

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

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ABSTRACT: Job satisfaction among nurses is a critical determinant of healthcare quality and workforce stability. Extended work shifts, particularly the 12-hour model, are increasingly adopted worldwide but remain controversial in their impact on nurse well-being and patient care. This study examined the job satisfaction of Filipino nurses employed locally in the Philippines and overseas Filipino worker (OFW) nurses in Saudi Arabia, both working on 12-hour shifts. A phenomenological research approach was employed, guided by Herzberg's Two-Factor Theory. The study used a purposive sampling technique, selecting 20 registered nurses. The findings revealed that while nurses in both countries generally favored 12-hour shifts over traditional 8-hour shifts due to fewer workdays, greater continuity of care, and cost savings, Saudi-based nurses expressed higher satisfaction overall. The primary differentiator was compensation and institutional support, with Philippine nurses indicating dissatisfaction related to low salaries and limited organizational recognition. The results of the study highlighted the importance of intrinsic and extrinsic motivators in shaping satisfaction, recommending strengthening policies on standardized shift systems, competitive remuneration, and retention-focused management strategies in the Philippines.

KEYWORDS: 12-hour shift, job satisfaction, nurses, Philippines, Saudi Arabia

I. INTRODUCTION

Nursing is often described as the heart of healthcare, with nurses serving as the largest and most indispensable group of professionals in the industry. They provide round-the-clock care, often under demanding conditions, and their satisfaction in the workplace is closely tied to both patient outcomes and organizational success. Over the past decade, many hospitals have shifted from the traditional 8-hour schedule to 12-hour shifts as a strategy to improve efficiency, enhance continuity of care, and address workforce shortages (Rhéaume & Mullen, 2018; Saville et al., 2020). While this model reduces the number of workdays and can yield cost savings, its impact on nurses' job satisfaction and well-being remains contested.

As the global nursing shortage has reached a critical level, with the World Health Organization (2020) identifying it as a key challenge for health systems worldwide. High-income countries attempt to fill gaps by recruiting foreign-trained nurses (Pressley et al., 2023; Pung et al., 2016), while nurse-exporting nations such as the Philippines face the dual challenge of sustaining their domestic workforce while supplying global demand (Corpuz, 2023; Kurnat-Thoma et al., 2017; Twigg et al., 2014). The Philippines—long recognized as one of the leading sources of migrant nurses—has a significant proportion of its workforce employed abroad, a pattern highlighted in global workforce studies (Alfuhaid et al., 2023; International Council of Nurses [ICN], 2020). This underscores the urgency of understanding the factors that drive or hinder nurse satisfaction.

Job satisfaction plays a central role in retention and quality of care. Satisfied nurses demonstrate stronger commitment, greater productivity, and improved patient interactions (Wolniak & Olkiewicz, 2019). Conversely, dissatisfaction contributes to burnout, turnover, and reduced quality of healthcare delivery (Alzoubi et al., 2024; Bettinardi et al., 2008; Cummings et al., 2008). Yet evidence is inconclusive on whether 12-hour shifts alleviate or exacerbate these pressures. Some studies link longer shifts to fatigue and declining well-being (Thompson et al., 2019), whereas others point to scheduling flexibility and better continuity of care compared with 8-hour shifts (Baillie & Thomas, 2019).

Recent literature continues to debate whether shift length significantly affects nurses' job satisfaction, health, and patient outcomes. Given the detail-oriented nature of nursing, such as requiring vigilance, accuracy, and rapid adaptation, shift length

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

directly influences not only workforce well-being but also the safety and quality of care (Baillie & Thomas, 2019; Galanis et al., 2023). Advocates of 8-hour shifts cite reduced fatigue, improved concentration, and greater satisfaction with schedules (Baillie & Thomas, 2019). By contrast, many hospitals retain 12-hour shifts, citing fewer handovers, improved continuity, and more off-days for staff (Saville et al., 2020). The long-term consequences for both nurses and patients thus merit careful, context-sensitive examination.

Critiques of 12-hour schedules emphasize physical and psychological tolls. Fatigue can accumulate across consecutive long shifts, impairing reaction time, attention, and even strength (Thompson et al., 2019), with implications for patient safety. Qualitative evidence in mental health settings associates mandated 12-hour shifts with stress, reduced well-being, and lower morale (Suter et al., 2020). At the same time, under specific conditions, 12-hour schedules have not shown clear detriments to performance or outcomes (Webster, 2019). Nurses themselves often report preferring compressed workweeks for longer recovery windows and family flexibility (Saville et al., 2020; Shehata, 2024). This paradox of tangible risks alongside valued benefits suggests the core question is conditional rather than absolute.

