

SHORTAGE OF NURSES' IMPACT ON QUALITY CARE: A QUALITATIVE STUDY

Aisyahaton Suhaimi¹
Zamzaliza Abdul Mulud¹
Siti Khuzaimah Ahmad Sharoni¹

¹ Centre of Nursing Study, Faculty of Health Sciences, UiTM,Puncak Alam Campus. 42300 Bandar Puncak Alam, Selangor, Malaysia

(E-mail: aisyahaton@yahoo.com)

² Centre of Nursing Study, Faculty of Health Sciences, UiTM,Puncak Alam Campus. 42300 Bandar Puncak Alam, Selangor, Malaysia

(Email: zamzaliza@uitm.edu.my)

³ Centre of Nursing Study, Faculty of Health Sciences, UiTM,Puncak Alam Campus. 42300 Bandar Puncak Alam, Selangor, Malaysia

(E-mail: siti123@uitm.edu.my)

Article history

Received date : 15-4-2021

Revised date : 16-4-2021

Accepted date : 29-4-2021

Published date : 31-5-2021

To cite this document:

Suhaimi, A., Abdul Mulud, Z., & Ahmad Sharoni, S. K. (2021). Shortage Of Nurses' Impact on Quality Care: A Qualitative Study. *Journal of Islamic, Social, Economics and Development (JISED)*, 6(36), 73 – 80

Abstract: *The nursing shortage is a problem that is being experienced world-wide. It is a problem that, left unresolved, could have a serious impact on the quality health care. The study was conducted as Malaysia was one of the countries affected by the shortage of nurse work force and the quality of care was declining. The aim this study is to explore nurses' perception on the key factors contributing to nursing shortage and quality of care at tertiary hospital in Klang Valley. This study was conducted using a qualitative approach. Eight respondents were purposively selected from tertiary hospital in Klang Valley. Data was collected through semi structured interviews and analysed using qualitative content analysis. The study revealed that respondents have the same understanding that shortage of resources has negative impact on provision quality of care. Two major themes and four sub themes emerged these are: 1) Nurses ratio 2) Patient care 3) Documentation 4) Non nurse role. Inappropriate nurse-patient ratios and inadequate physical resources negatively affected nurse's perceptions of the quality of the nursing practice environment. With adequate staffing levels and appropriate allocation of physical resources, is achievable to resolve the problems and thus improve outcomes. The motivation of this study is due to fact that shortage of nurses might affect their quality of care.*

Keywords: *Nursing, shortage, quality of care*

Introduction

Nurses are one of the most important actors in healthcare industry apart from doctors. Nursing roles generally include primary, secondary, and tertiary care activities. For primary health care activities, this includes health promotion, disease prevention and control, care and rehabilitation activities (Shamian, 2014). While secondary and tertiary healthcare involved health care activities in hospitals. In line with these holistic care tasks, nurses need to monitor the patient's condition from time to time (Walker, Clendon & Nelson, 2015), document records of care progress (Salmond & Echevarria, 2017) and take appropriate action as well as report unusual circumstances to their superiors (Oldland, Botti, Hutchinson & Redley, 2019).

In carrying their day-to-day duties and responsibilities, nurses in Malaysia are subjected to the Code of Professional Conduct for Nursing Policies, Regulations and Guidelines which was established in improving the quality of health care and involvement of the community, family and community (Annuar et. al, 2017). Shortages in the nursing profession has been extensively studied however it is often referred to as emerging issue rather than a current issue which requires effective and immediate action.

Various factors have been known to cause nursing shortage however, this study will only focus on quality care factor as it is associated with the impending problem in modern healthcare. Hence, the purpose of the study is to explore nurses' perception on the key factors contributing to nursing shortage and quality care.

Method

The main purpose of this qualitative descriptive study was to explore nurses' perception on the key factors contributing to nursing shortage and quality of care at tertiary hospital in Klang Valley.

Ethical considerations

An approval letter from Universiti Teknologi MARA (UiTM) Research Ethical Committee then from Ministry of Health (MoH) through National Medical Research Registry (NMRR) with participating hospitals before the research is being conducted.

Respondents

The study involved staff nurses and nursing sisters. At the onset of the study, a number nurses were invited to be interviewed about their daily experiences and concerns in the wards. Eight respondents were agreed to have interviewed. (Table 1)

Table 1: Interviewees

Respondents	Gender	Ward	Education	Experience (Years)
1	Female	Orthopedic	Diploma	18
2	Female	Medical	Diploma,	8
3	Female	Medical	Diploma	11
4	Female	Medical	Diploma	8
5	Female	Medical	Diploma	8
6	Female	ICU	Degree	15
7	Female	Medical	Diploma	14
8	Female	Medical	Degree	25

Data collection process

The study was conducted at two Tertiary Hospital Hospital in Klang Valley. The data collection was conducted using semi structured individual interviews with open-ended questions. An information document was read to all those who were willing to participate. In the study, an appointment was made after working hours. At an agreed time, the researcher physically interviewed the respondents in a nursing sister room so as to maintain privacy and confidentiality. Each session took an average duration of fifteen to twenty-five minutes. Interviews were audio-recorded. The interviews were conducted in English and were coded as numbers R1 –R8.

