure and process	qualitative exploratory descriptive
Ahmad H 2019	Factors affecting postgraduate nursing students' satisfaction and its relation to their academic achievement	Egypt 100 postgraduate students	Learning environment, organizing factors, administration and library services		Descriptive correlational
Sharabani R 2023	Motivations and challenges of Israeli nurses on their journey to a PhD: A qualitative study.	Israel 16 doctoral nurses	Domestic , Institutional support, Professional development, Accountability for encouraging the image of nursing	Organizational establishment, uncooperative place of work, financial burdens	qualitative study
Eslamian J 2015	Challenges in nursing continuing education: A qualitative study.	Iran 39 nursing midwifery		Instructor-related factors, instructive procedure-related factors, Insufficient facilities, and malfunctioning of evaluation	qualitative descriptive exploratory