A more nuanced approach therefore focuses less on whether 12-hour shifts are categorically “good” or “bad” and more on the conditions under which they can be implemented safely. Mediating factors include adequate staffing levels, protected rest breaks, limits on consecutive long shifts, and institutional policies that support recovery (Scott-Marshall, 2024). In their absence, adverse effects are more likely; when present, potential harms may be mitigated.

From a management perspective, decisions about shift systems should be evidence-based. The advantages of fewer handovers and scheduling flexibility must be weighed against risks of fatigue, burnout, and dissatisfaction. The link between nurse well-being and patient safety is well established. Large-scale workforce studies showed that poor working conditions, including excessive shift length, are associated with higher turnover, absenteeism, and diminished quality of care (Dall’Ora et al., 2016; Galanis et al., 2023; Hussein et al., 2025; Stimpfel et al., 2012). Ensuring safeguards when employing 12-hour shifts is therefore both a workforce and a patient-safety imperative.

Quality assurance provides a complementary lens: continuous, organization-wide efforts to optimize care quality hinge on reliable processes and a stable, competent workforce. Improving care is not only about adding resources but also about optimizing how work is organized, such as staffing models, shift design, and supportive supervision, so that human resources can perform at their best. Employees who perceive strong job characteristics and fit (e.g., manageable workload, role clarity, recognition) report higher job satisfaction, stronger organizational attitudes, and greater perceived security (Wolniak & Olkiewicz, 2019). In this sense, shift policy is a QA lever: better-designed schedules can enhance staff experience and, by extension, patient outcomes.

Conclusively, because the Philippines is a major supplier of global nursing labor, with many Filipino nurses working in Saudi Arabia, the question of shift length intersects directly with migration dynamics and retention. Work conditions such as shift length, compensation, and institutional support affect not only satisfaction but also decisions to stay or leave (Al Sabei et al., 2025; Galanis et al., 2023). Understanding when 12-hour systems can be sustained without harming nurse well-being or patient safety is thus both a local and transnational concern.

Against this backdrop, the present study compared the job satisfaction of Filipino nurses in the Philippines and those employed in Saudi Arabia working 12-hour shifts. As the Philippines continues to serve as one of the largest exporters of nursing professionals and Saudi Arabia remains a top destination for migrant nurses, examining these two groups offered valuable insights into how the same shift model is experienced across different health systems and socio-economic contexts (Alfuhaid et al., 2023; ICN, 2020). Guided by Herzberg’s (1968) Two-Factor Theory, the study explored how intrinsic motivators such as achievement, recognition, and professional growth interact with extrinsic factors, including salary, working conditions, and organizational policies, in shaping overall satisfaction. By addressing this gap, the research aimed to contribute comparative evidence that highlights both shared and divergent experiences of nurses in these countries. The findings served as a basis to inform hospital administrators and policymakers in developing retention-focused strategies, improving workforce policies, and strengthening institutional support. More broadly, this study underscored that enhancing nurse satisfaction is not only vital for reducing turnover and migration pressures in the Philippines but also crucial for sustaining the quality and resilience of healthcare delivery in both local and international settings.

II. METHODS

A. Research Design

The study employed a phenomenological research approach to examine the job satisfaction of Filipino nurses working under 12-hour shift schedules in two different contexts: locally in the Philippines and abroad in Saudi Arabia. Moreover, a qualitative approach was applied, as it allowed for the systematic comparison of job satisfaction levels between study participant groups and

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

provided a clearer understanding of the influence of intrinsic and extrinsic motivators on nurses' experiences in distinct healthcare organizational settings.

B. Participants and Sampling Procedure

A total of 20 registered nurses participated, comprising 10 nurses from a public hospital in the Philippines and 10 overseas Filipino workers (OFWs) in a major specialty hospital in Saudi Arabia, providing two naturally contrasting organizational and labor-market contexts in which Filipino nurses regularly work 12-hour rosters. A purposive sampling was employed to include nurses who (1) held valid professional nursing licensure in the Philippines, (2) had at least one year of continuous clinical experience, and (3) were currently employed in a healthcare institution with 12-hour shift schedules.

C. Research Instrument

The data were collected using an expert-validated structured interview-guide questionnaire aligned with the study objectives. The tool was designed to capture both intrinsic motivators (recognition, responsibility, opportunities for professional growth) and extrinsic motivators (salary, working conditions, staffing, shift arrangements). The structured interview-guide questionnaire underwent expert validation by nursing educators and administrators to ensure content relevance and clarity. Further, the qualitative instrument was subjected to a field test with a small group of nurses outside the study sites, ensuring trustworthiness and credibility of the research tool.