Analysis

All the interviews were transcribed verbatim and analysed using a thematic approach. The analysis of the data adhered to the established procedure of narrative analysis. To begin with, the researcher viewed the eight interview transcripts to identify items that pointed to the existence of potential themes. The number of times the same concepts or topics were mentioned in the interviews was recorded. The concepts stated in the interviews were given the codes Q1, Q2, Q3, Q4, and so on. For example, the concept of shortage was composed of attributes such as workload, taking care too many patient, holistic care, basic routine and advance task, effectiveness, skill in providing care. To ensure inter-rater reliability, a nurse colleague coded 10% of the entire transcripts independently; after that, an English version of the report was written and reported. In this interviewed it's involved a case by case analysis, followed by a cross-case analysis of shared themes (see Table 2).

Table 2: Shortage of nurses' impact on quality care and experiences by the respondents

Theme	Sub- theme
Shortage of nurses	Nurse ratio
	Patient care
Quality care	Documentation
	Non nurse role

Findings

Nursing Ratio

The World Health Organization (WHO) has set the ratio of population for nurses and patients to 1: 200 (Zhu, Zheng, Liu & You, 2019). In 2009, the total number of nurses in Malaysia was 79,799 covering all categories, of which 60,152 were serving in the Ministry of Health Malaysia (MOH) and 19,647 serving in the private sector (Barnett, Narudin & Namasivayam, 2010). The population ratio for nurses and patients in Malaysia at that time was 1: 329. As mentioned earlier, the ratio for nurses in patient care needs to be taken into account because, according to a report released by the Ontario Nurses Association (2012), 60% of the healthcare institution had a problem with the ratio of nurses and patients and 34% related to nursing capacity provide patient care appropriate to the current state of the patient. Nurse and patient ratio as a measure of nursing workload. The dismay was expressed as :

Okay let take a look in Singapore which is err.. just nearby our country. Singapore got four patient, two staff registered nurse and two nurses aid. Which is very good. It's help a lot compared to Malaysia in my current setting four patient or up to six patient or even twelve patient to one nurses. Can.. could you imagine how bad was that and how heavy work we do and it was re.. really workload is very high the stress level is very high and we cannot deliver better care to patient.

(Respondent 2)

The ratio of nurses to patient ideally is one to six in general medical ward while one in four in subacute cubicle and one in two in acute cubicle. At all times to ensure patient received good nursing care and treatment plan by doctor. However, nurses in general medical now facing ratio of one to eight to one to ten dues to nurse's shortage.

(Respondent 3)

Respondents also believed that shortage of nurses and disproportionate nurse-to-patient ratio have a negative effect on productivity.

Patient care

The quality of patient care is evaluated on the basis of professional elements, holistic care, practice and humanity. Quality of nursing care includes competence in cognitive, affective and psychological control (Molina-Mila & Gallo-Estrada, 2020). The quality of patient care is also closely linked to the extent to which nurses can meet the physical and additional care needs of the patient (Manal, Anas & Collins, 2013). The basis of quality care for nurses focused on the ability of nurses to evaluate the patient's condition, provide quality patient care and see the effectiveness of nursing actions and skills in providing care (Mhlanga, Zvinavashe, Haruzivishe & Ndaimani, 2016). Patients have different views on the quality of patient care. They focus more on how nurses communicate, listen to the problems they face, how nurses evaluate and provide nursing care (Cheraghi, Jasper & Vaismoradi, 2014). Health institutes on the other hand viewed quality of care for patients as the ability of nurses to meet the needs of the organization and cost reduction (Rossaneis, Gabriel, Haddad et al. 2014). Nurses have a main role in providing quality care to patients. Nurses' work is valued, and they are concerned about their productivity. An active action of nurses which shape the quality of care. As they expressed :

Okay. To me lah as a nurse.. to me when you ever to deliver your nursing care err.. service with good knowledge and good practice then the outcome when your patient urm.. when you.. when your patient received our service safely.

(Respondent 1)

Okay. In term of nursing point of view, err.. it is the ability to delivered healthcare that minimizes risk and harm to service users including avoiding preventable injuries and reducing medical errors. And then effective nursing care, providing service based on scientific knowledge and evidence based guide.. guidelines, reducing delays in providing and receiving healthcare.

(Respondent 5)

Lang (1976) defined quality in nursing as a process which seeks to attain the highest degree of excellence of patient care. Respondents believe that high quality nursing care is achieved when patients feel heard and understood, consider themselves to be in safe hands and know that their care problems have been noticed.