D. Data Gathering Procedure

The study followed a methodological data-gathering procedure, ensuring institutional protocols and participants' convenience were observed. The researchers requested permission to conduct an investigation through a communication letter that was sent to the management of healthcare institutions in the Philippines and Saudi Arabia. Following approval from the management, the researchers conducted a series of interviews by phone/voice or in person depending on the participants' preference, audio-recorded with permission, and supported by the researchers' observation notes. Moreover, informed consent, voluntariness, confidentiality, and data security procedures were upheld (de-identification, secure storage, restricted access, and named data custodian). Further, a hospital-approved consent script and administrative clearance sequence were observed.

E. Data Analysis

The data analysis followed a structured, inductive thematic process. The researchers first engaged in familiarization through repeated reading of transcripts and field notes to gain a comprehensive understanding of the data. The significant statements were then extracted, which served as the basis for initial coding. These codes were systematically clustered into broader categories, from which emergent themes were developed. Within-case analysis was first conducted separately for the Philippines and Saudi Arabia groups, followed by a cross-case synthesis to highlight convergences and divergences in nurses' experiences.

To provide theoretical grounding, the themes were interpreted against Herzberg's Two-Factor Theory, distinguishing between motivator influences (recognition, professional growth, responsibility) and hygiene factors (salary, working conditions, staffing). The themes were subsequently organized to address the research questions directly, with exemplar verbatim quotes presented in tables to illustrate findings and preserve participant voice.

Consistency was ensured through multiple strategies: credibility was maintained by presenting authentic excerpts from participants, dependability was strengthened by maintaining a clear coding audit trail, confirmability was supported by analytic memos documenting researcher reflections, and transferability was facilitated through thick descriptions of the organizational and cultural contexts in which the nurses worked.

III. RESULTS AND DISCUSSION

Five major themes emerged from the analysis, supported by direct statements from participants (coded as NP for nurses in the Philippines and NSA for nurses in Saudi Arabia). These were interpreted using Herzberg's Two-Factor Theory, distinguishing motivator (intrinsic) and hygiene (extrinsic) factors influencing job satisfaction.

Theme 1. Satisfaction with the 12-Hour Shift Structure

Nurses consistently emphasized the advantages of the 12-hour shift arrangement. The participants noted that the compressed schedule allowed more consecutive days off, reduced commuting expenses, fewer handovers, and improved continuity of patient care. As one nurse explained, *"At least with three long days, I get four full days to rest and spend time with my family"* (NP6). Another affirmed, *"Less turnover means better care for my patients because I can follow them up myself"* (NSA7).

Both Philippines and Saudi nurses recognized that the 12-hour shift enabled a more sustainable work-life balance while enhancing professional fulfillment by allowing them to provide uninterrupted care (NP3; NSA5). This was found to be aligned with

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

Herzberg's motivators, particularly achievement and meaningful work, by linking satisfaction to both personal well-being and improved patient outcomes.

According to Kwame and Petrucka (2021), the increased time spent by nurses on patient care developed a closer therapeutic relationship and produced higher quality of care in total. Further, the opportunity to have more time for personal well-being for the nurses produced decreased burnout levels and enhanced job satisfaction (Mendoza-Ignacio & Espinosa, 2024; Galanis et al., 2023). This twofold advantage not only illustrated the enhancing impact that a 12-hour shift working pattern has on nurses' morale but also the central significance of continuity in the care of patients. The findings of this research suggested that more extended shifts could establish an environment supporting more intense relations among nurses and patients, in turn supporting the therapeutic relationship needed for effective healthcare delivery.

However, the impact of 12-hour work shift duration goes beyond nurses' health, and it has organizational consequences as well. Work scheduling policy would be aided by considering these findings on the part of healthcare managers. By effectively addressing concerns of nurse and patient satisfaction, nurse managers can maximize aggregate performance across healthcare operations. Allowing such concerns to be addressed can lead not only to a more stable nurse workforce but also to better patient outcomes upon which quality healthcare delivery depends. As institutions evolve to the changing world of healthcare delivery, optimal work schedules may be a key strategy toward fostering a healthier, more contented nursing workforce while working toward a better quality of care for patients.

Theme 2. Overall Job Satisfaction: Workload, Pay, and Professional Fulfillment

Contrasts emerged between nurses in the Philippines and those in Saudi Arabia regarding job satisfaction. Philippine nurses frequently expressed frustration over the imbalance between workload and pay, despite maintaining strong professional pride. One participant lamented, *"Our work is endless, but the salary is not enough to match the effort"* (NP4), while another noted the lack of government recognition for their sacrifices (NP2; NP9).

In contrast, Saudi-based nurses highlighted higher levels of satisfaction due to fair compensation and incentive packages. A nurse shared, *"Yes, the work is tiring, but the benefits and pay make up for it"* (NSA3). These cross-context differences underscored the decisive role of extrinsic hygiene factors, particularly pay and staffing support, in shaping overall satisfaction.

These differences across work environments highlighted the essential contribution of extrinsic variables of hygiene, such as pay, benefits, and sufficient staffing backup, in determining overall satisfaction and well-being among nurses. The importance of these factors is even more pronounced when special needs of nurses, particularly in an environment where resources are limited, are considered. In this case, as indicated by Bae (2024) and Mithunmita and Britto (2021), poor monetary rewards and recognition not only directly affect in-job satisfaction but can also lead to lower morale and turnover, further aggravating nurse shortages and influencing the quality of patient care.

Therefore, the findings substantiated that enhancing remuneration, recognition, and reward in the Philippine healthcare workforce could be most critical in realizing job satisfaction and retention levels among nurses in this context. Addressing these challenges is vital for the job and individual satisfaction of the nurses; improving their wages and conditions of work, leading to higher job satisfaction, can help create a more stable workforce, enhance a healthy work environment, and ultimately result in enhanced patient outcomes.

Theme 3. Factors of Dissatisfaction (Hygiene Drivers)

Workload burden, resource limitations, and fatigue were common sources of dissatisfaction. A Philippine participant explained, *"Sometimes I handle too many patients alone, and it feels unsafe"* (NP7). Another reflected, *"Even with a 12-hour shift, you feel stretched beyond your role"* (NP10).

While Saudi nurses generally enjoyed stronger extrinsic support, they also acknowledged the physical toll of extended shifts: *"No matter the pay, 12 hours straight with high acuity patients is exhausting"* (NSA6). These findings directly corresponded to Herzberg's hygiene factors, specifically compensation, working conditions, and policies, which, when deficient, generate dissatisfaction even when intrinsic motivators are present.

These findings directly relate to Herzberg's hygiene factors, in this case, the factors of compensation, working conditions, and organizational policies. When these underlying factors are insufficient or poorly managed, they can generate significant dissatisfaction among health professionals. Such dissatisfaction can continue even with the presence of intrinsic motivators (Teutsch et al., 2025), in this case, the deep sense of satisfaction that professionals have through their dedication to patient care. As a result, the relationship between such extrinsic and intrinsic factors emphasizes the urgent need for better working conditions and sufficient staffing. In addition, it emphasizes the need for healthcare institutions to perform a careful examination of their policies and practices. Such evaluations are intended to maximize overall job satisfaction, and this, in turn, can have a significant impact on the quality of care delivered to patients (Salahat & Al-Hamdan, 2022). By creating a culture that keeps the well-being of healthcare workers central to its concerns, institutions can develop a more committed and contented workforce that ultimately

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

benefits both nurses and patients. Resolving these challenges not only benefits the interests of healthcare workers but also supports the core principles of patient-centered care, which remains crucial in today's sophisticated healthcare environment.

Theme 4. Factors of Satisfaction (Motivator Drivers)

Despite extrinsic challenges, many nurses drew satisfaction from intrinsic motivators such as recognition, personal achievement, and opportunities for professional growth. One Filipino nurse expressed, *"When my patients or families thank me, it makes the long hours' worth it"* (NP5). Similarly, a Saudi participant highlighted career advancement: *"Being promoted here in Saudi keeps me motivated to continue"* (NSA4).

These findings demonstrated how recognition and success not only strengthened the morale of nurses but also were central to enhancing continued commitment to the practice of nursing, even in the face of great demands and pressures. This finding was resolved to validate Herzberg's theory, which argued that intrinsic motivators form the core of developing actual job satisfaction (Mohammed et al., 2024). By prioritizing direct observations and experiences among nurses, the study emphasized professional pride and major recognition as buffers against turnover and burnout in the labor force. Earlier nursing literature upheld this stance by demonstrating that conditions of employment for maximum appreciation and personal development ensure higher rates of healthcare professional retention (De Vries et al., 2023; Yamamoto et al., 2024). These underscored the importance of creating a positive working condition that appreciates and respects the efforts of nurses so that higher levels of job satisfaction can be realized and a health system strengthened.