Documentation

Workloads such as the management of the International Operating Standards (ISO) by the hospital to improve the quality of healthcare service have a direct impact on nurses. The need for this documentation has led to an increase in existing loads. Nurses take twice as much time to record patient progress than interacting with patients and families of patients (Mira, Achir & Tutik, 2019). Excessive workload demands include the large amount of paperwork required, the responsibility for the total care of patients requiring very complex healthcare and the ward's continuous understaffing. As they said :

It's urm.. It's beca.. it's because of due to lot of paperwork documentation. So, it's a very difficult to deliver quality service nursing care.

(Respondent 1)

As a registered nurse, I feel difficulty to fully complete my task during my shift. My patient received late treatment and modified nursing care intervention. More paperwork and documentation is being introduce each year to improve patient care. But ironically, it's wasn't the quality of nursing care that patient received due to unimportant paperwork.

(Respondent 3)

The respondents felt that there is a lot of paperwork to attend to and they felt that the energies could be better spent on her primary duties to ensure better care of the patients.

Non-nurse Roles

Nurses also need to do many side-by-side tasks that sometimes go beyond their basic tasks such as sending patients, doing clerical tasks, calculating stock and doing cleaning work. According to Shields and Watson (2007) it was found that 34.3% of nurses in the United States perform packing tasks and 45.7% send patients to their families and about 11% of nurses also carry out ward cleaning and administrative duties (Shields & Watson, 2007). Nurses in Australia also performed many clerical tasks such as patient registration and fillings (Chamberlain, Pollock & Fullbrook, 2018). Nurses are considered to be required to perform such tasks because their supervisors feel that the work is still relevant to the management and care of patients for example the registration of patients who enter the ward. They also have to perform all tasks, from a basic routine task to an advanced routine task. Remarks from respondents included:

Admission and transferred outpatient in registration can be done by PPK (Pembantu Perawatan Kesehatan). Indenting of medicine for patients can be done by pharmacist station and unit. Vital sign checking can be done by PPK. Documentation while transfer in or transfer out can be carried out by PT (Pembantu Tadbir). Spoon feed meal can be served by PPK for weak or disable patient. Obviously nursing care and nursing intervention must be carried out by registered nurse.

(Respondent 3)

Well, admission transfer outpatient actually we can replace. You know like admission... like transferring a patient actually, we can ask maybe the attendance to help in transferring patients. And because what err... like IT... IT maybe can try source out the web... software where you can link it the admission, link the admission charges through IT wise and therefore the nurses no need to transfer the patient but our attendance can help to transfer the patient especially if the patient is err.. not really what you call it urmm.. is quite stable patient lah er.. not risky patient actually can involve..can involve the PPK attendant to send lah. Like indenting medicine also the pharmacist can indent the medicine sometime I think the pharmacist can even send the medication to the ward instead of our nurses collecting the medication in the pharmacist. And then one thing we can also ask the porter to send patient for X-ray or going for like CT brain because nowadays like in my ward my nurses have to go out and send patient to X-ray, to CT brain which actually can be done by porters.

(Respondent 8)

Working conditions were described as difficult and workload as particularly heavy, which was a hectic daily routine. Most of respondents mentioned that their daily routine nowadays consists mainly of non-duties.

Discussion

The interviews conducted with eight nurses provided a variety of insights into factors that contributing to the nursing shortage and quality of care. The problem of shortage of nursing staff in our nation's hospitals remains a question of concern and triggers a phenomenon that complicates the field of health care today. Therefore, pragmatic initiatives should be addressed to address this problem and bring this area of health service to a higher level of service quality. Proper strategy planning is very important and needs to be implemented quickly and correctly. This is because the global competition in the health care field is increasingly challenging and gaining popularity since the world began to move into the millennium, with the rapid development of global level of science.

In this study, nurses believe that to improve productivity there should be adequate and qualified human resources. Quality patient care also based on the result of a good work environment and lack of resources affects the quality of patient care. High-quality care is a big priority for nurses, as it contributes to patients' self-sufficiency and return to full health. However, it raises the image of nursing as a profession as a whole. Based on previous studies, an impact on the quality of patient care and is closely related to the nursing shortage.

Conclusion

The ability of nurses to make decisions for patients helps improve the quality of care (Amin, 2011). Studies in the late '90s found that nurses were under pressure if they failed to provide proper care or in accordance with established standards (MacPhee et al. 2017). The shortage of nurses in patient care makes it difficult for nurses to maintain quality of care. Among the side effects that nurses may experience as a result of high workload are fatigue, stress and frequent pain. When nurses experience such an impact, it can affect the services provided to patients.