Theme 5. Perceived Convenience and Workplace Fit

The participants highlighted the practical benefits of 12-hour shifts, particularly the convenience of consolidated workdays and predictable off-blocks. As one Philippine nurse noted, *"It's convenient because I only commute three times a week instead of six"* (NP1). A Saudi nurse added, *"The shift fits with my lifestyle here since I also have good benefits"* (NSA8).

However, Philippine nurses reiterated that weak extrinsic conditions, especially low pay, undermined the convenience of longer shifts: *"Even if the schedule is okay, the pay still makes you think twice"* (NP10). By contrast, Saudi participants emphasized that strong salary and benefits packages amplified the convenience and attractiveness of 12-hour shifts (NSA2). This theme underscored the complex interplay between work schedules and the perceived quality of employment.

The results indicated that with proper benefits and compensation assured, longer shifts would significantly improve the quality of life of nurses by accumulating economic stability and job fulfillment. With longer shifts, intensive focus on patient care is achieved, providing nurses the opportunity to build strong rapport with patients, hence a more fulfilling work life (Ejebu et al., 2021). On the other hand, in workplace environments where there is no compensation, even highly regulated work shifts may be insufficient to guarantee nurse satisfaction (Varghese et al., 2023). In such settings, burnout, stress, and employee turnover issues will tend to increase, highlighting the imperative demand for equitable compensation as well as enabling work environments.

These findings highlighted the need of healthcare institutions to balance both work schedule designs and economic needs affecting their nurses. By focusing on decent pay and generous benefits, institutions could enhance nurses' health as well as the general quality of patient care. A wise rebalancing of work schedules along with compensation policy is hence essential towards the development of a health-enabling and sustainable workplace among nursing professionals.

IV. CONCLUSIONS

The study concluded that 12-hour shifts offered clear advantages, including continuity of patient care, fewer handovers, and improved personal logistics. However, they also heightened fatigue and amplified dissatisfaction when extrinsic factors such as compensation and staffing were inadequate. The 12-hour shift structure itself was not inherently positive or negative; rather, its impact depended on the organizational context in which it was embedded. For many participants, extended shifts provided tangible benefits such as reduced commuting, continuity of care, and longer rest days, contributing to both professional fulfillment and work-life balance. However, the physical toll of fatigue and stress was evident, particularly in settings with limited extrinsic support.

In Saudi Arabia, nurses had higher satisfaction due to adequate compensation, institutional support, and incentives that cushioned the strains of long working hours. Where extrinsic support was robust, nurses expressed greater overall satisfaction, demonstrating the powerful role of hygiene factors in reinforcing intrinsic motivators. Conversely, in the Philippines, nurses expressed dissatisfaction, citing inadequate pay, staffing shortages, and systemic resource gaps, which intensified the burdens of the 12-hour duty. Despite these challenges, intrinsic motivators such as recognition, achievement, and professional growth sustained nurses' commitment to their roles.

Overall, the findings underscored that shift length alone does not determine job satisfaction. Instead, the broader work environment, compensation, staffing policies, and recognition systems critically influence how nurses experience and evaluate

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

their work. The results highlight the need for holistic workforce policies that consider both structural shift arrangements and contextual supports.

V. IMPLICATIONS AND RECOMMENDATIONS

Based on the findings, several implications and recommendations are proposed for the advancement of nursing practice, management, and policy formulation:

The current research suggests that policymakers and administrators should make it a point to provide fair remunerations and full benefits to the nurses who are working 12-hour shifts. This must not only include hazard pay and overtime compensation but also wellness allowances for the special demands of these longer working hours. Having sufficient staffing levels and proper resource allocation are critical to prevent role overload and minimize the risk of burnout that has a significant impact on nurse well-being as well as patient outcomes. Scheduling flexibility and rotation schemes must be designed that balance for adequate functioning and nurses' well-being, particularly for nurses who must report for work for consecutive long shifts. These policies can also enhance the quality of care provided to patients, in addition to addressing the immediate issue of nurse burnout.

Moreover, nurse managers need to be directly engaged in creating an environment of gratitude, positive feedback, and professional development. This involves introducing avenues for continuous professional education and pursuit of leadership roles, which can enhance job satisfaction and career progression. Promotion of healthy work-life balance is critical; therefore, wellness programs should be supplemented with mental health support programs and structured rest breaks. Interventions like these can readily eliminate the degree of exhaustion among nurses and further boost their overall resilience in a stressful workplace environment.

In addition, the present study highly recommends that education programs for nursing include curriculum components of fatigue management, stress coping, and resilience building to prepare nursing students to work long shifts. For future investigation, future researchers and scholars may consider obtaining higher, more diverse samples and using mixed-method designs to address the present study's limitations. Longitudinal and comparative studies with a range of healthcare systems may also be considered to examine the impact of varying organizational forms on satisfaction among nurses and differences in temporal patterns of satisfaction in the negative context of 12-hour shifts. Such further studies may help formulate targeted interventions and programs related to the well-being of nurses in addition to overall health care system development.

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REFERENCES

- 1) Al Sabei, S., Afolabi, T., Odetola, T., Al-Rawajfah, O., & AbuAlRub, R. (2025). Predictors of nurse retention in healthcare organizations: The role of transformational leadership and work–life balance. *BMC Nursing*, 24(1), 65. <https://doi.org/10.1186/s12912-025-02762-1>
- 2) Alfuhaid, A., Alshammari, M., Alotaibi, A., & Valdez, G. F. (2023). Filipino nurses in Saudi Arabia: Migration patterns, workforce implications, and challenges. *Journal of International Migration and Integration*, 24(2), 511–529. <https://doi.org/10.1007/s12134-022-00956-2>
- 3) Alzoubi, M. M., Al-Mugheed, K., Oweidat, I., Alrahbeni, T., Alnaeem, M. M., Alabdullah, A. A. S., Abdelaliem, S. M. F., & Hendy, A. (2024). Moderating role of relationships between workloads, job burnout, turnover intention, and healthcare quality among nurses. *BMC Psychology*, 12(1), 495. <https://doi.org/10.1186/s40359-024-01891-7>
- 4) Bae S. H. (2024). Nurse Staffing, work hours, mandatory overtime, and turnover in acute care hospitals affect nurse job satisfaction, intent to leave, and burnout: A cross-sectional study. *International Journal of Public Health*, 69, 1607068. <https://doi.org/10.3389/ijph.2024.1607068>