Nurses who are tired and stressed or in pain due to high workload cannot provide good and consistent services. Insufficient numbers of nurses to meet the needs of patients can impact patient care quality (Ross et al. 2019). With adequate staffing levels and appropriate allocation of physical resources, is achievable to resolve the problems and thus improve outcomes. The motivation of this study is due to fact that shortage of nurses might affect their quality of care.

References

- Ahmed, M., Shehadeh, A., & Collins, M. (2013). Quality of Nursing Care in Community Health Centers: Clients' Satisfaction, 7, 229–236.
- Amin S. G (2011). Study to Determine the Influence of Workload on Nursing Personnel. *Western Michigan University*. <https://scholarworks.wmich.edu/dissertations/339>
- Annur, W. S. H. W. M., Saat, N. H., Razali, M. T. A., & Aung, K. T. (2017). Knowledge and practice of nursing students on health care ethics. *Scholars Journal of Applied Medical Sciences (SJAMS)*, 5(9C), 3693–3699. <https://doi.org/10.21276/sjams.2017.5.9.38>
- Asmirajanti, M., Hamid, A. Y. S., & Hariyati, R. T. S. (2019). Nursing care activities based on documentation. *BMC Nursing*, 18(Suppl 1), 1–5. <https://doi.org/10.1186/s12912-019-0352-0>
- Barnett, T. & Namasivayam, P & Narudin, D.A.A. (2010). A critical review of nursing shortage in Malaysia. *International nursing review*, 57. 32-9. 10.1111/j.1466-7657.2009.00784.x.
- Cheraghi, M.-A., Jasper, M., & Vaismoradi, M. (2014). Clinical nurses' perceptions and expectations of the role of doctorally-prepared nurses: A qualitative study in Iran. *Nurse Education in Practice*, 14(1), 18–23. doi:10.1016/j.nepr.2013.06.007
- Chamberlain, D., Pollock, W., & Fulbrook, P. (2018). ACCCN Workforce Standards for Intensive Care Nursing: Systematic and evidence review, development, and appraisal. *Australian Critical Care*, 31(5), 292–302. <https://doi.org/10.1016/j.aucc.2017.08.007>
- Lang N M (1976) *Issues in quality assurance in nursing* Issues in Evaluation Research American Nurses' Association, Kansas City, pp 45-46
- Macphee, M., Dahinten, V. S., & Havaei, F. (2017). administrative sciences The Impact of Heavy Perceived Nurse Workloads on Patient and Nurse Outcomes, 1–17. <https://doi.org/10.3390/admsci7010007>
- Mhlanga, M., Zvinavashe, M., Haruzivishe, C., & Ndaimani, A. (2016). Quality Nursing Care: A concept analysis, 3(1), 25–30.
- Molina-mula, J., & Gallo-estrada, J. (2020). Impact of nurse-patient relationship on quality of care and patient autonomy in decision-making. *International Journal of Environmental Research and Public Health*, 17(3). <https://doi.org/10.3390/ijerph17030835>
- Oldland, E., Botti, M., Hutchinson, A. M., & Redley, B. (2019). A framework of nurses' responsibilities for quality healthcare — Exploration of content validity. *Collegian*. <https://doi.org/10.1016/j.colegn.2019.07.007>
- Ross, C., Rogers, C., & King, C. (2019). Safety culture and an invisible nursing workload. *Collegian*, 26(1), 1–7. <https://doi.org/10.1016/j.colegn.2018.02.002>
- Rossaneis, M. A., Gabriel, C. S., Haddad, M. do C. L., da Costa Melo, M. R. A., & Bernardes, A. (2015). Health Care Quality Indicators: the Opinion of Nursing Managers of Teaching Hospitals, 20(4), 790–796.
- Salmond, S. W., & Echevarria, M. (2017). Healthcare Transformation and Changing Roles for Nursing. *Orthopaedic Nursing*, 36(1), 12–25. <https://doi.org/10.1097/NOR.0000000000000308>

- Shamian, J. (2014). The role of nursing in health care. *Revista Brasileira de Enfermagem*, 67(6), 867–868. <https://doi.org/10.1590/0034-7167.2014670601>
- Shields L and Watson R (2007).The demise of nursing in the United Kingdom: a warning for Medicine. *Journal of the Royal Society of Medicine*. <https://doi.org/10.1177/014107680710000220>
- Walker, L., Clendon, J., & Nelson, K. (2015). Nursing roles and responsibilities in general practice: Three case studies. *Journal of Primary Health Care*, 7(3), 236–243. <https://doi.org/10.1071/hc15236>
- Zhu, X., Zheng, J., Liu, K., & You, L. (2019). Rationing of nursing care and its relationship with nurse staffing and patient outcomes: The mediation effect tested by structural equation modeling. *International Journal of Environmental Research and Public Health*, 16(10). <https://doi.org/10.3390/ijerph16101672>