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

- 5) Baillie, L., & Thomas, N. (2019). Changing from 12-hr to 8-hr day shifts: A qualitative exploration of effects on organising nursing care and staffing. *Journal of Clinical Nursing*, 28(1–2), 148–158. <https://doi.org/10.1111/jocn.14624>
- 6) Ballie, L., Merritt, J., Cox, J., & Cook, L. (2019). The impact of shift length on nurses' perceptions of work and patient care. *Journal of Nursing Management*, 27(2), 377–384. <https://doi.org/10.1111/jonm.12715>
- 7) Bettinardi, O., Montagna, M. T., Grassi, R., & Santangelo, M. A. (2008). Nurse job satisfaction and retention: Factors affecting turnover. *International Nursing Review*, 55(3), 285–292. <https://doi.org/10.1111/j.1466-7657.2007.00634.x>
- 8) Corpuz J. C. G. (2023). Advancing Filipino healthcare: The plight of Filipino nurses in a postpandemic world. *SAGE Open Nursing*, 9, 23779608231220872. <https://doi.org/10.1177/23779608231220872>
- 9) Cummings, G. G., Hayduk, L., & Estabrooks, C. A. (2008). Mitigating the impact of hospital restructuring on nurses: The responsibility of emotionally intelligent leadership. *Nursing Research*, 57(3), 201–211. <https://doi.org/10.1097/01.NNR.0000319490.32168.79>
- 10) Dall'Ora, C., Ball, J., Recio-Saucedo, A., & Griffiths, P. (2016). Characteristics of shift work and their impact on employee performance and well-being: A literature review. *International Journal of Nursing Studies*, 57, 12–27. <https://doi.org/10.1016/j.ijnurstu.2016.01.007>
- 11) De Vries, N., Lavreysen, O., Boone, A., Bouman, J., Szemik, S., Baranski, K., Godderis, L., & De Winter, P. (2023). Retaining healthcare workers: A systematic review of strategies for sustaining power in the workplace. *Healthcare (Basel, Switzerland)*, 11(13), 1887. <https://doi.org/10.3390/healthcare11131887>
- 12) Ejebu, O. Z., Dall'Ora, C., & Griffiths, P. (2021). Nurses' experiences and preferences around shift patterns: A scoping review. *PloS One*, 16(8), e0256300. <https://doi.org/10.1371/journal.pone.0256300>
- 13) Galanis, P., Fragkou, D., Kaitelidou, D., & Siskou, O. (2023). Nurse turnover intention and job satisfaction: A systematic review and meta-analysis. *International Journal of Nursing Studies*, 137, 104398. <https://doi.org/10.1016/j.ijnurstu.2022.104398>
- 14) Galanis, P., Moisoglou, I., Katsiroumpa, A., Vraka, I., Siskou, O., Konstantakopoulou, O., Meimeti, E., & Kaitelidou, D. (2023). Increased job burnout and reduced job satisfaction for nurses compared to other healthcare workers after the COVID-19 pandemic. *Nursing Reports (Pavia, Italy)*, 13(3), 1090–1100. <https://doi.org/10.3390/nursrep13030095>
- 15) Herzberg, F. (1968). One more time: How do you motivate employees?. *Harvard Business Review*, 46(1), 53–62.
- 16) Hussein, M. A., Sudha, A. R., & Almeer, T. (2025). Impact of nurses' working hours on patient safety indicators: Comparing 8- and 12-hour shift patterns. *British Journal of Healthcare Management*, 31(2), 42–49. <https://doi.org/10.12968/bjhc.2024.0042>
- 17) International Council of Nurses (ICN). (2018). *Nurse retention and migration report*. International Council of Nurses. https://www.icn.ch/sites/default/files/inline-files/2018_ICNM%20Nurse%20retention.pdf
- 18) International Council of Nurses. (2020). *International council of nurses workforce report 2020: The global nursing shortage*. International Council of Nurses. <https://www.icn.ch/system/files/documents/2020-07/ICN%20Workforce%20Report%202020.pdf>
- 19) Kurnat-Thoma, E. L., Ganger, M., Peterson, K., & Channell, L. (2017). Reducing annual hospital and registered nurse staff turnover—A 10-element onboarding program intervention. *SAGE Open Nursing*, 3, 1–13. <https://doi.org/10.1177/2377960817697712>
- 20) Kwame, A., & Petrucka, P. M. (2021). A literature-based study of patient-centered care and communication in nurse-patient interactions: barriers, facilitators, and the way forward. *BMC Nursing*, 20(1), 158. <https://doi.org/10.1186/s12912-021-00684-2>
- 21) Mendoza-Ignacio, A., & Espinosa, K. P. M. (2024). The relationship of workplace stress on the caring behavior of staff nurses. *International Journal of Multidisciplinary Research and Publications*, 6(11), 8-17. <https://ijmrmap.com/wp-content/uploads/2024/04/IJMRAP-V6N10P122Y24.pdf>
- 22) Mithunmita, R., & Britto, M. J. (2021). Effectiveness of monetary reward system on the employee's performance level. *Shanlax International Journal of Management*, 9(1), 50-53. <https://doi.org/10.34293/management.v9i1.3883>
- 23) Mohammed, S. A., Al Jaffane, A., & Al Qahtani, M. (2024). Motivating factors influencing the career advancement of nurses into nursing management positions. *International Journal of Africa Nursing Sciences*, 20, 100751. <https://doi.org/10.1016/j.ijans.2024.100751>
- 24) Pressley, C., Newton, D., Garside, J., Stephenson, J., & Mejia-Olivares, J. (2023). Internationally recruited nurses and their initial integration into the healthcare workforce: A mixed methods study. *International journal of nursing studies advances*, 5, 100154. <https://doi.org/10.1016/j.ijnsa.2023.100154>

Comparative Study on the Job Satisfaction of Nurses Working in the Philippines and Saudi Arabia on A 12-Hour Shift

- 25) Pung, L. X., Goh, Y. S., Marangozov, R., Williams, M., & Buchan, J. (2016). Nurse migration and health workforce sustainability in high-income countries: A case for policy intervention. *Human Resources for Health*, 14(1), 82. <https://doi.org/10.1186/s12960-016-0178-9>
- 26) Rhéaume, A., & Mullen, J. (2018). The impact of long shifts on nurses' health and job satisfaction. *Journal of Nursing Management*, 26(5), 498–505. <https://doi.org/10.1111/jonm.12570>
- 27) Salahat, M. F., & Al-Hamdan, Z. M. (2022). Quality of nursing work life, job satisfaction, and intent to leave among Jordanian nurses: A descriptive study. *Heliyon*, 8(7), e09838. <https://doi.org/10.1016/j.heliyon.2022.e09838>
- 28) Saville, C., Dall'Ora, C., & Griffiths, P. (2020). The association between 12-hour shifts and nurses-in-charge's perceptions of missed care and staffing adequacy: A retrospective cross-sectional observational study. *International Journal of Nursing Studies*, 112, 103721. <https://doi.org/10.1016/j.ijnurstu.2020.103721>
- 29) Saville, C., Griffiths, P., Ball, J., Jones, J., Recio-Saucedo, A., & Dall'Ora, C. (2020). The association between 12-hour shifts and nurses-in-charge's perceptions of staffing adequacy. *International Journal of Nursing Studies*, 112, 103701. <https://doi.org/10.1016/j.ijnurstu.2020.103701>
- 30) Scott-Marshall, H. K. (2024). Safe limits on work hours for the nursing profession: A rapid review. *Frontiers in Global Women's Health*, 5, 1455422. <https://doi.org/10.3389/fgwh.2024.1455422>
- 31) Shehata, A. A. (2024). Nurses' perception regarding twelve-hour shifts and professionalism. *Tanta Scientific Nursing Journal*, 33(2), 90–104. <https://doi.org/10.21608/tsnj.2024.350968>
- 32) Stimpfel, A. W., Sloane, D. M., & Aiken, L. H. (2012). The longer the shifts for hospital nurses, the higher the levels of burnout and patient dissatisfaction. *Health Affairs*, 31(11), 2501–2509. <https://doi.org/10.1377/hlthaff.2011.1377>
- 33) Suter, J., Kowalski, T. H. P., & Anaya-Montes, M. (2020). The impact of moving to a 12-hour shift pattern on employee well-being: A qualitative study in an acute mental health setting. *International Journal of Nursing Studies*, 112, 103699. <https://doi.org/10.1016/j.ijnurstu.2020.103699>
- 34) Teutsch, D., Frick, E., & Kubitz, J. (2025). What motivates critical care nurses to stay in their job?—Structural aspects for empowering intrinsic motivation in permissive professional contexts: A scoping review. *Intensive and Critical Care Nursing*, 88, 103929. <https://doi.org/10.1016/j.iccn.2024.103929>
- 35) Thompson, B. J., Stock, M. S., Banuelas, V. K., & Mota, J. A. (2019). Work-induced fatigue accumulates across three compressed 12-hour shifts in hospital nurses and aides. *PLOS ONE*, 14(2), e0211715. <https://doi.org/10.1371/journal.pone.0211715>
- 36) Thompson, D. R. (2019). Nursing burnout and the effects of long working hours: An international perspective. *International Journal of Nursing Studies*, 97, A1–A3. <https://doi.org/10.1016/j.ijnurstu.2019.04.003>
- 37) Twigg, D., McCullough, K., & Tranter, S. (2014). Nurse retention: A review of strategies to create and enhance positive practice environments in clinical settings. *International Journal of Nursing Studies*, 51(1), 85–92. <https://doi.org/10.1016/j.ijnurstu.2013.05.015>
- 38) Varghese, B., Joseph, C. M., Al-Akkam, A. A. A., Al-Balawi, R. M. D. O. A., Swalmeh, E., & Singh, K. (2023). Nurse's experience working 12-hour shift in a tertiary level hospital in Qatar: a mixed method study. *BMC Nursing*, 22(1), 213. <https://doi.org/10.1186/s12912-023-01371-0>
- 39) Walden University. (2024). *Workplace factors influencing nurse job satisfaction and retention*. Walden Dissertations and Doctoral Studies Collection. <https://scholarworks.waldenu.edu/dissertations/15941>
- 40) Webster, J. (2019). Eight-hour versus 12-hour shifts in an ICU: Comparing absenteeism and patient outcomes. *Critical Care and Resuscitation*, 21(3), 210–216. <https://pubmed.ncbi.nlm.nih.gov/30262179/>
- 41) Wolniak, R., & Olkiewicz, M. (2019). Job satisfaction and employee performance in healthcare organizations. *Quality & Quantity*, 53(1), 59–74. <https://doi.org/10.1007/s11135-018-0729-0>
- 42) World Health Organization. (2018). *Nursing and midwifery: Key facts*. WHO. <https://www.who.int/news-room/fact-sheets/detail/nursing-and-midwifery>
- 43) World Health Organization. (2020). *State of the world's nursing 2020: Investing in education, jobs and leadership*. WHO. <https://www.who.int/publications/i/item/9789240003279>
- 44) Yamamoto, K., Nasu, K., Nakayoshi, Y., & Takase, M. (2024). Sustaining the nursing workforce-exploring enabling and motivating factors for the retention of returning nurses: A qualitative descriptive design. *BMC Nursing*, 23(1), 248. <https://doi.org/10.1186/s12912-024-01900-5>